

CATALOGUE

UNIVERSITY OF WASHINGTON
FOR 1920-1921

ANNOUNCEMENTS
FOR 1921-1922



SEATTLE, WASHINGTON

Seattle
University of Washington Press
1921

NOTICE

The University and its various schools and departments reserve the right to change the rules regulating admission to the University and its schools, and any other regulations affecting the student body, or the granting of degrees, and such regulations shall go into force whenever the proper authorities may determine, and shall apply not only to prospective students, but also to those who may, at such time, be matriculated in the University. The University also reserves the right to withdraw courses at any time.

CONTENTS

	<i>Page</i>
LOCATION OF UNIVERSITY	3
CALENDAR	6
BOARD OF REGENTS	7
OFFICERS OF ADMINISTRATION	8
FACULTY	11
BOARDS AND COMMITTEES	22
GENERAL INFORMATION	23
Historical Sketch	25
Equipment	27
ENTRANCE INFORMATION	36
The University Organization	36
Admission to the University	39
List of Accredited Schools	41
Registration	42
Requirements for Admission to the University, and Colleges, and Curricula	43
Expenses	47
Student Help	52
Academic and Vocational Guidance	52
Fellowships, Scholarships and Aid	54
Prizes	56
Student Loan Funds	57
Associations and Clubs	58
General Scholastic Regulations	59
Fraternity Pledging	61
COLLEGE OF LIBERAL ARTS	64
Admission	64
Requirements for the degree of Bachelor of Arts	66
Curriculum	66
COLLEGE OF SCIENCE	73
Admission	73
Requirements for the degree of Bachelor of Science	74
Curricula	74
COLLEGE OF EDUCATION	86
Admission	91
Requirements for the degree of Bachelor of Education	91
Curricula	91
LIBRARY SCHOOL	103
Admission	103
Curricula	104
COLLEGE OF BUSINESS ADMINISTRATION	106
Admission	106
Curricula	107
SCHOOL OF JOURNALISM	116
Admission	117
Curricula	118
COLLEGE OF ENGINEERING	122
Degrees	123
Admission	123
Curricula	124
Engineering Experiment Station	127
COLLEGE OF FINE ARTS	129
Degrees	129
Admission	129
Curricula	130
COLLEGE OF FISHERIES	137
Requirements for the degree of Bachelor of Science in Fisheries	138
Curricula	140
COLLEGE OF FORESTRY	142
Degrees	143
Admission	143
Curriculum	145

CONTENTS

5

SCHOOL OF LAW	147
Admission	149
Degrees	149
COLLEGE OF MINES	153
Degrees	153
Admission	156
Curricula	156
Winter Session	158
COLLEGE OF PHARMACY	164
Admission	164
Degrees	165
Curricula	165
GRADUATE SCHOOL	170
Admission	172
Degrees	173
DEPARTMENTS OF INSTRUCTION	178
Aeronautical Engineering	179
Anatomy	179
Architecture	180
Astronomy	182
Bacteriology	184
Botany	186
Ceramics	188
Chemistry	190
Civil Engineering	196
Classical Languages and Literature (Greek, Latin)	199
Dramatic Art	202
Economics and Business Administration	203
Education	212
Electrical Engineering	217
English	220
Fisheries	225
Forestry and Lumbering	227
Geology	231
German	235
History	237
Home Economics	241
Journalism	246
Law	248
Library Science	250
Mathematics	252
Mechanical Engineering	255
Metallurgy	261
Military Science and Tactics	258
Mining	263
Music	266
Nursing	271
Oriental History, Literature and Languages	272
Painting, Sculpture and Design	273
Pharmacy, Pharmaceutical Chemistry, Materia Medica and Food Chemistry	275
Philosophy	277
Physical Education and Hygiene	280
Physics	283
Physiology	301
Political Science	284
Psychology	287
Romanic Languages	289
Scandinavian Languages and Literature	293
Sociology	295
Zoology	299
SUMMER QUARTER	302
PUGET SOUND BIOLOGICAL STATION	305
EXTENSION SERVICE	308
BIBLIOGRAPHY	311
DEGREES CONFERRED, 1920	327
SCHOLARSHIPS AND PRIZES AWARDED, 1920	327
REGISTER OF STUDENTS	329
SUMMARY OF ENROLLMENT	380
INDEX	382

THE UNIVERSITY CALENDAR

1921-1922

AUTUMN QUARTER

Registration daysMonday and Tuesday, September 26 and 27
Instruction beginsWednesday, September 28
President's Annual Address Friday, September 30, 10 a. m.
Thanksgiving recess Wednesday, November 23, 6 p. m. to
Monday, November 28, 8 a. m.
Instruction ends Wednesday, December 21, 6 p. m.

WINTER QUARTER

Registration day..Wednesday, January 4, 8 to 12 a. m. and 1:30 to 5:30 p. m.
Instruction begins Thursday, January 5, 8 a. m.
Washington's Birthday, holiday Wednesday, February 22
Instruction endsWednesday, March 22, 6 p. m.

SPRING QUARTER

Registration day Tuesday, March 28, 8 to 12 a. m. and 1:30 to 5:30 p. m.
Instruction begins Wednesday, March 29, 8 a. m.
Campus Day.....Friday, April 21
Junior Day.....Saturday, May 27
Memorial Day, holidayTuesday, May 30
Instruction ends.....Friday, June 16, 6 p. m.
Class Day.....Saturday, June 17
Baccalaureate Sunday.....June 18
Commencement and Alumni Day Monday, June 19

SUMMER QUARTER

Registration day....Tuesday, June 20, 8 to 12 a. m. and 12:30 to 5:30 p. m.
Instruction begins.....Wednesday, June 21, 8 a. m.
Independence Day, holiday.....Tuesday, July 4
Instruction ends.....Wednesday, August 30, 6 p. m.

THE BOARD OF REGENTS

JOHN A. REA, President.....	Tacoma
Term ends March, 1922	
OSCAR A. FECHTER.....	Yakima
Term ends March, 1922	
WILLIAM A. SHANNON.....	Seattle
Term ends March, 1923	
RUTH KARR McKEE.....	Vancouver
Term ends March, 1923	
WINLOCK W. MILLER.....	Seattle
Term ends March, 1926	
WILLIAM T. PERKINS.....	Seattle
Term ends March, 1926	
WERNER A. RUPP.....	Aberdeen
Term ends March, 1927	
WILLIAM MARKHAM, Secretary to the Board	

COMMITTEES OF THE BOARD OF REGENTS

March 1921 to March 1922

AUDITING AND FINANCE—Perkins (chairman), Shannon, Fechter.	
BUILDINGS AND GROUNDS—Miller (chairman), Perkins, Shannon.	
COOPERATIONS—Shannon (chairman), Miller, Perkins.	
DEMONSTRATION FOREST—Perkins (chairman), Rupp, Fechter.	
EDUCATION—McKee (chairman), Fechter, Rupp.	
LANDS—Rupp (chairman), Miller, McKee.	
METROPOLITAN BUILDING Co.—Fechter (chairman), McKee, Miller.	
PUGET SOUND BIOLOGICAL STATION—Perkins (chairman), McKee, Rupp.	
RETIREMENTS AND ANNUITIES—Fechter (chairman), Miller, McKee.	
STUDENT WELFARE—Shannon (chairman), McKee, Perkins.	

OFFICERS OF ADMINISTRATION

THE UNIVERSITY

HENRY SUZZALLO, Ph. D., LL. D.....	President of the University Administration Hall
JOHN THOMAS CONDON, LL. M.....	Dean of Faculties Administration Hall
HERBERT THOMAS CONDON, LL. B.....	Comptroller Administration Hall
EDWARD NOBLE STONE, A. M.....	Registrar Administration Hall
EDWIN BICKNELL STEVENS, A. M.....	Executive Secretary Administration Hall
JAMES EDWARD GOULD, A. M.....	Dean of Men Administration Hall
ETHEL HUNLEY COLDWELL, A. M.....	Dean of Women Administration Hall
WILLIAM ELMER HENRY, A. M.....	Librarian Library
FRANK STEVENS HALL.....	Director of Museum Museum
JAMES GARFIELD FLETCHER, A. B.....	Vocational Secretary Administration Hall

THE COLLEGES AND SCHOOLS

DAVID THOMSON, B. A.....	Dean of the College of Liberal Arts Denny Hall
HENRY LANDES, A. M.....	Dean of the College of Science Science Hall
STEPHEN IVAN MILLER, LL. B., A. B.....	Dean of the College of Business Administration Commerce Hall
FREDERICK ELMER BOLTON, Ph. D....	Dean of the College of Education Home Economics Hall
CARL EDWARD MAGNUSSON, Ph. D.....	Dean of the College of Engineering Engineering Hall
IRVING MACKEY GLEN, A. M.	Dean of the College of Fine Arts Meany Hall
JOHN NATHAN COBB.....	Director of the College of Fisheries Fisheries Hall
HUGO WINKENWERDER, M. F.....	Dean of the College of Forestry Forestry Hall
MATTHEW LYLE SPENCER, Ph. D....	Director of the School of Journalism Commerce Hall
JOHN THOMAS CONDON, LL. M.....	Dean of the School of Law Commerce Hall
WILLIAM ELMER HENRY, A. M.....	Director of the Library School Library
MILNOR ROBERTS, A. B.....	Dean of the College of Mines Mines Hall
CHARLES WILLIS JOHNSON, Ph. C., Ph. D.....	Dean of the College of Pharmacy Bagley Hall
FREDERICK MORGAN PADELFORD, Ph. D....	Dean of the Graduate School Denny Hall

THE EXTENSION SERVICE

EDWIN AUGUSTUS START, A. M.....	Director Extension Hall and 1041 Henry Building
---------------------------------	----------------------------------------------------

OFFICERS OF ADMINISTRATION

9

OTHER ADMINISTRATIVE OFFICERS

LILLIAN BROWN GETTY, Secretary to the President.
MAX HIPEOE, Assistant Purchasing Agent.
WILLIAM BEACH JONES, A. B. Cashier.
AIMEE WILSON, Secretary to the Comptroller.
SADIE NORRIS MARK, A. B., Assistant Registrar.
BETH GILLEY, B. B. A., Secretary to the Registrar.
LOIS J. WENTWORTH, Secretary to the Dean of the Graduate School.
MAY WARD, A. B., Assistant Dean of Women.
SARA KAUFMANN PATTERSON, Assistant Dean of Women.

BUILDINGS AND GROUNDS

FREDERICK ELWELL, Superintendent.
SANDY MORROW KANE, Engineer.
L. R. KETTENRING, Electrician.
STANLEY O. CARPENTER, Head Carpenter.
GEORGE WARNER, Head Gardener

UNIVERSITY COMMONS AND RESIDENCE HALLS

RUTH MARGARET LUSBY, A. M. Supervisor of Dining Halls.

UNIVERSITY HEALTH SERVICE

DAVID CONNOLLY HALL, M. D., University Health Officer.
LILIAN COLLISON IRWIN, M. D., Medical Examiner for Women.
JOSEPHINE BROWNE, R. N., Public Health Nurse.
NELL BROWN, R. N., Resident Nurse.

STATE CHEMIST

CHARLES WILLIS JOHNSON, PH. C., PH. D., State Chemist.
JEAN ROBIN WILKES, B. S., Assistant State Chemist and Bacteriologist.
GEORGE HERBERT NEEDHAM, Assistant State Chemist.

ENGINEERING EXPERIMENT STATION

CARL EDWARD MAGNUSSON, PH. D. Director.

UNIVERSITY OF WASHINGTON STATION OF THE UNITED STATES FOREST SERVICE

CONRAD W. ZIMMERMAN, A. B., Engineer in Timber Tests, in charge.

UNITED STATES SHIPPING BOARD SCHOOLS

JAMES E. GOULD, A. M. in charge of Maritime Commerce.
PERCY HERBERT, 1st Officer, Merchant Marine, in charge of Navigation Courses.
E. F. HARWELL, B. S., 1st Officer, Merchant Marine, Associate in Maritime Commerce.
EVERETT O. EASTWOOD, A. M., C. E., in charge of Marine Engineering Classes.

UNITED STATES DEPARTMENT OF AGRICULTURE BUREAU OF PLANT INDUSTRY

JAMES THOMPSON, B. S., Specialist in charge of Medicinal Plants.

UNITED STATES GEOLOGICAL SURVEY

HENRY LANDES, A. M., State Geologist.

UNITED STATES BUREAU OF EDUCATION RESEARCH STATION

CLIFFORD WOODY, PH. D., Supervisor.
FEDERAL BOARD FOR VOCATIONAL EDUCATION
CLAUDE H. ANDERSON, A. B., LL. B., District Vocational Adviser.

¹ Absent 1920-21.

UNITED STATES ARMY RESERVE OFFICERS TRAINING CORPS

CHARLES LEONARD PHILLIPS, Colonel C. A. C., U. S. A., Professor of Military Science and Tactics.
 WILLIAM DAVID FRAZER, Major, C. A. C., U. S. A., Assistant Professor of Military Science and Tactics.
 EDWARD BENNETT DENNIS, Major, C. A. C., U. S. A., Assistant Professor of Military Science and Tactics.
 WILLIAM PLATT, Major, C. A. C., U. S. A., Assistant Professor of Military Science and Tactics.
 HENRY CLINTON KRESS MUHLENBERG, Major, A. S., U. S. A., Assistant Professor of Military Science and Tactics.
 EVAN KIRKPATRICK MEREDITH, Captain, Infantry U. S. A., Assistant Professor of Military Science and Tactics.
 Keith Sumner Gregory, Captain, Infantry, U. S. A., Assistant Professor of Military Science and Tactics.
 JAMES CAROLINE GUNN, Captain, Philippine Scouts, Retired, Assistant Professor of Military Science and Tactics.
 EARL THOMAS, First Sergeant, C. A. C.
 EUGENE MCGINLEY, First Sergeant, C. A. C.
 HARRY B. WHITE, Staff Sergeant, A. S.
 WALTER LANG, Sergeant, C. A. C.
 CHARLES BOYLE, Sergeant, Infantry.
 RAY A. BAILEY, Sergeant, C. A. C.
 NELS A. TORNUST, Sergeant, Q. M. C., Retired.
 EDWARD R. ROGERS, Sergeant, C. A. C.
 LESTER A. KENT, Sergeant, Infantry.
 CLYDE W. LINTON, Sergeant, C. A. C.
 WILLIAM G. PALMS, Sergeant, Infantry.
 JAMES E. AARON, Sergeant, Infantry.
 HARRY BECKETT, Sergeant, Infantry.
 EMIL H. WUNDERLICH, Quartermaster Sergeant, U. S. A.
 ARTHUR T. HENSCHER, Private, First Class, C. A. C.
 HENRY SKIDMORE, Private, First Class, C. A. C.
 VERNON W. PAYNE, Private, First Class, A. S.

NORTHWEST EXPERIMENT STATION UNITED STATES BUREAU OF MINES

OLIVER C. RALSTON, Superintendent.
 JAMES H. ROBINSON, Principal Clerk.
 HEWITT WILSON, Ceramist.
 CLYDE E. WILLIAMS, Metallurgist.
 ALBERT L. BENNETT, Junior Analytical Chemist.
 BYRON M. BIRD, Junior Mining Engineer.
 JOHN H. THOMPSON, Junior Fuel Chemist.
 EARL R. McMILLAN, Assistant Mining Engineer.
 ISADORE ROSEN, Ceramic Assistant.
 JOHN G. SCHONING, Foreman Miner.
 EDD E. SMITH, Mechanician.

LIBRARY STAFF

WILLIAM ELMER HENRY, A. M., (Indiana); Librarian and Director of the Library School.
 CHARLES WESLEY SMITH, A. B., B. L. S. (Illinois); Reference Librarian and Associate Professor of Library Economy.
 EMMA PEARL McDONNELL, A. B. (Washington); Periodicals Librarian.
 EVELYN MAY BLODGETT, A. B. (Vassar); Pratt Institute Library School. Order and Accession Librarian.
 ROBINSON SPENCER, A. B. (Wesleyan), B. L. S. (Illinois); Catalogue Librarian and Instructor in Library Economy.
 ELLEN F. HOWE, A. B. (Washington), (Carnegie Library School); Assistant Reference Librarian and Instructor in Library Economy.
 LYDIA McCUTCHEEN, A. B., (Iowa), (Washington Library School); Assistant Reference Librarian.
 EDNA WHITE, A. B. (Knox); (Illinois Library School), Circulation Librarian.
 BARBARA MABEL BOLLES, A. B. (Boston), B. S. (Simmons); First Assistant Cataloguer.
 FLORA BELLE LUDINGTON, A. B. (Washington); Assistant in Circulation.
 MARIE ALPHONSO, A. B., (Nebraska), Second Assistant in Circulation.

THE MUSEUM

FRANK STEVENS HALL, Director of the Museum.
 CLARENCE JOHN ALBRECHT, A. B. (Iowa); Curator of Zoological Exhibits.
 SAMUEL F. RATHBUN, Honorary Curator of Birds.
 MARTHA FLAHAUT, A. B. Assistant.

UNIVERSITY FACULTY

In this list the names of the faculty are arranged in six groups—professors, associate professors, assistant professors, associates, lecturers, and instructors—followed by the names of the teaching fellows and assistants. In each of the six groups the names occur in the order of academic seniority. An alphabetical list of the faculty is given on pages 14-21.

HENRY SUZZALLO, President of the University, *ex-officio* Chairman.
EDWARD NOBLE STONE, Registrar, *ex-officio*, Secretary.

PROFESSORS

HENRY LANDES
EDMOND STEPHEN MEANT
J. ALLEN SMITH
CAROLINE HAVEN OBER
JOHN THOMAS CONDON
TREVOR KINCAID
FREDERICK MORGAN PADELFORD
MILNOR ROBERTS
WILLIAM SAVERY
FREDERICK ARTHUR OSBORN
DAVID THOMSON
CHARLES WILLIS JOHNSON
PIERRE JOSEPH FREIN
THEODORE CHRISTIAN FRYE
ROBERT EDOUARD MORITZ
CARL EDWARD MAGNUSSON
HARVEY LANTZ
EVERETT OWEN EASTWOOD
WILLIAM ELMER HENRY
DAVID CONNOLLY HALL
HERBERT HENRY GOWEN
OLIVER HUNTINGTON RICHARDSON
IVAN WILBUR GOODNER
IRVING MACKEY GLEN
EDWIN AUGUSTUS START
CHARLES CHURCH MORE
HENRY KREITZER BENSON

JOHN WEINZIERL
HUGO WINKENWERDER
VERNON LOUIS PARRINGTON
FREDERICK ELMER BOLTON
EDWIN JOHN VICKNER
EFFIE ISABEL RAITT
WILLIAM FRANKLIN ALLISON
STEVENSON SMITH
WILLIAM PIERCE GORSUCH
CLARK PRESCOTT BISSETT
ETHEL HUNLEY COLDWELL
ALLEN ROGERS BENHAM
LESLIE JAMES AYER
STEPHEN IVAN MILLER, JR.
*RICHARD FREDERICK SCHOLZ
FRED CARLETON AYER
JOHN NATHAN COBB
CHARLES LEONARD PHILLIPS
WILLIAM MAURICE DEHN
HOWARD WOOLSTON
MATTHEW LYLE SPENCER
GEORGE MCPHAIL SMITH
BURT PERSONS KIRKLAND
THOMAS KIRLER
HOWARD THOMPSON LEWIS
CLIFFORD WOODY
*JAMES EDWARD GOULD

ASSOCIATE PROFESSORS

LOREN DOUGLAS MILLIMAN
SAMUEL LATIMER BOOTHROYD
THOMAS KAY SIDET
EDWARD McMAHON
CHARLES WESLEY SMITH
ARTHUR WILSON LINTON
GEORGE SAMUEL WILSON
*GEORGE WALLACE UMPHREY
OTTO PATZER
CHARLES WILLIAM HARRIS
VANDERVEER CUSTIS
EDGAR ALLEN LOEW
JOSEPH DANIELS
*CHARLES EDWIN WEAVER
EDWARD GODFREY COX
ALLEN FULLER CARPENTER

HENRY LOUIS BRAKEL
GEORGE BURTON RIGG
CARL GOULD
WILLIAM DANIEL MORIARTY
HARRY EDWIN SMITH
ARTHUR MELVIN WINSLOW
HARRY RUBEY
JOHN LOCKE WORCESTER
GEORGE CHARLES EMBODY
ELIAS TREAT CLARK
WILLIAM EDWARD COX
GEORGE EARL FREELAND
HOWARD HALL PRESTON
CHARLES GOGGIO
RODERICK DUNCAN McKENZIE

ASSISTANT PROFESSORS

EDWIN JAMES SAUNDERS
GEORGE IRVING GAVETT
ROBERT MAX GARRETT
ELI VICTOR SMITH
HARVEY BRUCE DENSMORE
CLARENCE RAYMOND COREY
GRACE GOLDENA DENNY
FRED WASHINGTON KENNEDY

ERNEST OTTO ECKELMAN
CHARLES LOUIS HELMLINGE
JOHN WILLIAM HOTSON
THERESA SCHMID McMAHON
LOUIS IRVING NEIKIRK
FRANCES DICKEY
MORITZ ROSEN
ALBERT FRANZ VENINO

¹Absent on leave 1920-1921.

²Resigned March 31, 1921.

³Appointed April 1, 1921.

⁴Absent on leave Autumn Quarter.

SAMUEL HERBERT ANDERSON
 FRIEDRICH KURT KIRSTEN
 SERENO BURTON CLARK
 MACY MILLMORE SKINNER
 CURT JOHN DUCASSE
 ERIC TEMPLE BELL
 BROR LEONARD GRONDAL
 *LUIS SANTANDER
 FRED HARVEY HEATH
 VICTOR LOVETT OAKES CHITTICK
 *LESLIE FORREST CURTIS
 GEORGE HENRY JENSEN
 HERMAN VANCE TARTAR
 EDWIN RAY GUTHRIE
 FRANK DEMETRIUS HAYDEN
 CARL PAIGE WOOD
 ROY MARTIN WINGER
 EVAN KIRKPATRICK MEREDITH
 THOMAS GORDON THOMPSON
 DELBERT NICKSON
 VIRGINIA CUNNINGHAM PATTY
 ELISABETH AMEY
 HEWITT WILSON
 MARY EMMA GROSS

WILLIAM FRAZER
 IRA LEONARD COLLIER
 *RALPH DROZ CASSEY
 GEORGE EDWARD GOODSPEED
 CARL SPENCER DAKAN
 CHARLES CULBERTSON MAY
 JOHN CHARLES RATHBUN
 CURTIS TALMAGE WILLIAMS
 ROBERT HASTINGS PALMER
 ELDIN VERNE LYNN
 JOSEPH BARLOW HARRISON
 RUDOLF HERBERT ERNST
 ROBERT WILLIAM JONES
 MARTHA KOEHN
 JAMES GEORGE ARBUTHNOT
 HORACE GUNTHERP
 PAUL WASHINGTON TERRY
 KEITH SUMNER GREGORY
 LOUIS PETER DE VRIES
 EDWARD BENNETT DENNIS
 WILLIAM PLATT
 HENRY CLINTON MUHLENBERG
 JAMES CAROLINE GUNN
 SIDNEY DEBBY MAIZE

LECTURERS AND ASSOCIATES

HARVEY GLENN
 FREDERICK POWELL
 CORNELIUS OSSEWARD
 CONRAD ZIMMERMAN
 LILLIAN COLLISON IRWIN
 LILLIAN BLOOM
 WINNIFRED SUNDERLIN HAGGETT
 CLARENCE JOHN ALBRECHT
 MILDRED STRUBBS
 JOHN VICTOR FARRAR
 JAMES WEHN
 EUGENIA WORMAN
 HERMANCIE MULLENHEISTER
 FRED FALCONER WELD
 AMBROSE PATTERSON
 ETHEL SANDERSON RADFORD
 MARJORIE WHIPPLE
 JAMES MCCONAHEY
 WILLIAM BENNETT HENDERSON
 EMUEL JACOB FORMAN
 CHAUNCEY WERNECKE
 EDWIN LEONARD STRANDBERG
 PAMELIA JONES
 SYLVIA KERRIGAN
 DOROTHY THOMAS

GERTRUDE BROWNING
 ALICE HENSON ERNST
 BERTHA ALMEN VICKNER
 EBBA DAHLIN
 EARL WEST
 WILLIAM ALBERT HAMILTON
 JANE BURNS ALBERT
 EDNA CHITTICK
 ELIZABETH SOULE
 HERBERT PHILLIPS
 HELEN MACKINNON
 CLARENCE EDMUNDSON
 LEONARD ALLISON
 EDWARD LEADER
 WILBER PATCHIN
 JEANNE MERCIER
 ALMIRA BONHAM
 CARL ZENO DRAVES
 WALDO SEMON
 OLIVE CLINTON McCABE
 WAYNE BUTTERBAUGH
 PAUL MORGAN GUSTIN
 ALONZO VICTOR LEWIS
 IRENE EWING DAVIS
 ELIZABETH WRIGHT

INSTRUCTORS

SAMUEL THOMAS BEATTIE
 SANDY MORROW KANE
 WALTER BELL WHITTLESEY
 LLOYD LEROY SMAIL
 FRANK JOSEPH LAUBE
 JOSEPH GRATTAN O'BRYAN
 HAROLD OGDEN SEXSMITH
 ALLETTA GILLETTE
 ALBERT PORTER ADAMS
 LOUISE VAN OGLE
 MAX PATTEN PHILBRICK
 ANNETTE EDENS
 ROBERT FULTON MCCLELLAND
 JAMES BAKER HAMILTON
 GORDON RUSSELL SHUCK
 MARTHA DRESSLAR
 FOREST JACKSON GOODRICH
 ARTHUR WILLIS BARTON
 CLINTON LOUIS UTERBACK
 MILDRED LEMON
 ROBINSON SPENCER
 ELLEN HOWE

CLARENCE LOUIS ANDERSON
 RALPH MASON BLAKE
 GEORGE KIRCHNER
 WILLIAM RONALD WILSON
 HARRY JOHN MCINTYRE
 JOSEPH TAYLOR
 EDMOND CLARENCE MILLER
 JOHN HOWARD THOMPSON
 ROBERT QUIKORE BROWN
 ELWOOD MORTON WILBUR
 HOMER EWART GREGORY
 CHRIS GREENSIDE DOBSON
 FOREST CHARLES DANA
 LOU EASTWOOD ANDERSON
 ELEANOR CAMPBELL
 EILENE FRENCH
 GLENN ARTHUR HUGHES
 KARL ELIAS LEIB
 RUTH MARGARET LUSBY
 FREDERICK ANSTEN McMILLIN
 FRANK ARTHUR PATTY
 WILLARD HENRY RILEY

* Died October 19, 1920.

* Absent on leave 1920-1921.

GEORGE WHITWELL
 SARGENT POWELL
 HENRY STAGER
 HERBERT ARTHUR STURGES
 OSCAR ELDRIDGE DRAPER
 JOHN GERALD DRISCOLL, JR.,
 MATRICE HICKLIN
 ELLA JANE SINGINSON
 WILLIAM WOODBRIDGE EDDY
 BYRON TOWNE MOLINN
 ROBERT HAROLD EDMONDS

GINO VINCENT MEDICI DE SOLENNI
 VON VALJEAN TARBILL
 ALBERT KALIN
 LESLIE SPIER
 GEORGE LIBLE HOARD
 CLARENCE LESTER WHITE
 ELGIN ROSCOE WILCOX
 CHARLES GUSTAV STRUBE
 JACK RODERICK TOLMAN
 JAMES LAND ELLIS

ASSISTANTS, TEACHING AND RESEARCH FELLOWS

LOUISE DOW BENTON, B. M., Assistant in Music.
 ANNA BOISTELL, Assistant in Physical Education.
 CONSTANCE OLDS BURNHAM, A. B., Assistant in English.
 CLYDE MYRON CRAMLETT, M. S., Assistant in Mathematics.
 ELMA DICK, Accompanist and Assistant in Music.
 FRED DOWNING, B. S., Assistant in Mechanical Engineering.
 PAUL ELLSWORTH, A. B., Assistant in Business Administration.
 HELEN FERRYMAN, B. M., Assistant in Music.
 BLAINE GIBSON, Assistant in Physical Education.
 HELEN HADLEY, A. B., Assistant in English.
 RACHEL ELIZABETH HAMILTON, B. L., Assistant in French.
 MARION HERBERT, B. S., Assistant in Physics.
 PAUL HIGGS, B. S., Demonstrator in Physics.
 HAROLD HOTELLING, A. B., Assistant in Mathematics.
 AGNES JACOBSON, Assistant in Nursing and Public Health.
 EDWARD MILTON LITTLE, B. S., Assistant in Physics.
 BETH McCausland, A. B., Assistant in English.
 JAMES MCCONAHEY, Assistant in Business Administration.
 HORACE DONALD MCGIRR, B. BA., Assistant in Economics.
 LESLIE MARCHELAND, Assistant in English.
 RUTH PATTY, A. B., Assistant in Pharmacy.
 KENT RATCLIFFE, B. BA., Assistant in Business Administration.
 JAMES RUNOHEY, Assistant in Golf.
 ELLA MARIA SICKELS, A. B., Assistant in English.
 ELIZABETH STARR, B. S., Assistant in Bacteriology.
 ANNA ALFIDA STORM, Assistant in Design.
 CLAYTON SULLIVAN, Assistant in Mechanical Engineering.
 HAROLD TURPIN, Assistant in Business Administration.
 MYRON HENRY WETZEL, Assistant in Shopwork.
 MADGE WILKINSON, M. S., Assistant, Gatzert Foundation.
 FLORENCE BERGH WILSON, B. M., Assistant in Music.
 FREDERICK WOODBRIDGE, Assistant in Business Administration.
 HAROLD YOUNG, A. B., Lecture Assistant in Chemistry.

HELEN ANDERSGOOD, A. B., Teaching Fellow in English.
 MYRTLE CULMER BARRY, A. B., Teaching Fellow in Botany.
 ELEAN CLAGUE, A. B., Teaching Fellow in Political Science.
 ELVA CLAUSEN, A. B., Teaching Fellow in Psychology.
 MERTELLE DAVIS, A. M., Teaching Fellow in French.
 JULIA FISHER, A. B., Teaching Fellow in Philosophy.
 OLIVE REEVES FOSTER, A. B., Teaching Fellow in French.
 LENA HARTOG, B. S., Teaching Fellow in Botany.
 GRACE HOWARD, A. B., Teaching Fellow in Botany.
 ANDERSON HUBBARD, B. E., Teaching Fellow in Zoology.
 GRETRUDE KRAFFT, A. B., Teaching Fellow in German.
 OLIVE KUNTZ, A. B., Teaching Fellow in History.
 MARJORY MCKILLIP, A. B., Teaching Fellow in French.
 WILLIAM CAVANAUGH MCINDOE, B. S., Teaching Fellow in Physics.
 KIRSTEN LARSEN NEWBERRY, B. S., Teaching Fellow in Physics.
 STEELE LINDSEY, A. B., Teaching Fellow in English.
 JOSEPHINE NORLING, B. S., Teaching Fellow in Psychology.
 ECHO PEPPER, B. S., Teaching Fellow in Mathematics.
 GEORGE SARTORIS, B. S., Teaching Fellow in Botany.
 DENNIS TROTH, B. Ed., Teaching Fellow in Education.
 HELEN WORBY, B. S., Teaching Fellow in Zoology.

ARVID ANDERSON, B. S., Fellow in Metallurgy.
 JAMES BONNER, B. S., Fellow in Metallurgy.
 ERNEST GOODNER, B. S., Fellow in Ceramics.

ALPHABETICAL LIST OF THE UNIVERSITY FACULTY

- HENRY SUZZALLO**, President of the University.
A. B., Stanford, 1899; A. M., Columbia, 1902; Ph. D., 1905; LL. D., California 1918.
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- ALBERT PORTER ADAMS**, Instructor in Music.
- JANE BURNS ALBERT**, Associate in Singing.
- LEONARD ALLISON**, Associate in Physical Education.
B. S., Carleton College.
- WILLIAM FRANKLIN ALLISON**, Professor of Municipal and Highway Engineering.
B. S., South Dakota State College, 1895; B. S., (C. E.), Purdue 1897; C. E., Cornell 1904.
- ELISABETH AMERY**, Assistant Professor of Home Economics.
B. S. Wisconsin, 1913.
- CLARENCE LOUIS ANDERSON**, Instructor in Fisheries.
B. S., Washington, 1917.
- LOU EASTWOOD ANDERSON**, Acting Instructor in Physical Education.
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- SAMUEL HERBERT ANDERSON**, Assistant Professor of Physics.
A. B., Park College, 1902; A. M., 1903; Ph. D., Illinois, 1912.
- JAMES ARBUTHNOT**, Assistant Professor of Physical Education for Men.
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B. S., Upper Iowa University, 1902; M. S., Georgetown University, 1905; Ph. D., Chicago, 1915.
- LESLIE JAMES AYER**, Professor of Law.
B. S., Upper Iowa University, 1899; J. D., Chicago, 1906.
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B. S., Wisconsin, 1893; M. S., 1896; Ph. D., Clark, 1898.
- ALMIRA BONHAM**, Associate in Spanish, (autumn and winter quarters).
B. L., California, 1901.
- SAMUEL LATIMER BOOTHROYD**, Associate Professor of Astronomy.
B. S., Colorado Agricultural College., 1893; M. S., 1904.
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B. A., Olivet, 1902; A. M., Washington, 1905; Ph. D., Cornell, 1912.
- ROBERT QUIKOTE BROWN**, Instructor in Civil Engineering.
B. S., (E. E.) Washington, 1916.
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A. B., Cornell, 1910; A. M., Columbia, 1914.
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A. B., Pennsylvania, 1915.
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A. B. Hastings, 1901; A. M., Nebraska, 1909; Ph. D., Chicago, 1913.
- RALPH DROZ CASEY**, Assistant Professor of Journalism.
A. B., Washington, 1913.
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B. L. Mills College, 1894; A. M., Stanford, 1899.
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LL. B., Michigan, 1891; LL. M., Northwestern, 1892.
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A. B., Wabash, 1899; A. M., Cornell, 1901; Ph. D., 1906.
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A. B., Texas, 1909; A. M., 1910.
- LESLIE FORREST CURTIS, Assistant Professor of Electrical Engineering.
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A. B., Harvard, 1901; A. M., 1902; Ph. D., 1905.
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A. B., Hope, 1893; A. M., 1896; Ph. D., Illinois, 1903.
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B. S., Case School of Applied Science, 1907; LL. B., Cleveland Law School, 1910.
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A. B., Oxford, 1907.
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Graduate, Iowa State Teachers College, 1901; B. S., Columbia, 1912; A. M., 1913.
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E. M., Montana, 1913.
- OSCAR ELDRIDGE DRAFER, Instructor in Business Administration.
M. Acct., Vorles Business College.
- CARL ZENO DRAVES, Associate in Chemistry.
B. S., (C. E.), Washington, 1917.
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B. A., Southern California, 1913; B. S., Washington, 1917; M. S., Teachers College, Columbia, 1918.
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A. B., Stanford, 1918; LL. B., 1920.
- CURT JOHN DUCASSE, Assistant Professor of Philosophy.
A. B., Washington, 1908; A. M., 1909; Ph. D., Harvard, 1912.
- EVERETT OWEN EASTWOOD, Professor of Mechanical Engineering.
C. E., Virginia, 1896; A. B., 1897; A. M., 1899; S. B., Massachusetts Institute of Technology, 1902.
- ERNEST OTTO ECKELMAN, Assistant Professor of German.
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- WILLIAM WOODBRIDGE EDDY, Instructor in History.
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B. S., Idaho, 1910.

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B. S., Colgate, 1900. (Autumn.).
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B. Mus., Washington, 1916, A. M., Columbia, 1920.
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- IVAN WILBUR GOODNER, Professor of Law.
LL. B., Nebraska, 1897.
- FOREST JACKSON GOODRICH, Instructor in Pharmacy.
Ph. C., Washington, 1913; B. S., 1914; M. S., 1917.
- GEORGE EDWARD GOODSPEED, JR., Assistant Professor of Geology.
B. S., (Min. E.), Massachusetts Institute of Technology, 1910.
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A. B., Knox, 1898.
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A. B., Harvard, 1898.
- JAMES EDWARD GOULD, Professor of Maritime Commerce and Dean of Men.
B. Ph., Washington, 1896; B. Pd., 1898; M. A., Harvard, 1907.
- HERBERT HENRY GOWEN, Professor of Oriental History, Literature and Institutions.
St. Augustine's College (Canterbury); D. D., Whitman College, 1912.
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Graduate, U. S. Military Academy, 1903.
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A. B., Bethany (Kansas), 1910; M. S. F., Washington, 1913.
- MARY EMMA GROSS, Assistant Professor of Physical Education for Women.
A. B., Goucher College, 1912; A. M., Columbia, 1915.
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Ph. B., Hamline, 1905; A. B., Stanford, 1909; A. M., Kansas, 1912.
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A. B., Nebraska, 1907; A. M., 1910; Ph. D., Pennsylvania, 1912.
- WINNIFRED SUNDERLIN HACKETT, Associate in English.
A. B., Olivet, 1897; A. M., Michigan, 1898.
- DAVID CONNOLLY HALL, University Health Officer and Professor of Hygiene.
Ph. B., Brown, 1901; Sc. M. Chicago, 1903; M. D., Rush Medical College, 1907.

- JAMES BAKER HAMILTON, Instructor in Civil Engineering.
Washington.
- WILLIAM ALBERT HAMILTON, Associate in Mathematics.
A. B., College of City of New York, 1901; A. B., Cornell, 1902.
- CHARLES WILLIAM HARRIS, Associate Professor of Civil Engineering.
B. S., (C. E.), Washington, 1903; C. E., Cornell, 1905.
- JOSEPH BARLOW HARRISON, Assistant Professor in English.
A. B., Washington, 1910; A. B., Oxford, 1913.
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B. S., (C. E.), Massachusetts Institute of Technology, 1902.
- FRED HARVEY HEATH, Assistant Professor of Chemistry.
B. S., New Hampshire, 1905; Ph. D., Yale, 1909.
- CHARLES LOUIS HELMINGE, Assistant Professor of Romanic Languages.
B. Ph., Wallace College (Ohio), 1911; A. M., Washington, 1916.
- WILLIAM BENNETT HENDERSON, Extension Lecturer on Foreign Trade.
- WILLIAM ELMER HENRY, Librarian and Director of the Library School.
A. B., Indiana, 1891; A. M., 1892.
- MAURICE HICKLIN, Instructor in Journalism.
A. B., Missouri, 1909; B. J., 1913.
- GEORGE Lisle HOARD, Instructor in Electrical Engineering.
B. S., (E. E.), Washington, 1917.
- JOHN WILLIAM HOTSON, Assistant Professor of Botany.
A. B., McMaster, 1901; A. M., 1902; Ph. D., Harvard, 1913.
- ELLEN FORD HOWE, Assistant Reference Librarian and Instructor in Library Economy.
A. B., Washington, 1911; Carnegie Library School.
- GLENN ARTHUR HUGHES, Instructor in Dramatic Art.
A. B., Stanford, 1916; A. M., Washington, 1920.
- LILIAN IRWIN, Lecturer on Physical Education for Women.
M. D., Cooper Medical College, 1898.
- GEORGE HENRY JENSEN, Assistant Professor of Vocational Education and Supervisor of Teacher Training in the Trades and Industries.
B. S., Valparaiso, 1906.
- CHARLES WILLIS JOHNSON, Professor of Pharmaceutical Chemistry and Dean of the College of Pharmacy.
Ph. C., Michigan, 1896; B. S., 1900; Ph. D., 1903.
- PAMELLA PEARL JONES, Associate in English.
A. B., Iowa, 1906; A. M., 1908.
- ROBERT WILLIAM JONES, Assistant Professor of Journalism.
A. B., Missouri, 1906; LL. B., 1913; A. M., South Dakota, 1918.
- ALBERT KALIN, Instructor in Electrical Engineering.
B. S., Washington, 1919;
- SANDY MORROW KANE, Instructor in Metalwork.
- FRED WASHINGTON KENNEDY, Assistant Professor and Director of the Journalism Laboratories.
- SYLVIA FINLAY KERRIGAN, Associate in English.
A. B., Washington, 1919.
- THOMAS LATIMER KIBLEE, Professor of Transportation.
A. B., Randolph Macon, 1904; A. M., George Washington, 1909; Ph. D., 1913.
- TREVOR KINCAID, Professor of Zoology.
B. S., Washington, 1899; A. M., 1901.
- GEORGE KIRCHNER, Instructor in Music.
Leipzig.
- BURT PERSONS KIRKLAND, Professor of Forestry.
A. B., Cornell, 1905.
- FREDRICH KURT KIRSTEN, Assistant Professor of Electrical Engineering.
B. S., Washington, 1909; E. B., 1914.
- MARTHA KOEHN, Assistant Professor of Home Economics.
A. B., Ohio State University, 1908; A. M., 1910.
- HENRY LANDES, Professor of Geology and Mineralogy and Dean of the College of Science.
A. B., Indiana, 1892; A. B., Harvard, 1892; A. M., 1893.
- HARVEY LANTZ,, Professor of Law.
Ph. B., De Pauw, 1888; A. M., 1891; LL. B., Kent Law School, 1893.
- FRANK JOSEPH LAUBE, Instructor in Economics.
A. B., Wisconsin, 1899; A. M., Washington, 1913.
- EDWARD OSCAR LEADER, Associate in Physical Education.
LL. B., Washington, 1916.
- KARL ELIAS LEIB, Instructor in Business Administration.
A. B., Stanford, 1916.
- MILDRED LEMON, Instructor in Physical Education and Hygiene.
A. B., California, 1918.

- ALONZO VICTOR LEWIS, Extension Lecturer on Fine Arts.
- HOWARD THOMPSON LEWIS, Professor of Business Administration.
A. B., Lawrence College, 1910; A. M., Wisconsin, 1911.
- ARTHUR WILSON LINTON, Associate Professor of Pharmacy.
Ph. G., Highland Park, 1902; B. S., Michigan, 1909; M. S., Washington, 1915.
- EDGAR ALLEN LOEW, Associate Professor of Electrical Engineering.
B. S., (E. E.), Wisconsin, 1906.
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B. S., Washington, 1918; A. M., Columbia, 1920.
- ELDIN VERNB LYNN, Assistant Professor of Pharmacy.
A. B., Washington, 1909; A. M., Wisconsin, 1910; Ph. D., 1918.
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A. B., Wellesley, 1917.
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A. B., Wellesley, 1909.
- ROBERT FULTON MCCLELLAND, Instructor in Architecture.
Massachusetts Institute of Technology.
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B. S. Washington and Jefferson, 1896; M. S., 1899; LL. B. Northwestern, 1899.
- HARRY JOHN MCINTYRE, Instructor in Mechanical Engineering.
B. S., (M. E.), Washington, 1915.
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A. B., Manitoba, 1912; Ph. D., Chicago, 1920.
- EDWARD MCMAHON, Associate Professor of American History.
Ph. B., Washington, 1898; A. M., Wisconsin, 1907.
- THERESA SCHMID MCMAHON, Assistant Professor of Economics.
A. B., Washington, 1899; A. M., 1901; Ph. D., Wisconsin, 1909.
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- BRYAN TOWNE McMINN, Instructor in Mechanical Engineering.
B. S., Oregon Agricultural College, 1918.
- CARL EDWARD MAGNUSSON, Professor of Electrical Engineering and Dean of the College of Engineering.
B. B. E., Minnesota, 1896; M. S., 1897; E. E., 1905; Ph. D., Wisconsin, 1900.
- SIDNEY DERBY MAIZE, Major, U. S. A., Assistant Professor of Military Science and Tactics.
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B. S., (C. E.), Washington, 1910.
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B. S., Washington, 1885; M. S., 1899; M. L., Wisconsin, 1901.
- GINO VINCENT MEDICI DE SOLENNI, Instructor in Romanic Languages.
A. B., Ohio State University, 1914; A. M., 1915.
- JEANNE ANNIE MERCIER, Associate in French.
B. S., Whitman, 1920.
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Stanford University.
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B. S., (E. E.), Washington, 1916.
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LL. B., Michigan, 1896; A. B., Stanford, 1898.
- LOREN DOUGLAS MILLIMAN, Associate Professor of English.
A. B., Michigan, 1890.
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C. E., Lafayette, 1898; M. C. E., Cornell, 1899; M. S., Lafayette, 1901.
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A. B., Michigan, 1904; A. M., 1905; Ph. D., 1909.
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B. S., Hastings, 1892; Ph. M., Chicago, 1896; Ph. D., Nebraska, 1901; Ph. N.D., Universitaet Strassburg, 1902.
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Graduate, U. S. Military Academy, 1908.
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Phil. Cand. Royal University of Utrecht, Holland, 1910; Ph. D. 1913.
- LEWIS IRVING NEIKIRK, Assistant Professor of Mathematics.
B. S., Colorado, 1898; M. S., 1901; Ph. D., Pennsylvania, 1903.
- DELBERT NICKSON, Assistant Professor of Pathology.
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- CAROLINE HAVEN OBER, Professor of Spanish.
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Ph. B., Michigan, 1896; Ph. D., 1907.
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A. B., Colby, 1896; A. M., 1899; Ph. D., Yale, 1899.
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A. B., Adrian College, 1906; A. M., Utah, 1909; J. D., Chicago, 1912; Ph. D., Stanford, 1920.
- VERNON LOUIS PARRINGTON, Professor of English.
A. B., Harvard, 1893; A. M. Emporia, 1895.
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A. B., Nebraska State Normal College, 1918; B. Ed., Washington, 1918.
- AMBROSE PATTERSON, Associate in Fine Arts.
Melbourne National Gallery, Victoria, Australia;
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- FRANK ARTHUR PATTY, Instructor in Pharmacy.
B. S., Kansas, 1920.
- VIRGINIA CUNNINGHAM PATTY, Assistant Professor of Home Economics.
Industrial Institute and College, Columbus, Mo.
Shugualak College, Miss.; Teachers College, Columbia.
- OTTO PATZER, Associate Professor of French.
B. L., Wisconsin, 1898; M. L., 1899; Ph. D., 1907.
- MAX PATTEN PHILBRICK, Instructor in Romanic Languages.
A. B., Colby College, 1902.
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A. B., Colby, 1878; graduate, U. S. Military Academy, West Point, 1881; C. E., Maine, 1888; graduate, Coast Artillery School, 1890.
- WILLIAM PLATT, Major, C. A. C., U. S. A., Assistant Professor of Military Science and Tactics.
Graduate, U. S. Military Academy, 1901.
- FREDERICK POWELL, Lecturer on Gold Dredging.
E. M., Columbia.
- SARGENT POWELL, Associate in Chemistry.
B. S., M. S., Washington, 1916; Ph. D., Illinois, 1919.
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B. S., Coe, 1911; A. M., Iowa, 1914; Ph. D., 1920.
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A. B., McGill, 1895.
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A. B., Washington, 1903; A. M., 1904; B. S., 1908; C. E., 1909.
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B. S., (C. E.), Illinois, 1905.
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B. S., Ph. B., University of Santiago, Chile, 1894; LL. B., 1898; Licenciata in Laws, 1899.
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B. A., Toronto, 1896; A. M., Harvard, 1907.
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A. B., Wisconsin, 1902; A. M., 1903; Ph. D., 1911.

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B. S., Washington, 1920.
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Armour Institute of Technology; Chicago Art Institute.
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E. E. Minnesota, 1906.
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A. B., De Pauw, 1906; Ph. D., Cornell, 1912.
- STEVENSON SMITH, Professor of Psychology.
A. B., Pennsylvania, 1904; Ph. D., 1909.
- ELIZABETH S. SOULE, Associate in Nursing and Public Health, (winter and Spring quarters).
Graduate, Malden, Massachusetts, Hospital School of Nursing, 1907.
- MATTHEW LYLE SPENCER, Professor of Journalism and Director of the School of Journalism.
A. B., Kentucky Wesleyan, 1903; A. M., 1904; A. M., Northwestern, 1905; Ph. D., Chicago, 1910.
- ROBINSON SPENCER, Catalogue Librarian and Instructor in Library Economy.
A. B., Wesleyan University, 1903; B. L. S., Illinois, 1918.
- LESLIE SPIER, Instructor in Anthropology.
B. S., College of City of New York. 1915; Ph. D., Columbia, 1920.
- HENRY WALTER STAGER, Instructor in Mathematics.
A. B., Stanford, 1902; A. M., 1906; Ph. D., California, 1909.
- EDWIN AUGUSTUS START, Director of the Extension Service.
A. B., Tufts, 1884; A. M., Harvard, 1893.
- EDWIN LEONARD STRANDBERG, Associate in Civil Engineering. (winter quarter)
B. S., (C. E.), Washington, 1912.
- CHARLES GUSTAV STRUBE, Acting Instructor in Mechanical Engineering. (winter quarter)
B. S., (M. E.), Washington, 1920.
- MILDRED STRUBLE, Associate in English.
A. B., Washington. 1916; A. M., 1920.
- HERBERT ARTHUR STURGIS, Instructor in Sociology.
A. B., Oberlin, 1904; A. M., 1905.
- VON VALJEAN TARBILL, Instructor in Business Administration.
B. S., Ohio Wesleyan, 1912; M. B. A., Harvard, 1919.
- HERMAN VANCE TARTAR, Assistant Professor of Chemistry.
B. S., Oregon Agricultural College, 1902; Ph. D., Chicago, 1920.
- JOSEPH MARION TAYLOR, Acting Instructor in Mathematics.
M. S., Adrian, 1886.
- PAUL WASHINGTON TERRY, Assistant Professor of Education.
B. S., Vanderbilt, 1909; M. A., Columbia, 1915; Ph. D., Chicago, 1920.
- DOROTHY THOMAS, Associate in English. (autumn and winter quarters)
A. B., Washington, 1919.
- JOHN HOWARD THOMPSON, Acting Instructor in Civil Engineering.
B. S., (Met.), Washington, 1919.
- THOMAS GORDON THOMPSON, Assistant Professor of Chemistry.
A. B., Clark, 1914; M. S., Washington, 1915; Ph. D., 1918.
- DAVID THOMSON, Professor of Latin and Dean of the College of Liberal Arts.
B. A., Toronto, 1892.
- JACK RODERICK TOLMIE, Instructor in Electrical Engineering. (spring quarter)
B. S., (E. E.), Washington.
- GEORGE WALLACE UMPHREY, Associate Professor of Romanic Languages.
B. A., Toronto, 1899; A. M., Harvard., 1901; Ph. D., 1905.
- CLINTON LOUIS UTTERBACK, Instructor in Physics.
B. S., Purdue, 1908; M. S., Washington, 1918.

- LOUISE VAN OGLE, Instructor in Music.
Theoretical Work, Dr. Bridge, Chester, England; Richter, Leipzig; Piano, Godowsky, Berlin; Lhevinne, Berlin; Harold Bauer, Paris.
- ALBERT FRANZ VENINO, Assistant Professor of Music.
New York Conservatory of Music; Pupil of Leschetizky.
- EDWIN JOHN VICKNER, Professor of the Scandinavian Language.
A. B., Minnesota, 1901; A. M., 1902; Ph. D., 1905
- BERTHA ALMEN VICKNER, Associate in English.
A. B., Gustavus Adolphus, 1910; A. M., Washington, 1917.
- CHARLES EDWIN WEAVER, Associate Professor of Geology.
B. S., California, 1904; Ph. D., 1907.
- JAMES WEHN, Associate in Modeling and Sculpture.
- JOHN WEINZIRL, Professor of Bacteriology.
B. S., Wisconsin, 1896; M. S., 1899; Ph. D., 1906; Dr. P. H., Harvard, 1918.
- FRED FALCONER WELD, Associate in Civil Engineering.
B. S., Pennsylvania State College, 1893; C. E., 1902.
- CHAUNCEY WERNECKE, Associate in Civil Engineering. (winter and spring quarter.)
B. S., (C. E.), Washington, 1910.
- EARL DOWNS WEST, Associate in Mathematics.
A. B., Ohio State College, 1900; A. M., Adrian College, 1908.
- CLARENCE LESTER WHITE, Instructor in Civil Engineering.
B. S., (C. E.), Iowa, 1909; C. E., 1914.
- WALTER BELL WHITTLESLEY, Instructor in French.
A. B., Washington, 1907; A. M., 1909.
- GEORGE WHITWELL, Associate in Chemical Engineering.
B. S., Massachusetts Institute of Technology, 1915.
- MARJORIE HELEN WHIPPLE, Associate in Chemistry.
A. B., Colorado College, 1917.
- ELWOOD MORTON WILBUR, Instructor in Civil Engineering (autumn quarter.)
B. S., (C. E.), Maine, 1917.
- ELGIN ROSCOE WILCOX, Acting Instructor in Civil Engineering (winter quarter).
B. S., Washington, 1915; Met. E., Washington, 1919.
- CURTIS TALMAGE WILLIAMS, Assistant Professor of Education.
A. B., Kansas State Normal, 1913; A. M., Clark, 1914; Ph. D., 1917.
- GEORGE SAMUEL WILSON, Associate Professor of Mechanical Engineering.
B. S., Nebraska, 1906.
- HEWITT WILSON, Assistant Professor of Ceramics.
Cer. Engr., Ohio State University, 1913.
- WILLIAM RONALD WILSON, Instructor in Psychology.
A. B., Washington, 1917; M. S., 1921.
- ROY MARTIN WINGER, Assistant Professor of Mathematics.
A. B., Baker, 1906; Ph. D., Hopkins, 1912.
- HUGO WINKENWERDER, Professor of Forestry and Dean of the College of Forestry.
B. S., Wisconsin, 1902; M. F., Yale, 1907.
- ARTHUR MELVIN WINSLOW, Associate Professor of Mechanical Engineering.
Ph. B., Brown, 1903; B. S., Massachusetts Institute of Technology, 1906.
- CARL PAIGE WOOD, Assistant Professor of Music.
A. B., Harvard, 1906; A. M., 1907.
- LILLIAN WOOD, Associate in Chemistry.
B. S., Washington, 1910.
- CLIFFORD WOODY, Professor of Education.
A. B., Indiana, 1908; A. M., 1913; Ph. D., Columbia, 1916.
- HOWARD WOOLSTON, Professor of Sociology.
A. B., Yale, 1898; S. T. B., Chicago, 1901; M. A., Harvard, 1902; Ph. D., Columbia, 1909.
- JOHN LOCKE WORCESTER, Associate Professor of Anatomy.
M. D., Birmingham School of Medicine, Alabama, 1900.
- EUGENIE HUTCHINSON WORMAN, Associate in Fine Arts. (winter and spring quarters).
Pratt Institute.
- SELAH ELIZABETH WRIGHT, Associate in English.
A. B., Mount Holyoke College, 1918.
- CONRAD ZIMMERMAN, Lecturer on Timber Physics.
A. B., Washington, 1908.

BOARDS AND COMMITTEES

1921-1922

ADMINISTRATIVE BOARDS

BOARD OF DEANS—J. T. Condon, Thomson, Magnusson, Roberts, Johnson, Winkenwerder, Padelford, Landes, Bolton, Glen, Miller, Mrs. Patterson, Start, Spencer, Henry, Gould Stone.

SUMMER QUARTER—Board of Deans and the Comptroller.

EXTENSION—Start, Thomson, Landes, Bolton, Miller, Raitt, H. T. Condon.

STUDENT WELFARE AND DISCIPLINE—Deans Condon, Gould, Patterson.

SCHEDULE AND REGISTRATION—Stevens, Stone, Fred Ayer, Wilson, Daniels, Riggs, Sexsmith, Barton, Laube, Wood, Gregory, Garrett, W. B. Jones.

CONSULTING ENGINEERS—Eastwood, Magnusson, Harris.

COMMITTEES OF THE FACULTY

The President is *ex-officio* a member of each standing committee.

ADMISSIONS—The Board of Deans.

ART—Carl Gould, James Gould, Hughes, Ambrose Patterson, Wehn.

ASSEMBLY—Spencer, Glen, Hughes.

ATHLETICS—L. J. Ayer, Hall, Moritz, Dehn, May.

CURRICULUM—Johnson, Bolton, Magnusson, Winkenwerder, Spencer, Cobb, Glen, Henry, Osborn, L. J. Ayer, Daniels, Patzer, Stone.

GRADUATION—Thomson, Landes, Magnusson, Lantz, Curtis, Kirkland, Williams, Stone.

HONORS—Padelford, Goodner, Carpenter, Loew, T. S. McMahon, Rathbun, Wood.

JUNIOR COLLEGES—Padelford, Thomson, Frye, Bolton, E. McMahon, Stone.

LIBRARY—Henry, Thomson, Padelford, Frye, Richardson, Patzer, Loew.

PRE-MEDICAL COURSE—Worcester, Johnson, Weinzirl, Kincaid, Hall.

PUBLICATIONS—Henry, Landes, Padelford, Start, Umphrey, Densmore, Bell, Kennedy.
(Catalogue, Directory, the Registrar)

RELATIONS WITH SECONDARY SCHOOLS—Bolton, Thomson, Padelford, Frye, Frein, Freeland, Stone.

RULES—Benham, Goodner, Bell, More, Stone.

SPECIAL STUDENTS—~~The Board of Deans.~~ *The Registrar, the Dean of Men, and the Dean of Women.*

STUDENT AFFAIRS—Thomson, Winkenwerder, Padelford, Mrs. Patterson, Daniels, McMahon, Loew, Haggett, and eight representatives of student organizations.

STUDENT HEALTH—Hall, James Gould, Mrs. Patterson, Weinzirl, Worcester.

RHODES SCHOLARSHIPS—Densmore, L. J. Ayer, Harrison.

WASHINGTON UNION—Meany, J. T. Condon, Landes, Thomson, Miller, H. T. Condon.

MILITARY AND NAVAL AFFAIRS—Osborn, Eastwood, More, S. H. Anderson, Harrison.

GENERAL INFORMATION

HISTORICAL

The foundation for the establishment of the University of Washington was laid in 1854, when Governor Issac Ingalls Stevens, in his message to the first Legislature, recommended that Congress be memorialized to appropriate land for a university. Two townships were subsequently granted and in January, 1861, the Legislature finally located the Territorial University at Seattle.

On February 22 (Washington's Birthday) the Reverend Daniel Bagley, John Webster and Edmund Carr, composing the Board of University Commissioners, met and organized for work. Ten acres of land were donated by Hon. Arthur A. Denny, Charles C. Terry and Edward Lander from their adjoining farms, and on May 21, 1861, the cornerstone of the main building was laid and the building completed in specified time.

On November 4 following the University was opened for students.

GOVERNMENT

Under the constitution and laws of the State of Washington, the government of the University is vested in a Board of Regents, consisting of seven members appointed by the Governor by and with the advice and consent of the Senate. Each regent is appointed for a term of six years.

ENDOWMENT AND SUPPORT

The University derives its support entirely from the state. As yet the property belonging to the institution as an endowment yields little revenue. The income from this property will some day greatly help to support the University.

The legislative maintenance appropriation for the biennium 1919-1921 will yield \$1,633,489, based upon the tax levy of .74 of a mill. This is augmented from sundry receipts from property income.

Besides this, the Legislature appropriated the tuition and endowment receipts for the biennium for a permanent building fund. This was expected to provide for the erection of one or two new buildings.

The Legislature also appropriated \$20,000 for the establishment and cooperative maintenance of the Seattle Mining Experiment Station of the United States Bureau of Mines on the University campus; and \$7,500 for the expense of cruising the University timber lands throughout the state, looking to the exchange of these lands for a centralized demonstration forest.

The property of the University includes:

(1) The two townships of land granted by Congress in 1854. There remains of this old grant some 3,000 acres.

(2) The old University site, consisting of the tract of 8.32 acres, donated in 1861 by Arthur Denny and wife; and 1.67 acres donated by Charles C. Terry and wife and Edward Lander. This "ten-acre tract" is situated in the very heart of Seattle, and is rapidly enhancing in value.

(3) In addition to the above, the University was further endowed by the state on March 14, 1893, by the segregation of 100,000 acres of lands.

BEQUESTS

The Board of Regents of the University of Washington is authorized by law to receive such bequests or gratuities as may be given or granted to the University, and to invest or expend the same according to the terms of such bequests or gratuities. The Board of Regents has adopted rules to govern and protect the principal of such gifts and the income therefrom so that the same will be forever applied to the purposes designated by the donors of the gifts.

Those who desire to aid the work of the University of Washington by means of gifts *inter vivos* or by wills may do so, feeling assured that their wishes as outlined in the deed of gift or will are to be carried into effect as provided by law.

A simple statement in a will as follows:

"I give, devise and bequeath to the Board of Regents of the University of Washington the sum of-----dollars *In Trust, However*, for the following uses and purposes to be invested in securities to be approved by said Board and the interest therefrom to be expended in the maintenance of" (scholarship or fellowship subject named), will be sufficient.

These bequests may be applied to the maintenance of scholarships and fellowships in any subject desired by the donor which meets the approval of the Board of Regents.

EQUIPMENT

GROUNDNS

The grounds are ample to meet every need of the University. There are approximately 450 acres, all within the city limits of Seattle, lying between Lakes Union and Washington, with a shore line of over one mile on Lake Washington and about a quarter of a mile on Lake Union.

BUILDINGS

The following buildings are now in use on the University campus: Administration Hall, Aerodynamical Laboratory, Anatomical Laboratory, Architecture Hall, Bagley Hall and Annex, Commerce Hall, Denny Hall, Dormitories (Lewis, Clark, Lander and Terry), Engineering Hall and Annex, Extension Hall, Fisheries Buildings, Forest Products Laboratory (Dry Kiln, Wood Preserving Plant, Dry Shed), Foundry and Shop Building, Gatzert Building, Good Roads Building, Gymnasium, Health Service Building, Home Economics Hall, Hydraulics Laboratory, Library, Meany Hall, Mines Hall, Museum, Observatory, Philosophy Hall, Power House, Practice Cottage, R. O. T. C. Armory and Headquarters Buildings, Science Hall, U. S. Bureau of Mines, U. S. Mines Safety Station.

Mines Laboratory will be completed for occupancy in the autumn quarter and Education Hall will be completed by October, 1922.

LIBRARY FACILITIES

The general library contains 96,644 volumes, and receives 550 current magazines. About 6,000 volumes a year are being added.

The Law School library contains more than 25,000 volumes. All books of both libraries are upon open shelves and are easily accessible to all who care to use them.

In addition to the library facilities upon the campus, the Seattle Public Library, containing approximately 350,000 volumes, is open free to the University.

THE MUSEUM

The museum of the University was created as the State Museum by act of the Legislature in 1899. In its function as a Public, a State and a University Museum it aims to be an authority on the natural history and resources of this region, and its collections illustrative of the Northwest Coast and Alaska are already among the most complete and valuable to be found in the United States. The museum is housed at present in the Forestry building, constructed of natural logs and erected by the state of Washington in 1909 for the Alaska-Yukon Pacific Exposition.

The museum collections contain extensive exhibits of the forestry, mineral and horticultural resources of the State. An exhibit of local birds is arranged in systematic order and is illustrated by groups showing the natural habitat. Elaborate habitat groups of large animals, mounted according to modern methods of taxidermy, have been installed or are in process of installation. The marine fauna is represented by a series of mounted fishes of the Northwest coast, corals, crustaceans, sponges and mounted shells. The study or reserve series in the museum laboratories contain an herbarium of over 12,000 specimens; also an extensive collection of bird skins, eggs and nests. The ethnology of the Northwest coast from the Columbia river to the Arctic is represented by collections arranged in tribal sequence. The Philippine collections contain interesting specimens of old Moro brasses, hats, implements of warfare, etc.; and extensive Bagobo collection of illustrative beadwork, together with representative materials from the northern, or more primitive tribes, on the island of Luzon. The Chinese collection though small and principally from northern China, contains many valuable porcelains, embroideries, carvings, scrolls, clothing, Buddhas, etc.

The art section contains paintings, tapestries, and carvings, old laces, engravings, pottery, bronzes, medallions, etc., while the historical section contains interesting relics of the early days of the Northwest and Alaska.

LABORATORIES

The University of Washington has the following laboratories equipped for work in the various science departments:

ANATOMY LABORATORY

The laboratory for human anatomy has been arranged to secure a maximum of light and cleanliness. Besides laboratory tables, study tables have been installed. All necessary equipment in the way of skeletal, chart and model materials are available.

ASTRONOMY LABORATORIES

The observatory is housed in a substantial sandstone structure containing dome for equatorial, room for transit and clocks, office, room for lectures and laboratory work and dark-room. Part of the roof is flat, making an admirable place for evening study of the heavens. The instruments include a six-inch refracting telescope and accessories; a Bamberg transit, Riefle clock, Bond chronometer, Gaetner chronograph, Astro-Petzal objective with accessories, a barometer, sextants, etc. The clock is enclosed in a constant temperature chamber. The minor equipment consists of a good assortment of transparencies and lantern slides, globes, planetarium, and other equipment for experiments in laboratory and lecture work in astronomy.

BOTANY LABORATORIES

The botanical laboratories are on the third floor and in the basement of Science Hall. They occupy about 5,000 feet of floor space divided as follows: Three large laboratories of about 1,000 square feet each; three small laboratories, one for physiology, one for mycology and one for research. The laboratories are fitted with the apparatus and conveniences usual for the work.

CHEMICAL LABORATORIES

The chemical laboratories are housed in a thoroughly modern fireproof building. There are fully equipped separate laboratories devoted to general chemistry, analytical chemistry, food inspection and analysis, organic chemistry, physiological chemistry, industrial chemistry, and pharmaceutical chemistry. All laboratories are equipped with hoods with forced drafts, water, gas, distilled water and air under pressure. The chemical engineering laboratories are equipped with the fundamental types of apparatus used in manufacturing processes, such as filter press, hydraulic press, stills, grinding apparatus, heating furnaces, and vacuo drying oven.

CIVIL ENGINEERING LABORATORIES

The hydraulic laboratory is being transferred to its building located on the shore of Lake Union, where facilities are available for both medium and high head experiments. For medium head, a free water surface, one acre in extent, is provided at an elevation of 100 feet above the laboratory floor. For high heads, connection is made with an 8" pipe leading from an elevated tank 300 feet above the floor.

The materials testing laboratory contains five universal testing machines with capacities from 30,000 to 300,000 pounds, two impact machines with various hammers ranging in weight from 550 to 1500 pounds, with the necessary auxiliary apparatus for general work.

The equipment for testing hydraulic cement is complete for all the ordinary tests as specified by the American Society of Civil Engineers.

The road laboratory is equipped for testing materials used in the construction of roads. The machines for the abrasion and toughness test are of the standard designs adopted by the American Society for testing Materials; other machines are similar to those used by the United States Office of Public Roads.

The surveying equipment consists of an ample supply of all the necessary instruments for plane and topographic surveying.

ELECTRICAL ENGINEERING LABORATORIES

The dynamo laboratory contains seventeen alternating and thirty-four current generators and motors. The machines

are of modern design and have a combined capacity of 300 kilowatts in direct current machines and 225 kilowatts in alternating current machines. Most of the machines are of five- or ten-kilowatt capacity. Power from a storage battery of 130 cells is available at a separate switchboard in the dynamo laboratory. The university power house, containing two steam-driven units of 200 and 100 kilowatts, serves as a commercial laboratory for operating and testing purposes.

Nine smaller rooms are devoted to the following: (a) Instrument making and repairing, (b) grinding room and shop, (c) instrument and stock room, (d) telephone laboratory, (e) electrolysis and special thesis problems, (f) storage battery rooms, (g) three dark rooms for photometry work, (h) radio laboratory, (i) transmission line laboratory. The instrument room contains a large collection of standard indicating and recording ammeters, voltmeters and wattmeters, two three-element G. E. oscillographs, and a Tinsley A. C. potentiometer.

FISHERIES LABORATORIES

Ichthyology Laboratory.—The ichthyology laboratory contains an extensive collection of named fishes, particularly rich in species from Puget Sound and Alaska. By exchange and other means it is hoped to build up a representative series of the fishes found in American waters, with particular reference to forms of economic importance. The foundation has also been established for a collection to illustrate the species of shellfish, crustaceans, and other invertebrate animals constituting the bases for the corresponding industries.

Fish Diseases Laboratory.—The laboratory for fish diseases is equipped for the study of life histories of the various parasites of aquatic animals, including aquaria for live subjects, dark room for studying the effect of various colored lights upon the animals, etc.

Fisheries Laboratories.—The apparatus laboratory is equipped with working models of the larger forms, and fully rigged types of the smaller forms of fishery apparatus, also detailed plans for the construction of same; equipment for the manufacture, repair, care and preservation of nets; models of fishing vessels and boats, and samples of various fishery products prepared for market in the United States.

The canning laboratory is equipped with all the machinery and appliances necessary for canning all varieties of fishery products, and in addition to practical instruction in canning methods, tests are made of various species, while research in food canning is carried on under conditions similar to those prevailing in commercial plants.

The curing laboratory contains all the necessary equipment for the pickling, dry-salting, mild-curing and smoking of fishery products.

Ultimately a small refrigeration and cold storage plant will be installed for the purpose of economic study of the various methods of freezing and preserving fishery products in cold storage.

A smokehouse will be built for the purpose of carrying on experiments in the smoking of various species and their utilization as food either in this condition or canned.

The testing room will have a constant temperature of approximately 98° Fahrenheit, and in it samples of canned fishery products may be incubated, by means of which swells may be separated from the other cans and the sufficiency of the process used in the cannery determined. Various vacuum gauges and can testers will also be available.

Fish Hatchery.—The fish hatchery occupies about seven hundred square feet of floor space in Fisheries Hall No. 2. It is furnished with hatching troughs, baskets, and other essential equipment for the care of 500,000 salmon or trout eggs. A complete equipment consisting of batteries of open-top and closed-top jars is provided for the care of several million of semi-buoyant eggs. Feeding tanks and aquaria are also provided in which experimental work in fish culture may be carried on. A number of cement-lined ponds are available in the College grounds for the rearing of various species of aquatic animals.

Within easy reach of the University are located state and federal fish hatcheries where a study may be made of the actual conditions under which fish culture is carried on.

FOREST AND LUMBERING LABORATORIES

Dendrology.—Individual lockers. Extensive collections of tree seeds, cones and bark specimens. An aboretum is under way.

Logging and Lumbering.—Field work is given at logging camps and sawmills about Seattle. A complete equipment of instruments and tools is available for work in logging engineering. Collections of lumber, showing grades and patterns, charts of lumber grades, exhibits of sawmill and woods saws, logging equipment, such as wire ropes, axes, hooks, blocks, special appliances for donkey engines, saw-mill belts, models of high lead logging, etc.

Mensuration.—Equipment selected to show all principal types of instruments in use. Those adapted for use in the Northwest are provided in quantities sufficient for all practice work in cruising, surveying, volume, growth and yield studies.

Silviculture.—Forests around Seattle offer wide opportunities for practical studies and demonstrations. The extensive forest tree nursery of the College of Forestry affords an excellent opportunity for practice in modern nursery methods.

Timber Physics.—Laboratory work is carried on in the U. S. Forest Service Timber Testing Laboratory, operated in cooperation with the University. The laboratory is magnificently equipped with

seven large testing machines for static and impact loading, circular and band saws, planer and other shop equipment for wood-working.

Wood Technology.—Individual lockers, gas, water, compound microscopes and all apparatus for preparing and sectioning wood for microscopic study are provided. Hand specimens and planks of domestic and foreign commercial timbers are provided in large quantities. These include extensive collections of South American, Australian, Philippine and other foreign hardwoods. Microscopic slides of nearly all American woods are kept on hand for check specimens.

Forest Products Laboratories.—A building for the forest products laboratory was erected this year at a cost of \$85,000. However, owing to the shortage of class room accommodations on the campus, the products laboratory will be used to house all of the activities of the College of Forestry until the second unit of the Forestry Group—a building of approximately 60x120 feet—is erected. The laboratories for work in forest products now ready on the campus consist of four distinct units, as follows:

1. General Laboratory.—This is equipped with microtome, water baths, drying ovens, microscopes, chemical and pulp balances, all apparatus necessary for technical examination of wood preservatives, standardized thermometers, cameras and other apparatus required for photomicrography, dark room, and all incidental apparatus required for the detailed study of wood tissues.

2. Wood Preservation Laboratory.—This consists of both an open tank and a pressure plant. The former is of commercial size for treating ties. It is composed of two treating tanks and two storage tanks, one of steel for creosote, the other a wooden tank for salt solutions and other preservatives. The pressure plant consists of a 12-foot retort, air compressor and vacuum pumps and a duplex pressure pump, and is so constructed that it may be used for any of the different pressure processes.

3. Wood Distillation Plant.—This plant consists of a retort of one-half cord capacity per charge, gas tank, and refining apparatus. The retort has been installed by the U. S. Forest Service for cooperative work with the University.

4. The Dry Kiln.—This is a plant of about one carload capacity, and is equipped with a recording hygrometer and thermometer, hygrodeik, and automatic temperature control.

Commercial Plants.—Plants for the manufacture of paper, wood pipe, cooperage, excelsior, wood conduit, veneers, furniture, boxes, and numerous other secondary wood products are available for study. Four large creosoting plants and several smaller preservative plants are also available.

Demonstration Forest and Experiment Station.—This consists of a 60,000-acre tract comprising the Pilchuck-Sultan watersheds formerly a part of Snoqualmie Forest. It is very conveniently reached from Seattle, and offers almost ideal conditions for a school forest. It has a total stand of timber of over a billion and a half feet, representing nearly all species of the Pacific Northwest, but more than three-fourths is composed of Douglas fir, cedar and hemlock. As there is an excellent representation of age classes, it will lend itself readily to scientific forest management. It is estimated that the tract will yield from \$20,000 to \$25,000 annually on a sustained yield basis. It is expected that title to the tract will be completed in the near future.

GEOLOGY LABORATORIES

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The geology laboratories, four in number, are in Science Hall. Two are on the first floor, and consist of large rooms, arranged for general geology, physiography, meteorology, mineralogy, petrography and paleontology. Two laboratories are in the basement, in well-lighted rooms at the southwest end of the building.

For work in mineralogy and petrography extensive collections of minerals and rocks are supplied; and for paleontological study collections of fossils and casts represent the principal geological formations. In the study of meteorology practical work is done by the use of a complete set of weather bureau instruments. For the study of earthquake phenomena a Bosch-Omori seismograph has been installed for some years. For general laboratory and lecture work the latest model Bausch & Lomb Balopticon with reflectroscope and polariscope attachments is provided.

JOURNALISM LABORATORY

The journalism laboratory, occupying 30x60 feet in the basement of Commerce Hall, is equipped with chases, imposing stones, type materials, borders, and everything necessary to teach students how to dress a newspaper. For students interested in advertising and commercial printing, other special equipment is provided. A laboratory library of publications from supply houses, is always available, containing the latest information on type, paper, furniture, engravings and all equipment of the publishing and allied trades.

The journalism laboratory opens into the University printing plant, where practically all University printing is done. This makes convenient regular assignment hours on various types of machinery, as the plant has its own slug casting and type setting machines, cylinder, platen and rotary presses, folder, cutter, stitcher, etc.

MECHANICAL ENGINEERING LABORATORIES

The steam and experimental laboratory is fully equipped with steam apparatus, including engines aggregating 900 horse

power, of simple and compound, high speed and Corliss types; steam turbine; jet and surface condensers; injector; centrifugal pump; steam calorimeters; indicators; calibrating appliances; oil testing machine; gas engine of stationary and automobile types; gas producer plant; refrigerating apparatus; compressed air machinery for two stage compression and Westinghouse full train equipment; fuel testing facilities, including Mahler Bomb, Junkers and other colorimeters, with accessories for determining heating value and analysis of solid, liquid and gaseous fuels.

There is a woodworking shop, machine shop, foundry and forge shop. The wood shop is equipped with benches, lathes, band saws, circular saws, planer, and trimmer. The forge and foundry are equipped with down-draft forges, power hammer, punch and shears, cupola, moulding machines, shakers, rattler, riddles, brass furnace, core ovens, and traveling crane. Machine shop is equipped with small and large lathes, drill press, milling machine, planer, sharper, metal saw, grinding machine and complete equipment for bench and vise work.

MINING, METALLURGICAL AND CERAMIC LABORATORIES

Mining and Metallurgical Laboratories.—The laboratories of the College of Mines are housed in a two-story building of pressed brick. The main portion of the structure, measuring 50 by 60 feet, contains the offices, library, classrooms, drafting rooms and museum, as well as laboratories, desks, stockroom and balance room for assaying and general metallurgy. The rear wing, 40 by 66 feet, with tower, is occupied by mining and milling machinery, electric furnaces, and stocks of ore, coals and clays. An addition contains a steel locker room, shower-bath room and a metallographic laboratory.

The metallurgical equipment includes standard size furnaces fired by six methods—coal, coke, gasoline, gas, fuel-oil and electricity. Electric current to the amount of 280 kilowatts is available for experiments in electric smelting. Other important pieces of equipment are a reverberatory furnace, high temperature electric furnace, pyrometers of several types, cyanide equipment, amalgamating devices, blowers, calorimeters, balances, sampling machines, and exhibits of metallurgical processes and products.

The mining equipment consists of an air compressor, receiver, three rock drills, aerial tram, loading and tamping models, hand tools, full equipment for practice in blasting, models, drawings, blue-prints, photographs, lantern with 1,600 slides, and collection of ores and minerals. The College of Mines' mill contains breakers, rolls, 3-stamp battery, feeders, screens, classifiers, jigs, six concentrating tables, flotation cells of six types, Dings magnetic separator, coal washing equipment, and accessory apparatus.

Ceramic Equipment.—Structural and Refractory Wares: Crusher, rolls, four-foot dry and wet pan, Meuller auger machine

for brick, tile and hollow building block, steam dryer and kilns. Terra cotta: Plaster molds, De Vilbiss spraying apparatus, transverse and tensile strength machine, engobe and glaze materials, ball mills. Pottery: Patterson clay washing outfit, including double blunger, power screens, agitator, pump and filter press, potter's pug mill, potter's wheel, plaster mold and pottery kiln. General testing: Brass sample molds, overflow type of volumeters, pyrometric cone mold, constant temperature electric dryer, gas fired fritt kiln, hygrodeik, Brown radiation pyrometer, carbon resistance electric furnace for high temperatures and a complete series of standard pyrometric cones.

UNITED STATES BUREAU OF MINES NORTHWEST EXPERIMENT STATION.

The United States Bureau of Mines maintains a mining and metallurgical experiment station for the Pacific Northwest and the coast regions of Alaska at the College of Mines. The headquarters of the station, from which all operations in this territory are directed, are in the Bureau of Mines building, between Mines and Bagley halls. An analytical laboratory is in the same building, while the electric furnaces and other equipment used by the bureau in cooperation with the college are housed in the Mines building. At present the principal investigations being conducted by the station are in electro-metallurgy, the treatment and uses of coal and in ceramics. Members of the experiment station staff give occasional lectures to the students of the University on subjects dealing with their special lines of work.

Mines Safety Station.—The Mine Safety Station, occupies a separate building. Several sets of various types of oxygen rescue and resuscitation apparatus are kept on hand for practice as well as for use in mine rescue work. The purpose of the station is to train miners in the use of oxygen helmets, which are used in cases of mine fires and explosions in both coal and metal mines. From ten days to two weeks' time is required for the course of training. The applicant is taught the construction of the apparatus and is required to wear it for four hours each day, in two periods of two hours each. The practice is carried on in a room filled with gas which cannot be breathed without immediate danger, and the work to be performed is the same as that which would be required in actual mining operations or rescue work. The smokers room represents a portion of a mine, and is equipped with mine car, track, overcast, timbers and brick. First-aid instruction is also given. Applicants who have completed the course of training receive a certificate from the United States Bureau of Mines.

A one-ton 45-horsepower automobile truck, equipped with rescue apparatus ready for emergency calls, forms part of the equipment of the rescue station.

PHARMACY AND MATERIA MEDICA LABORATORIES

Rooms devoted to pharmacy, and materia medica are located in Bagley hall, a three-story fireproof building. Special sections are provided for pharmacy students in general, organic and qualitative chemistry. Work in prescription practice receives special attention in a room constructed and arranged as a model prescription pharmacy. The materia medica room contains a museum of several hundred samples of official and unofficial crude drugs. It also contains an extensive collection of commercial and biological products manufactured and donated by the H. K. Mulford Company of Philadelphia, Pennsylvania, Parke, Davis & Co., of Detroit, Michigan, and Eli Lilly and Company, of Indianapolis, Indiana. One room is given to drug assaying and food analysis. The examination of official food and drug samples for the state is under the direction of the Dean of the College of Pharmacy. A well equipped laboratory is devoted to this purpose. Pharmacy students taking botany, physiology and bacteriology have well equipped laboratories in Science Hall.

PHYSICS LABORATORIES

The laboratories set apart for the use of the department consist of: (1) A general laboratory for students in arts and sciences, (2) a general laboratory for students in applied science, (3) an electrical laboratory, (4) a heat laboratory, (5) a sound and light laboratory, (6) a photometry room, (7) a battery room.

The laboratories are supplied with apparatus from the best American and European makers.

The Bureau of Testing is equipping itself as rapidly as possible to meet the demand for a bureau where scientific instruments may be accurately calibrated and tested. The standards of the bureau will be calibrated by our National Bureau of Standards at Washington, D. C.

The bureau is prepared to calibrate direct and alternating current instruments, to determine candle power of lamps, to measure temperature, both high and low, and to a limited extent standardize weights. Those desiring to have work done should address the director, Frederick A. Osborn.

PSYCHOLOGY LABORATORIES

Psychology.—The psychology laboratory occupies the third floor of Philosophy Hall. The fourth floor of this building which will ultimately be a part of the laboratory, is temporarily occupied by another department.

ZOOLOGY LABORATORIES

Zoology.—The laboratory work of the department of zoology is conducted in six rooms located on the second floor of Science Hall. Here are adequate facilities for pursuing the following lines

of investigation: General zoology, physiology, cytology, parasitology, plankton, entomology and research.

BAILEY AND BABETTE GATZERT FOUNDATION FOR CHILD WELFARE

On December 21, 1910, this foundation was established by a gift to the University of \$30,000 made by Sigmund Schwabacher and by the executor of the will of the late Abraham Schwabacher. The purpose of the foundation is (1) to conduct a laboratory for the mental and physical examination of children in order to determine their individual defects and aptitudes and, in accordance with the results of the examination, to suggest the best means of education and treatment; (2) to assist in establishing child welfare agencies and child study laboratories throughout the state, and (3) to carry on research in child psychology.

In December, 1915, the Bailey and Babette Gatzert Foundation for Child Welfare was created a separate department of the University.

ENGINEERING EXPERIMENT STATION

The Engineering Experiment Station was formally organized in December, 1917, in order to coordinate the engineering investigations in progress and to facilitate the developments of industrial research in the University.

The scope of the work is twofold:

(a) To investigate and to publish information concerning engineering problems of a more or less general nature that would be helpful in municipal, rural and industrial affairs;

(b) To undertake extended research and to publish reports on engineering and scientific problems.

The purpose of the station is to aid in the industrial development of the state and nation by scientific research and by furnishing information for the solution of engineering problems. Every effort will be made to cooperate effectively with professional engineers and the industrial organizations in the state. Investigations of primary interest to the individual or corporation proposing them, as well as those of general interest, will be undertaken through the establishment of fellowships.

The control of the Engineering Experiment Station is vested in an administrative staff consisting of the president of the University, the dean of the College of Engineering, ex-officio director, and seven members of the faculty.

For administrative purposes, the work of the station is organized into seven divisions: (1) Forests products, (2) mining and metallurgy, (3) chemical engineering and industrial chemistry, (4) civil engineering, (5) electrical engineering, (6) mechanical engineering, (7) physics standards and tests.

Inquiries in regard to the work of the Engineering Experiment Station should be addressed to the director.

ENTRANCE INFORMATION

THE UNIVERSITY ORGANIZATION

The University of Washington is one of the five institutions of higher education which complete the system of public education of the state, the others being the State College and the three normal schools. To the University is given exclusive authority to instruct in the following major lines: Aeronautical engineering, architecture, commerce, fisheries, forestry, journalism, law, library science, marine engineering and medicine.

The University has concurrent authority with the State College to instruct in the following major lines: Chemical engineering, civil engineering, electrical engineering, home economics, liberal arts, mechanical engineering, mining, pharmacy, professional training of high school teachers, school supervisors, and school superintendents, and pure science.

Schools and Colleges and Their Fields.—To carry out its share of this educational responsibility, the University is organized in the following schools and colleges:

- (A) The Colleges of Liberal Arts and Science, which provide a liberal education in the fields of arts and of pure science, leading in a course, normally requiring twelve quarters of residence, to the degrees of bachelor of arts and bachelor of science.
- (B) The professional and technical schools and colleges, including:
 - (1) The College of Business Administration, covering in a course of twelve quarters the fundamentals of scientific training for industry and commerce. The degree given is bachelor of business administration.
 - (2) The College of Education, in a course of twelve quarters, prepares students for careers in the field of education as high school teachers and school administrators. The degree is bachelor of education. Students in the College of Liberal Arts may major in the department of education and take the degree of bachelor of arts.
 - (3) The College of Engineering has four departments, chemical, civil, electrical and mechanical engineering (including aeronautical and marine), their curricula leading in twelve quarters to the degree of bachelor of science in the special field chosen by the student. The degree of master of science in each field is open to graduate students.
 - (4) The College of Fine Arts offers curricula of twelve quarters in architecture, vocal, instrumental, or

public school music, or musical theory, painting and design, public school drawing, music and drawing, and dramatic art, leading to the degrees of bachelor of architecture, bachelor of music and bachelor of fine arts or bachelor of liberal arts, with a major in in one of the subjects named.

- (5) The College of Fisheries, recently established, lays a scientific foundation for work connected with the fisheries industry, one of the chief resources of the Pacific Coast. The degree offered is that of bachelor of science in fisheries.
- (6) The College of Forestry offers a curriculum of twelve quarters preparing for work in scientific forestry or in the industry of lumbering. The degree offered is that of bachelor of science. The full professional course is fifteen quarters, with a liberal allowance of electives, giving opportunity for specialization in forest service and state work, logging engineering, forest products, or the lumber business. For this course the degree of master of science may be given in the Graduate School.
- (7) The School of Journalism requires for entrance the junior certificate, elsewhere explained, based on the completion of the first two years of college work in arts or science. The curriculum leads to the degree of bachelor of arts in journalism and prepares its students for practical newspaper work.
- (8) The School of Law is the standard of approved law schools for admission to the bar of this state. For admission the student must present a junior certificate from the College of Liberal Arts or the College of Science, or its equivalent. The curriculum of the school requires three school years or nine quarters, and leads to the degree of bachelor of laws. The degree of master of laws is also given. Students may carry on work in liberal arts or science and law concurrently, taking both bachelors' degree in six years, or eighteen quarters.
- (9) The Library School by means of a technical curriculum extending through three quarters based upon either three or four years of academic study prepares students for service in librarianship. Upon the completion of the library school curriculum (46 credits), when based upon three years of academic study, the bachelor of arts degree is granted. When based upon four years of academic study, for which the student has received the baccalau-

reate degree, the professional degree of bachelior of science in library science is granted.

- (10) The College of Mines offers four-year or twelve-quarter curricula, leading to the degree of bachelor of science in mining engineering, geology and mining, metallurgical engineering, or coal mining engineering. The fields open to graduates of this college are indicated by these divisions. The college also offers a curriculum in ceramics (clay, glass and cement products.) The degree of master of science, with a major in one of these lines, may be obtained in the Graduate School.
- (11) The College of Pharmacy offers three-year and four-year courses, the first giving preparation in technical and commercial pharmacy, and the second providing a well-rounded scientific training in this field. The three-year course leads to the degree of pharmaceutical chemist, and the four-year course to that of bachelor of science in pharmacy. A fifth year, taken in the Graduate School offers an opportunity for graduate and research work and leads to the degree of master of science in pharmacy.
- (C) The Graduate School offers work leading to the degrees of master of arts, master of science, master of arts or master of science in technical subjects, certain technical or professional master's degrees (as, for example, master of business administration), and doctor of philosophy. A master's degree presupposes at least one year of resident work of high grade and special character, and a doctor's degree at least three years of such work. The University is placing increased emphasis upon its graduate work. Full details are furnished in the bulletin of the Graduate School.

Definitions and Explanations.—In all statements relating to the University the word *course* refers to a single study pursued for a definite period, for which credit may be given toward University requirements for graduation in accordance with the number of hours taken; a *curriculum* is a group of courses arranged to be taken consecutively or concurrently; a *department* is the unit of instructional organization in a particular science or art, as the department of geology; a *college* gives full curricula, beginning with the work of the freshman year and covering twelve quarters; while the work of a *school* is based upon two or more years of college work.

The four-year programs of the Colleges of Liberal Arts and Science are further divided into the *lower division* (freshman and

sophomore) and *upper division* (junior and senior). The *junior certificate* is given for the completion of the requirements of the lower division in the College of Liberal Arts. The more advanced work of the upper division leads to graduation with the bachelor's degree. The specialized work of the schools is upper division or graduate work and requires the junior certificate as a minimum to enter upon it.

Special Curricula Within the Schools.—There are also given certain semi-professional curricula for which no special school or college is provided. Such is the curriculum in nursing and public health, given in the College of Science.

The University does not give a medical course, but it offers a pre-medical curriculum especially planned as a foundation for study in a medical school. This may be two years in length for schools not requiring college graduation, or four years for schools requiring that amount of preparation.

Under the provisions of the National Defense Act, students in the University may attain commissions as reserve officers in the United States Army by meeting the requirements for advanced work in military science. This is done without interference with the students' regular academic work.

The Four-Quarter System.—The University is now operated on the four-quarter system, each quarter having approximately twelve working weeks. These quarters or terms begin in October, January, April and the latter part of June. The University is closed only through the month of September. A careful reading of the calendar will show the working of this plan in detail. Students may enter at the beginning of any quarter. This permits them to do a full quarter of university work in the summer, in most curricula, to complete a university course in three years, if health and resources permit, or otherwise to adjust their university residence to meet personal conditions. This flexible plan is of especial advantage in the University of Washington because the absence of extremes in climatic conditions is favorable to mental work at all times of the year.

ADMISSION TO THE UNIVERSITY

GENERAL STATEMENT

Students are admitted to the resident work of the University by certificate or by examination, only graduates of fully accredited four-year secondary schools being admitted on certificate. Students are classified as graduates and undergraduates. Undergraduates are classified as regular students (freshmen, sophomores, juniors, and seniors), unclassified students, and special students.

All correspondence regarding the admission of students to the resident course of the University, as well as the requirements for graduation, should be addressed to the registrar.

SPECIAL NOTICE

As it is highly probable that the number of students who can be cared for by the University during the academic year of 1921-1922 will be limited, the attention of all interested persons is called to the following plan, which has been adopted with a view of affording every applicant a fair opportunity to enroll for the autumn quarter, 1921:

Prospective students (not yet matriculated in this University) must file with the registrar, *not later than July 30*, applications for admission for the autumn quarter, 1921, together with all necessary credentials and a statement of choice of college or school (and where possible, of prospective major); otherwise their names will be placed on a waiting list.

Students at present in the University, and other old students not at present enrolled, must signify to the registrar, *not later than July 15*, their hope or intention of enrolling in the University for the autumn quarter, 1921; otherwise their names will be placed on a waiting list.

Both old and new students should file their applications as early as possible. Notifications regarding the acceptance of applications will be sent to students as promptly as is consistent with the necessary checking of records and credentials. In considering applications of old and new students, preference will be given to those with advanced standing.

Admission by Certificate.—A graduate of a four-year accredited secondary school, whose course has covered the requirements for entrance as outlined on pages 15-17 will be admitted upon recommendation of his principal and the presentation of a satisfactory certificate. Since the school diplomas do not give the necessary information, they cannot be accepted for this purpose. The principals of all accredited high schools in the state are furnished with the official blanks, which may also be obtained from the registrar's office.

Applicants for advanced standing are required to furnish a complete certified statement of both preparatory and college credits, together with a letter of honorable dismissal from the institution last attended.

Scholarship Requirement.—The University has adopted a scholarship requirement of a grade of 80 or better in at least two-thirds of the subjects accepted for graduation from high school and for entrance to the University. This requirement will not be imposed next fall, nor will it be imposed at any time thereafter on students who have graduated from high school, before September, 1921. In the fall of 1922, however, this requirement will have to be satisfied in respect to the subjects taken during the senior year of 1921-1922; in the fall of 1923, in respect to subjects taken during 1921-1922 and 1922-1923, the junior and senior years respectively; in the fall of

1924, in respect to subjects taken in 1921-1922, 1922-1923 and 1923-1924; and in the fall of 1925, in respect to the full course in high school (except such portion of it as may have been completed previous to September, 1921).

The list of accredited secondary schools in the State of Washington is as follows for the year 1921-1922:

I. PUBLIC HIGH SCHOOLS

Aberdeen	Endicott	Napavine	Shelton
Almira	Enumclaw	Newport	Snohomish
Anacortes	Ephrata	Noonsack	South Bend
Arlington	Everett	North Bend	Spangle
Asotin	Fairfield	Oakesdale	Spokane—
Auburn	Fall City	Oakville	Lewis and Clark
Battle Ground	Farmington	Odessa	North Central
Bellingham	Ferndale	Okanogan	Orchard Avenue
Whatcom	Foster	Olympia	Sprague
Fairhaven	Friday Harbor	Omak	Stanwood
Bickleton	Garfield	Oroville	Stevenson
Black Diamond	Goldendale	Orting	St. John
Blaine	Grandview	Outlook	Sultan (U. H.)
Bothell	Granger	Palouse	Sumas
Bremerton (U. H.)	Granite Falls	Pasco	Sumner
Brewster	Harmony	Pe Ell	Sunnyside
Buckley	Harrington	Pomeroy	Tacoma—
Burlington	Hartline	Port Angeles	Lincoln
Burton (U. H.)	Hillyard	Port Townsend	Stadium
Camas	Hoquiam	Prescott	Tekoa
Cashmere	Ilwaco	Prosser	Tenino
Castle Rock	Issaquah	Pullman	Toledo
Centralia	Kalama	Puyallup	Tolt (U. H.)
Chehalis	Kelso	Raymond	Tonasket
Chelan	Kennewick	Reardan	Toppenish
Cheney	Kent	Redmond	Touchet
Chewelah	Kettle Falls	Renton	Vader
Clarkston	Kirkland (U. H.)	Republic	Vancouver
Cle Elum	Kittitas (U. H.)	Richland	Vashon
Colfax	La Conner	Ridgefield	Vera
Colville (U. H.)	La Crosse	Ritzville	Waitsburg
Coulee City	Latah	Rochester	Walla Walla
Coupeville	Leavenworth	Rockford	Wapato
Creston	Lebam	Rosalia	Washougal
Davenport	Lind	Roslyn	Washtucna
Dayton	Lynden	Roy	Waterville
Deer Park	Mabton	Seattle—	Wenatchee
Deming	Malden	Ballard	White Salmon
Doty	Marysville	Broadway	Wilbur
Dryad	Mead	Franklin	Wilson Creek
Duvall	Medical Lake	Lincoln	Winlock
Eatonville	Meridian (U. H.)	Queen Anne	Winslow
Edison	Monroe	West Seattle	Woodland
Edmonds	Montesano	Sedro Woolley	Yacolt
Edwall	Mossy Rock	Selah	Yakima
Ellensburg	Mount Vernon (U. H.)	Sequim	Zillah
Elma			

II. OTHER SECONDARY SCHOOLS IN WASHINGTON


Annie Wright Seminary, Tacoma	Spokane College, Spokane (preparatory department) (provisional)
Holy Angels Academy, Seattle, (provisional)	St. Martin's College, Lacey (high school department)
Forest Ridge Convent, Seattle (provisional)	St. Nicholas School, Seattle
Holy Names Academy, Seattle	St. Paul's Academy, Walla Walla (provisional)
Holy Names Academy, Spokane	Walla Walla College Academy, Walla Walla (provisional)
Moran School, Rolling Bay	Y. M. C. A., Seattle
Pacific Lutheran Academy, Parkland	
Mme. Pless School, Seattle (provisional)	
Seattle Pacific College, Seattle (academy) (provisional)	

III. SCHOOLS OUTSIDE OF WASHINGTON

Graduates of secondary schools outside of Washington will be admitted on the same terms as graduates of accredited schools of Washington, provided the school in question is fully accredited, (1) by the North Central Association of Schools and Colleges, (2) by the New England College Entrance Certificate Board, or (3) by a leading university whose standards of admission are practically the same as those of the University of Washington. Graduates of four-year high schools in Alaska that are recommended by the Commissioner of Education for Alaska will be accepted, until further notice, on the same basis as graduates of accredited schools in Washington.

Admission by Examination.—Applicants for admission by examination are required to pass an examination based on a four-year course amounting in the aggregate to fifteen units* and covering the requirements of the college that the student wishes to enter.

Entrance examinations are held at the University on Thursday, Friday and Saturday preceding the opening of each quarter.

 *Special entrance examinations will be held at the Registrar's office during the last week of July, 1921.*


The schedule of hours for examination may be obtained from the registrar.

Certificates of successful examinations before the College Entrance Examination Board will be accepted in lieu of matriculation examinations conducted by the University of Washington.

Examinations for Exemption in English.—The department of English will give an examination in English composition for those students who wish to attempt it, with the view to being excused from all or a part of the required course in college composition. It is hoped that a large number of entering students will present themselves for this examination, which will be held on the same dates as the regular entrance examinations.

REGISTRATION

Registration for all students for the autumn quarter will take place on Monday and Tuesday, September 26 and 27, 1921; for the winter quarter on Wednesday, January 4, 1922; for the spring quarter, Tuesday, March 28, 1922; and for the summer quarter, Tuesday, June 20, 1922.

 *Applicants for admission who fail to send in full credentials by July 30 cannot be assured of an opportunity to register for the autumn quarter.*

Late Registration.—The dates noted above are officially set apart for registration and enrollment, and all students are expected to complete their registration (including payment of all required fees) in those days. Students who fail to do this are charged an additional fee of \$2 for the first day's delay, and a further cumulative fee of \$1 for each day thereafter during the first week following the final official registration date. After the first week following the final official registration date, no student will be permitted to register except by special action of the Board of Deans. Registration by proxy is not permitted.

Changes in Registration.—A fee of \$1 is charged for each change made by a student in his election of studies after his registration is completed, unless such change is made upon the initiative of University authorities.

*To count as a "unit", a subject must be taught five times a week, in periods of not less than forty-five minutes, for a school year of not less than thirty-six weeks.

REQUIREMENTS FOR ADMISSION

Correspondence.—Credentials and all correspondence relating to admission to any college or school of the University should be addressed to the Registrar, University of Washington, Seattle.

Freshman Standing.—Freshman standing in the University is granted to any recommended graduate of a four-year accredited secondary school who presents fifteen units[‡] of credits, distributed as follows:

- (a) 3 units of English.
- (b) 1 unit of algebra.
- (c) 1 unit of plane geometry.
- (d) 3 units selected from one of the following groups (or 2 units, if 3 units of mathematics are presented).
- ††(1) Foreign language, either ancient or modern, (at least 2 units in one language; not less than one unit will be counted in any language).
- (2) History, civics, economics (at least one unit to form a year of consecutive work in history).
- (3) Physics, chemistry, botany, zoology, general biology, physical geography, geology, physiology. (Not less than one unit will be counted in physics, chemistry, or general biology. No science will be counted as applying on this requirement unless it includes a satisfactory amount of work).
- (e) 2 units in subjects presented in the above groups (1)-(3).
- (f) 5 units selected from subjects accepted by an approved high school for its diploma. Not less than one full unit will be counted in physics, chemistry, general biology, or a foreign language. A maximum of 4 units will be counted in vocational subjects, except for admission to the College of Business Administration. For admission to this college only, a maximum of 8 units in vocational subjects will be accepted, of which at least 4 units must be in commercial branches; and a student presenting 8 such vocational units and 2 units in history, and fulfilling requirements (a), (b) and (c), will be given freshman standing in that college without being held for requirements (d) and (e). If the student is transferred later to another college, only 4 vocational units will be counted, and the student will be required to meet the requirements (d) and (e).

A candidate who fulfills these requirements will be admitted to freshman standing in any of the colleges of the University. However, if he has not taken in high school, certain of the subjects recommended for admission to the college that he may decide to enter, he will take them in the University, or if they are not offered in the University, he will take them in some accredited secondary school, or with a tutor. Such subjects if taken in the University, may apply toward a degree, as far as elective courses make this practicable. In certain curricula, however, these subjects must be taken in addition to the prescribed subjects.

A student having any such deficiency is required to register so that the deficiency will be removed by the end of his fourth quarter of residence. A student failing to meet this requirement is ineligible for re-admission until the deficiency has been removed.

Entrance with condition, to freshman standing, is not permitted. Excess admission credit does not establish any presumptive claim for advanced standing, unless the student has taken a graduate course in the high school of at least one semester.

[‡]To count as a "unit," a subject must be taught five times a week, in periods of not less than forty-five minutes, for a school year of not less than thirty-six weeks.

††Beginning with 1921, a student who has not taken in high school the amount of foreign language which may be required for admission to the college that he plans to enter, will make up the deficiency in the University as part of his regular schedule of work, but without receiving college credit for it. For the College of Fine Arts, the requirement may be satisfied by 20 hours of a modern foreign language; for the Colleges of Liberal Arts, Science and Education, by 20 hours in any one foreign language.

Specific Subjects Recommended for Admission to the Several Colleges

COLLEGES OF LIBERAL ARTS AND SCIENCE (GENERAL COURSES)

- 3 units of English.
- 1 unit of algebra.
- 1 unit of plane geometry.
- ††2 units in one foreign language.

CURRICULUM PREPARATORY TO MEDICINE (COLLEGE OF SCIENCE)

- 3 units of English.
- 1 unit of algebra.
- 1 unit of plane geometry.
- 1 unit of United States history and civics.
- 1 unit of medieval and modern history.
- 1 unit of physics.
- ††2 units in one foreign language.

CURRICULUM FOR NURSES (COLLEGE OF SCIENCE)

- 3 units of English.
- 1 unit of algebra.
- 1 unit of plane geometry.
- 1 unit of United States history and civics.
- 1 unit of medieval and modern history.
- ††2 units in one foreign language.

COLLEGES OF EDUCATION AND FINE ARTS

- 3 units of English.
- 1 unit of algebra.
- 1 unit of plane geometry.
- ††2 units in one foreign language (for Fine Arts, modern language).
- 1 unit in one of the following: physics, chemistry, botany, zoology.
- 1 unit in a history.
- or ½ unit U. S. history, and ½ unit civics.

COLLEGE OF BUSINESS ADMINISTRATION

- 3 units of English.
- 1 unit of algebra.
- 1 unit of plane geometry.
- 2 units of history, (American and modern history preferred).

COLLEGES OF ENGINEERING AND MINES

- 3 units of English.
- 1½ units of elementary and advanced algebra.
- 1½ units of plane and solid geometry.
- 1 unit of physics.
- ½ unit of shopwork.

COLLEGE OF FORESTRY

- 3 units of English.
- 1½ units of elementary and advanced algebra.
- 1½ units of plane and solid geometry.
- 1 unit of physics.
- 1 or ½ unit of botany.

COLLEGE OF PHARMACY

For the three-year course:

- 3 units of English.
- 1 unit of algebra.
- 1 unit of plane geometry.

For the four-year course:

- 3 units of English.
- 1 unit of algebra.
- 1 unit of plane geometry.
- ††2 units in one foreign language.
- 1 unit in one of the following: physics, chemistry, botany, zoology, physiology, general biology. (Must include satisfactory amount of laboratory work).


††Beginning with 1921, a student who has not taken in high school the amount of foreign language which may be required for admission to the college that he plans to enter, will make up the deficiency in the University as part of his regular schedule of work, but without receiving college credit for it. For the College of Fine Arts, the requirement may be satisfied by 20 hours of a modern foreign language; for the Colleges of Liberal Arts, Science and Education, by 20 hours in any one foreign language.

COLLEGE OF FISHERIES

3 units of English.
1 unit of algebra.
1 unit of plane geometry.

SCHOOL OF LAW, LIBRARY SCHOOL AND SCHOOL OF JOURNALISM (See following page.)

Unclassified Standing.—A graduate of a four-year accredited secondary school who does not meet the requirements for admission to freshman standing may, upon recommendation of his principal, be admitted as an unclassified student. Such a student will be allowed to enroll for those courses only for which he has had adequate preparation. By virtue of his classification, he is not a candidate for a degree, but he may ultimately become a candidate for a degree by fulfilling as part of his college prescriptions all the requirements for entrance to and graduation from the college in which he is registered. An unclassified student is required to register, so that all entrance deficiencies will be removed by the end of his fourth quarter of residence. Failure to comply with this requirement will render a student ineligible for readmission until all deficiencies have been removed.

 *Special Notice.*—In view of the probable necessity of limiting enrollment for the academic year 1921-1922, preference will in all cases be given to applicants who fully meet requirements for regular standing over those whose preparation is deficient, and the names of the latter will be placed on a waiting list.

Special Students.—(See special note above). All courses offered by the University are organized for regular students, that is, students who have had the equivalent of a good high school education fully covering college entrance requirements. Under certain regulations, however, a student who cannot be admitted to freshman standing or as an unclassified student, but may be admitted, classified as a special student, and allowed to register for those courses only for which he shows special preparation.

The number of such students admitted is necessarily limited by the facilities of the University. The regulations governing the admission of special students are as follows:

1. For admission to any college or school of the University, a special student must be at least twenty-one years of age.
2. In general, a student from an accredited high school will not be admitted to this classification if he has been in attendance in the high school during the previous year.
3. All available certified credits for previous school work must be submitted to the registrar and an application blank for admission as a special student filled out, giving, in addition to other information, the kind of work desired, the reasons for desiring such work, and, when no credits can be presented a detailed statement of any previous educational work and practical experience.

4. Registration as a special student is for one quarter only. Re-registration will be refused if the student has not shown satisfactory earnestness and definiteness of purpose, or if his work has not been good.

5. By virtue of his classification, a special student is not eligible for any degree. He may ultimately become a candidate for a degree, however, by completing the admission requirements of the college in which he is registered.

6. Special students are not eligible to take part in student activities.

7. Persons desiring to be admitted as special students will apply to the registrar for the necessary application and credential blanks.

In order that applicants for admission as special students may receive full consideration, their applications should be filed with the registrar four weeks, at least, before the beginning of the quarter in which the applicant wishes to attend the University. Applications for the autumn quarter must be filed by July 30.

Advanced Undergraduate Standing.—Students from classes above the first year in other colleges of recognized rank, who present letters of honorable dismissal, may be admitted to the advanced standing for which their training seems to fit them. No advanced credit will be given for work done in institutions whose standing is unknown, except upon examination. Definite advanced standing will not be given until the student has been in residence for at least one quarter.

Admission to the School of Law and the School of Journalism.—clear entrance to the College of Liberal Arts or the College of Science, and 102 hours (two years) of advanced credit in freshman and sophomore courses, covering all prescriptions for the junior certificate, are required for admission to the School of Law and the School of Journalism.

Admission to the Library School.—Students who have qualified for senior standing in the College of Liberal Arts or the elective curricula of the College of Science, having earned 145 credits including ten credits in military science or physical education and all required work except the completion of a major, may be admitted to senior standing in the Library School as candidates for the degree of bachelor of arts, the requirements for which can ordinarily be fulfilled in one academic year.

Graduate students who hold baccalaureate degrees from any college or university in good standing and whose undergraduate work has included the equivalent of at least 20 college credits in each of two modern foreign languages, German and French preferred, may be admitted to the Library School as candidates for the degree of bachelor of science in library science, the requirements for which can ordinarily be fulfilled in one academic year.

Admission of Normal School Graduates to Advanced Standing.—Graduates of the normal schools of this state and of institutions of like standing elsewhere, who have completed at least two full years of normal school work after graduating from a four-year accredited high school, will be admitted to junior standing in the Colleges of Liberal Arts, Science, or Education. For graduation with the degree of bachelor of arts, bachelor of science or bachelor of education, these students are required to earn a minimum of 90 credits in the University, including the satisfaction of such of the requirements for graduation from the respective colleges as have not been fairly covered by previous work. Normal graduates desiring admission to any of the other colleges of the University may be given such exemption or credit as their preparation seems to justify.

Admission to Graduate Standing.—A bachelor's degree from a college or university of good standing is required for admission to the Graduate School.

Auditors.—With the consent of the instructors concerned, any mature person, not registered as a student in the University, may be enrolled at the registrar's office as an auditor in not more than two courses, upon payment of a fee of \$10 per quarter. This provision does not apply to laboratory courses, or to any courses offered in the summer quarter.

No person may regularly attend any course in which he has not been registered, or enrolled as an auditor.

EXPENSES

Tuition and Fees.—By authority of the special legislative act of the session of 1921, the following tuition and fees will be collected beginning with the autumn quarter of 1921.

GENERAL TUITION FEES

Resident Tuition.—Fifteen dollars (\$15) general tuition per regular academic quarter from each student who has been domiciled within the state of Washington or the territory of Alaska for the period of one year prior to the date of registration.

Non-resident Tuition.—Fifty dollars (\$50) tuition per regular academic quarter from each student who has not been domiciled in the state of Washington or the territory of Alaska for the period of one year prior to registration.

Library Fee.—Five dollars (\$5) a quarter will be collected from each regular student, to be known as a library fee.

Associated Student's Fee.—An associated student membership fee of ten dollars (\$10) for the year (exclusive of summer quarter) is collected of all regularly enrolled students upon registration.

Exemptions.—All honorably discharged service men or women who served in the military or naval service of the United States during the late world war; and all honorably discharged service men who served in the military or naval services of any of the governments associated with the United States during the said war, provided they were citizens of the United States at the time of their enlistment and who are again citizens at the time of their registration in the University, are exempt from the payment of the general tuition fee, provided they have been domiciled in the state of Washington or territory of Alaska for the period of one year prior to the date of registration. If any such service men have not been domiciled in the state of Washington or territory of Alaska for one year prior to registration they are exempt up to twenty-five dollars (\$25) per quarter.

Deserving students who, after a quarter in residence have shown a marked capacity for the work done by them in school, in lieu of paying the general tuition fee, above provided for, may give their promissory notes with interest at the rate of four per cent per annum. All applications for this concession must be presented to the comptroller's office after receiving the endorsement of the dean of men and the dean of women.

Refunding Fees.—Tuition and other general fees are not returnable except in case of sickness or causes entirely beyond the control of the student. No portion of the returnable fees shall be returned for voluntary or enforced withdrawal after thirty (30) days from the date of registration of the students. In no case shall more than one-half of the fees be refunded. Students withdrawing under discipline forfeit all rights to the return of any portion of the fee.

OTHER CHARGES

Auditor's Tuition Fee.—A fee of \$10 a quarter will be charged all persons enrolling as auditors.

Part Time Tuition Fee.—A fee of \$10 a quarter will be charged persons registering for partial courses not exceeding six (6) credits.

Excess Tuition Fee.—A fee of \$1 per credit per quarter will be charged each student registering for excess hours.

High School Subjects.—A year hence all work taken in the University which might have been taken in the high school will be charged for as a special tuition fee.

Extension Service Tuition Fees.—Charges in extension work depend upon the assignments, ranging as follows: for twelve class sessions, \$8; eighteen sessions, \$12; twenty-four sessions, \$16; thirty sessions, \$20; and thirty-six sessions, \$24, and other courses at the same rate.

Law Library Fee.—Ten dollars (\$10) per quarter special law library fee from each student registering in law, in addition to the general tuition fee mentioned above. Students other than majors in law taking work in the School of Law will pay at the rate of one dollar (\$1) for each credit hour of law work elected up to a maximum of \$10 per quarter.

Short Course Tuition.—Twenty dollars (\$20 from each student registering in any short course—mining, forestry, fisheries, etc.

Summer Quarter Tuition.—Twenty dollars (\$20) from each student registering in the summer, for the quarter or any part thereof.

Marine Biological Station Tuition.—Thirteen dollars (\$13) of which ten dollars (\$10) is for tuition and three dollars (\$3) is for laboratory fee.

Military Uniform Deposits.—Each student who is held for military drill is required to make a deposit of \$15 before he draws his uniform. Thirteen dollars (\$13) of this amount is returnable upon the presenting of proper clearance papers from the military headquarters; the two dollars (\$2) is retained as a breakage fee. The making of this deposit in no way entitles the student to ownership in any part of the military equipment or clothing issued.

Special Examinations.—A fee of \$1 will be charged for all examinations given outside of the regular schedule.

Late Registration.—A penalty of \$2 is imposed for the first day's delay in registering and \$1 per day additional thereafter up to the close of the week during which registration is permitted.

Changes of Registration.—A fee of \$1 will be charged for changes in election, including additions or withdrawals of individual courses after completion of registration.

Diploma Fee.—The fee charged to graduates is \$5 for each one receiving a baccalaureate or higher degree, or a diploma in pharmacy, and \$5 for each one receiving a teacher's diploma. *This teacher's diploma fee does not include the legal registration fee of \$1 paid to that county school superintendent who first registers a teacher's diploma.*

LABORATORY FEES AND DEPOSITS

The following laboratory fees and deposits will be collected quarterly during the ensuing year, 1921-22. With few exceptions, these fees are not returnable in whole or in part, and in no case can any rebate be allowed after 35 days from the date of registration.

Anatomy.—105, 106, 107—\$3; 104—\$5; 101, 102, 103—\$7.50; 108 to be arranged.

Architecture.—54, 55, 56, 104, 105, 106, 154, 155, 156—\$2; 112, \$3.

Astronomy.—1, 11, 123, 171—\$2.

Bacteriology and Pathology.—4, 5, 101, 102, 104, 105—\$3; 110, 111, 112, 201, 202, 203, 204, 205, 206—\$4.

Botany.—8, 9, 10, 271, 272, 273—\$1; 1, 2, 3, 11, 12, 13, 14, 26, 53, 105, 106, 107, 111, 119, 130, 140, 141, 142, 143, 144, 145, 200, 233, 250, 251, 252, 253, 254, 261, 262, 263, 279, 280—\$2.50.

Ceramics.—180—\$5; 110, 191, 192, 193—\$10; 121, 122, 123—\$12; 131, 132, 133,—\$5 or \$10.

Chemistry.—All courses except 52, 200, 216, 221, 222, 223, 224, 225—\$7.50; breakage ticket—\$5; desk key—\$.50.

Civil Engineering.—1, 4, 21, 22, 23, 24, 27, 30, 38, 55, 56, 126, 142, 167—\$2.

Economics and Business Administration.—All courses \$1.50 except 81, 82, 83 (Typewriting) and 84,85,86,87 (Shorthand)—\$10; 11, 12 (Elementary accounting)—\$5.50; 64, 65, 111, 112, 154, 155, 156, 157—\$3.50.

Education.—171, 173, 186, 201, 202, 203, 285, 286, 287—\$2.

Electrical Engineering.—132, 141, 181, 182, 196, 198—\$2; 102, 110, 112, 122, 162, 164—\$4; 15, 20—\$6.

Fisheries.—3, 4, 5, 101, 102, 103, 104, 105, 117, S.C. 8, S.C. 9, S.C. 12, S.C. 13—\$3; S.C. 7, 106, 107—\$4.

Forestry and Lumbering.—1—\$2.50; 5, 51, 52, 53, 57b, 58, 101, 102, 104, 105, 183, 187, 188, 189, 213, 214—\$3.

Geology.—11, 12, 112, 113, S.C. 1,—\$1; 1, 2, 5, 31, 120, 123, 124, 131, 132, 133, 134, 135 S.C. 2—\$2.50; 21—\$3.

Home Economics.—3, 8, 11, 12, 43, 189, 193, 200, 207—\$2; 25, 27, 32, 35, 103, 112, 113, 121, 130, 133, 135, 140, 143, 188, 191, 192, 195, 204, 205, 206—\$4; 1, 2, 4, 5, 6, 105, 106, 107, 108—\$6.

Journalism.—90, 91, 92, 104, 105, 160, 161, 162—\$1; 51, 61, 75, 76, 101, 120, 130, 131, 133, 134, 135, 136, 140, 141, 142, 170, 171, 172, 173, 174, 175—\$2; (maximum fees for any one student \$2.50 per quarter.)

Library Science.—One or more courses—\$1.50 per quarter.

Lockers.—\$.50 per year at Mines, Chemistry, Engineering and Home Economics buildings.

Mechanical Engineering.—1, 2, 3, 53, 54, 55, 83, 105, 106, 107, 151, 152, 153, 167—\$2.

Metallurgy.—103, 163—\$5; 102—\$10; 153, 160—\$12; S. C. 1, 101—\$20.

Mining.—S. C. 2, S. C. 3—\$3; 101, 151—\$5; 152, 176—\$10; 153, 154, 155—\$5 or \$10.

Music.—18, 19, 20, 68, 69, 70, 118, 119, 120, 168, 169, 170—\$15 to \$27 the quarter for one lesson-hour according to instructor; piano practice rooms \$3 an hour per day for the quarter; pipe organ—\$12.50 an hour per day for the quarter.

Painting, Sculpture and Design.—5, 6, 7, 9, 10, 11, 53, 54, 55, 103, 104, 157, 158—\$2; 56, 57, 58, 72, 73, 74, 107, 108, 109, 160, 161, 162, 163, 164, 165—\$3.

Pharmacy.—15—\$1; 9, 10, 11, 109, 110—\$3; 7—\$4.50; 1, 2, 3, 5, 6, 105, 106, 107, 113, 114, 115—\$7.50; 121, 122, 123, 129, 130, 131, 201, 202, 203, to be arranged; breakage ticket—\$5; desk key—\$.50.

Physical Education.—\$.50 per quarter, locker and apparatus; paid by all taking one or more courses. Women's suits, style and cost to be arranged.

Physics.—1, 2, 3, 47, 48, 49, 50, 51, 89, 90, 97, 98, 99, 103, 104, 105, 106, 113, 170, 175, 180, 206—\$2.50; 54, 114—\$5; 169 to be arranged.

Political Science.—1—\$1.

Psychology.—1—\$2.

Zoology and Physiology.—1, 2, 3, 4, 5, 7, 8, 51, 101, 103, 106, 107, 155, 156, 157—\$2.50; 54, 55, 56, 108—\$3; 151, 152—\$5; 201, 202, 203 to be arranged.

Board and Room.—The University dormitories consist of Lewis hall and Clark hall for women and Lander hall and Terry hall for men. During the ensuing year \$32 a month will be charged for room and board at these residence halls. The rooms are furnished with necessary articles of plain furniture, but the student is expected to supply his own bed linen, bedding, towels, and rugs.

An amount equal to the first month's account is paid in advance and left on deposit to be applied on the board and room account for the last month of the school year.

All remittances should be made in favor of the University of Washington and be addressed to the comptroller of the University of Washington, Seattle.

The University also operates The Commons on the campus where students so desiring may secure the best of food at reasonable rates, cafeteria style.

Outside the campus, board and room may be secured at rates ranging from \$40 to \$50 a month.

University Health Service.—A health service is maintained by the University in conjunction with the Associated Students. Ten per cent of the fees collected by the Student Association, for its special activities, is assigned to the health fund, out of which the infirmary is maintained. The University provides a suitable building, with equipment, a corps of two physicians and two nurses. The infirmary contains medical offices for both men and women, nurses' offices and quarters, and 40 beds. Medical advice and office treatment are available at all times. The disposition of the case is determined on report of visit of the public health nurse. If the patient is a contagious suspect, or if he is in unsatisfactory quarters, he is taken to the infirmary and cared for free of cost, except for board. If serious disease develops he is transferred to one of the Seattle hospitals of his choice, and further responsibility of the University health service ceases. In the event of scarlet fever, or smallpox, the patient is sent to Firlands Sanitarium and cared for by the city. An outside physician may be called in at any time at the patient's expense.

Student Help.—A considerable number of students who have found it necessary to support themselves, in part or wholly, while at the University, have been enabled to do so by securing occupations of various sorts. There is an employment bureau for men conducted by the Y. M. C. A. to secure work for men who have to make their own expenses, and the dean of men assists in placement. The dean of women renders a similar service for women.

It is necessary, however, to advise caution in entering the University without funds. The University cannot be responsible for finding work for students. During periods of business depression it is especially difficult to secure part time work. It is not advisable for anyone to register unless he has in hand sufficient funds to maintain him for a quarter. This requires a minimum of \$200. Students who expect to earn a portion of their support should not register for a full schedule of studies.

ACADEMIC AND VOCATIONAL GUIDANCE

Dean of Men.—The dean of men is held responsible for the welfare and discipline of the men students of the University. He will have supervisory charge of Lander and Terry halls, the men's dormitories; and will supply lists of approved boarding and lodging places for men.

Advice will be given concerning the courses of study and vocational fields. The dean is always ready to aid students in any of their individual or group problems.

Dean of Women.—The dean of women is always ready to help or advise any woman student who may need assistance. She will supply lists of approved boarding and lodging places, correspond

with parents or guardians who desire to make inquiry concerning their daughters or wards, give advise regarding courses of study, and offer vocational information of a general nature. She acts as counselor to the officers of organizations for women and supervises all student houses of residence.

Vocational Secretary.—The office of vocational secretary assumes the responsibility of all placement work. It is desirable that every student have a conference with the vocational secretary sometime before graduation. The office is also available to undergraduates for the purpose of advisement. The vocational secretary is also the executive secretary of the alumni association of the University. A great mutual service may be rendered by reporting to this office any positions open that would be of interest to University graduates. Offices, Administration Hall.

STUDENT GOVERNMENT

As a result of action taken by the A. S. U. W. and ratified by the faculty, the plan has been adopted of having the student members of the board of control act as a discipline committee to deal with cases of scholastic dishonesty, and other misconduct among students that may be referred to it by the administration.

DEGREES

It is not the policy of the University to grant honorary degrees.

Degrees with Honors.—A degree with honors may be conferred upon a student who, upon recommendation of the honors committee and upon vote of the faculty is declared worthy of unusual distinction. Early in May each head of a department brings to the attention of the committee on honors such seniors majoring in his department as he thinks may be eligible for honors. A student is not allowed to take honors in more than one subject.

NORMAL DIPLOMAS

The University Normal Diplomas.—The University is authorized by law to issue teacher's diplomas, valid in all public high schools of the state. Candidates for these diplomas should register in the department of education as early as possible after the beginning of the sophomore year, and should consult with the department from time to time as to their work for the diploma and their preparation for teaching. Fuller information may be found in the bulletin of the College of Education.

SENIOR SCHOLARS

Senior Scholars.—In June preceding their senior year, juniors who have 132 or more credits with high grade may be elected senior scholars. A senior scholar may be relieved from attendance at regular lectures or recitations, and may be granted other special

privileges in order that he may devote himself to more intensive and more correlated study than the classroom system permits. His work must be in not less than two or more than four allied subjects and it must be correlated so that it will bear upon some common field.

FELLOWSHIPS, SCHOLARSHIPS, AND AID

Graduate Fellowships.—Three Sarah Loretta Denny fellowships of \$500 each for the pursuit of graduate study in any department. Applications for these fellowships should be made to the dean of the graduate school on blanks supplied by him, and must be in his hands on or before March 15, preceding the academic year for which the fellowships are to be granted.

Six Arthur A. Denny fellowships of \$500 each, for the pursuit of graduate study in the departments of education, English, history, civil engineering, mining engineering and pharmacy respectively. Awarded on the basis of scholastic excellence and general merit, but only to those who need financial assistance. Applicants must be residents of the state of Washington. Applications for these fellowships should be made to the dean of the graduate school or to the heads of the departments concerned. They must be filed on or before March 15, preceding the academic year for which the fellowships are to be granted.

Fellowships in physics and chemistry, offered by the National Research Council, are open to promising research students, preferably those who have already taken the doctor's degree. A successful candidate can pursue his research at this University. The salary will ordinarily be \$1500 for the first year. Fellows are eligible for successive reappointments, ordinarily with increase of salary. For details address the dean of the graduate school or the heads of the departments concerned.

The College of Mines of the University in cooperation with the United States Bureau of Mines offers four fellowships in mining and metallurgical research. The fellowships are open to graduates of universities and technical schools who are properly qualified to undertake research work. The value of each fellowship is \$900 per year of twelve months. Fellowship holders are required to register as graduate students and to become candidates for the degree of master of science in mining engineering or metallurgy, unless an equivalent degree has previously been earned. Applications are due not later than May 15, and should be addressed to the dean, College of Mines, University of Washington, Seattle, Washington.

The university honor fellowships are awarded annually, under the same scholarship qualifications as those obtaining for the Denny fellowships.

The Du Pont Fellowship.—The E. I. Du Pont de Nemours & Company of Wilmington, Delaware, offers an annual fellowship

of \$700 for the purpose of encouraging advanced students to continue the study of chemistry. The fellowship is to be granted to a graduate student who makes chemistry or chemical engineering his major subject.

The Mars Fellowship.—A research fellowship in astronomy, given by the late Dr. Percival Lowell, of the Lowell Observatory, Flagstaff, Arizona, carrying a stipend of \$600, may be awarded annually.

Columbia University Fellowship.—Columbia University offers each year a fellowship of \$250, open to students in mining, engineering, and chemistry.

Scholarship in Piano Study.—Mr. A. F. Venino offers an annual scholarship to the candidate showing the greatest proficiency and promise in piano playing. This scholarship carries free tuition for one weekly lesson throughout the autumn, winter and spring quarters. All candidates must submit their application in writing to Dean Glen before September 1.

Isabella Austin Scholarship.—The Isabella Austin scholarship for entering freshman women was established in 1916 from the income of a fund given in memory of Isabella Austin, dean of women, University of Washington, 1909-1915. The award is made annually to a young woman of promise on the basis of scholarship and financial need.

Chemistry Scholarship.—An anonymous donor offers a scholarship of \$100 annually to the student doing the best work in chemistry.

The Rosenberg Scholarship.—Mrs. Ella S. Rosenberg of Seattle has established a scholarship in French to be known as the "Samuel Rosenberg Scholarship, endowed in loving memory by his wife, Ella S. Rosenberg." This scholarship produces \$200 a year and is to be awarded annually to the student who, in the opinion of the department, is the most worthy of it. In making this award, account will be taken of the scholarship, personality and needs of the candidates.

Washington Alumnae Scholarship.—The Washington Alumnae offers an annual scholarship of \$100 to be awarded to a woman member of the Junior Class on the basis of scholarship, activity in student affairs, personal character and wholesome influence in university life.

Imperial Order of Daughters of British Empire Scholarship.—The Vimy Ridge Chapter of the Imperial Order of the Daughters of the British Empire offers an annual prize of \$100 for an essay on some phase of history, politics, philosophy or sociology making distinctly for the maintenance and development of good relations between Great Britain and the United States. It is open to all students.

The Gamma Phi Beta Scholarship.—The Seattle Alumnae of Gamma Phi Beta offers an annual scholarship of \$100 to that woman among the English major students who most nearly fulfills the following conditions: partial or complete financial self-dependence, high scholarship, strength of personality, wholesomeness of influence and promise.

PRIZES

For Excellency in Public Speaking and Debate.—Judge Alfred Battle offers an annual cash prize of \$75 to the Washington debating team chosen to meet representative debaters from the University of Oregon.

Each alternate year, beginning with the spring of 1908, the Seattle Bar Association gives the sum of \$50 to defray the expenses of a debate between the representatives of the law schools of Oregon and Washington.

For Essays.—The Philo Sherman Bennett prize of \$24 annually is "for the best essay discussing the principles of free government."

In memory of the Hon. Edwin A. Jaggard, late justice of the supreme court of Minnesota, Miss Anna Wright Jaggard offers an annual cash prize of \$50 for the best essay on a topic connected with courses in history of law or jurisprudence.

The University State Bank offers an annual cash prize of \$25 for the best essay on banking, submitted by a student in the College of Business Administration.

The Judge Kenneth Mackintosh Prize in Debate.—Judge Kenneth Mackintosh offers an annual prize of \$75 to the University of Washington debating team, consisting of two men, who compete with Leland Stanford Junior University in debate.

For Scholarship in Italian.—Mr. N. Paoella, of Seattle, offers a gold medal each year, beginning with 1913, for a period of ten years, to the student doing the best work in Italian.

Men's Freshman Latin Prize.—Through the kindness of a friend of the University, a prize of \$50 in gold will be awarded to the man in the freshman class who passes the best examination in the Latin work of the year.

For Scholarship in French.—Judge Thomas Burke offers two cash prizes, one of \$15 and one of \$25, for general excellence in French.

Military Science Prize.—The members of the Non-commissioned Officers Training School have established a fund of \$400, the income of which shall be utilized as a prize to be awarded to the student completing his junior year with the highest honors in military science.

The Sigma Delta Chi Prize.—The Sigma Delta Chi fraternity offers a prize of \$100 to be awarded to the student who writes the best ten editorials published in the University of Washington Daily during the current year.

The A. B. C. China Club Prize.—The A. B. C. China Club Prize of \$25 is awarded annually for the best pamphlet giving in outline a statement of facts concerning China that would be of particular interest to business men.

The Burke China Club Prize.—The Burke China Club Prize of \$25 is awarded annually for the best essay on some subject related to the Chinese Literature, History or Language. Competitors are restricted to those who have had at least one term's work in Chinese Literature, History or Language.

The Kellogg Prize in Architecture.—The William W. Kellogg Prize of \$20 is awarded annually for competitive work in architecture and design and is open to juniors and seniors.

Prizes in Italian.—The Frank Buty Prize of \$20 is offered annually for the best essay on some subject related to the Italian Language and Literature.

The Silvio Risegari Prize.—The Silvio Risegari Prize of \$50 is offered annually to the student in the College of Fine Arts who, at the end of the freshman year, shall have given evidence of superior scholarship in Italian.

The Italian Commercial Club Prize.—The Italian Commercial Club of Seattle offers a first prize of \$75 and a second prize of \$50 to the two students in the University who attain distinction in second-year Italian.

The Felix Rosaia Prize.—The Felix Rosaia Prize of \$25 is offered annually to the student who makes the greatest progress in the Italian Language during the freshman year.

The A. Merlino Prize.—The A. Merlino Prize of \$25 is offered annually to the student in the College of Science who writes the best essay on "An Italian Scientific Advancement During the Year."

Cattenari Brothers' Prize.—Cattenari Brothers offer an annual prize of \$25 to the student in first- or second-year Italian who has made the greatest progress during the year.

STUDENT LOAN FUNDS

Several loan funds have been established which help considerably in the efforts of the University authorities to assist students, both men and women, through financial emergencies. These are placed at a low rate of interest in small amounts for short periods. Students interested in securing this assistance should consult the dean of men or the dean of women as the case may be.

ASSOCIATIONS AND CLUBS

Alumni Association.—The permanent executive secretary of the Alumni Association is J. G. Fletcher, who is also vocational secretary of the University, with offices in Administration hall.

Associated Students.—The Associated Students of the University of Washington (A. S. U. W.) is the central organization which conducts the activities of the student body. Membership is required of all regularly enrolled students and the \$10 fee (\$1 for summer term) entitles the student to a subscription to *The Daily*, free admission to all regularly scheduled athletic, debating and oratorical contests, the annual musical concert, the discounts in the co-operative book store and to all the voting and other privileges of the association.

The management is vested in an annually elected Board of Control, composed of fifteen members, including students, faculty and alumni. Its standing committees are athletic, finance, publication and student interests. This body appoints a graduate manager to direct the activities with the aid of student managers. In 1920-1921 the business transacted amounted to \$176,000 besides the Stadium fund. An office is maintained by the graduate manager in room 105, Commerce hall. A manager is also appointed annually to manage the book store. In 1920 the book store sales amounted to \$165,930.94.

Christian Associations.—The Young Men's and Young Women's Christian Associations each maintain an organization among the students. They are active in making the new students feel at home and in assisting them in many ways. The "W" book or student handbook will be ready for distribution at registration time. The University Y. M. C. A. is located in the Men's building, and will be glad to assist all men of the University in finding rooms, and part-time employment if desired.

Department Clubs.—The following clubs are connected with the work of different University departments: Chemical Club, Classical Club, Deutscher Verein, English Club, Fisheries Club, Forest Club, French Club, Home Economics Club, Mathematics Club, Pharmacy Club, Political Science Club, Scandinavian Club, Spanish Club.

Debating.—There are four debating and literary societies in the University: Stevens, Badger, Athena and Sacajawea. The first two are for men, the last two for women. Membership in the clubs is limited in order that frequent practice may be afforded.

The Pacific Coast Triangular Debating League, consisting of the Universities of Washington, Oregon, and Stanford, holds an annual triangular debate. Each institution has two teams, representing the affirmative and negative of the question under discussion.

The men of the University also have dual debate leagues with Whitman College, Oregon Agricultural College and British Columbia University.

The women of the University have similar dual leagues with the University of Oregon and Whitman College.

Musical Organizations.—The musical organizations consist of the University Choral Society, Men's Glee Club, Women's Glee Club, Orchestra and Band.

Philological Association.—The Philological Association was organized to encourage scientific investigation in language and literature. Membership is open to all members of the University who are interested in philology.

Honor Societies.—The following honor societies have been established at the University: Phi Beta Kappa, Sigma Xi, Phi Delta Phi, Phi Delta Chi, Phi Delta Kappa, Phi Lambda Upsilon, Tau Kappa Alpha, Theta Sigma Phi, Sigma Delta Chi, Mim Kaph Mim, Tau Beta Pi, Mu Phi Upsilon, Alpha Kappa Psi, Beta Gamma Sigma, Phi Sigma Chi, Phi Lambda Theta, Hammer and Coffin, Pan Xenia, Phi Delta Delta, Phi Alpha Delta.

Washington University State Historical Society.—The Washington University State Historical Society has for its purpose the preserving of the historical documents and records of the Northwest and of the state of Washington, and to preserve or publish the results of all investigations.

GENERAL SCHOLASTIC REGULATIONS

STUDIES

At the beginning of each quarter, the student arranges his schedule of studies with the advice and assistance of his class officer. A regular course consists of fifteen or sixteen hours of recitations per week.

All women students are required to take three hours of gymnasium work per week throughout the first and second years, ten credits in physical culture being required of women for a degree.

A course of two years in military training is required. All able-bodied male students except those from foreign countries, not intending to become naturalized, must take the course which by regulation of the University is required during the first and second years.

Neither the requirement of physical education for women, nor that of military science for men applies to any student entering as a junior or senior, providing the student has fulfilled the requirements in these subjects laid down by the institution from which he comes. The deans, together with the physical director, or commandant, as the case may be, have authority to allow a student to substitute the proper corresponding amount of scholastic work for gymnasium or military science when it seems advisable. Substitu-

tions to be valid must be signed by the dean concerned and the physical director or commandant, and must be filed in the office of the registrar.

PHYSICAL EXAMINATIONS

All students on entering the University for the first time are required to present themselves for physical examination at the call of the department of physical education. Failure to be examined constitutes a delinquency on the records.

REGULATIONS FOR WITHDRAWAL

Withdrawal is the voluntary severance by a student of his connection with a course or with the University and is indicated on the registrar's books by a "W." During the first four weeks of a quarter, a student may withdraw from a course and be given a "W" with the written consent of his dean and his instructor. If he desires to withdraw at a later period, he may do so, as above, but if his work has not been satisfactory he shall be given an "E" instead of a "W"; provided, however, that, if in either case, a withdrawal will reduce the student's hours below 12, it must be approved by his dean. A student who drops a course without withdrawing shall be given an "E" in the course.

SCHOLARSHIP STANDING

Any student who is reported at any time during a quarter as doing unsatisfactory work in two or more of his subjects, aggregating more than one-third of his registered hours, shall be placed on probation for the remainder of said quarter. If at the end of the quarter he fail in two or more subjects, aggregating more than one-third of his registered hours, he shall not be allowed to re-register except under conditions prescribed by his dean, who shall be his registering officer.

Appeal from the decision of the dean may be taken to the board of deans.

Any student who fails in two or more subjects, aggregating more than one-third of his quarter's work shall be placed on probation for the following quarter. If in said following quarter said student fail in more than one-half of his registered hours, he shall not be allowed to register except on recommendation of the board of deans.

Any student who fails in more than one-half of his registered hours, after the first quarter of residence, will not be allowed to re-register, except by permission of the board of deans.

ELIGIBILITY FOR RE-REGISTRATION IN AUTUMN OF 1921 AND THEREAFTER

To be eligible for re-registration during the autumn quarter, 1921-1922, a student must make grades of A, B or C in two-thirds of his hours for the spring and summer quarters of 1921, if in attendance during one or both of these quarters.

To be eligible for re-registration during the academic year, 1922-1923, or any succeeding academic year, a student must have made grades of A, B or C in two-thirds of his hours for his last academic year; provided, that any student eliminated by this rule shall be eligible for re-registration after an interval of one succeeding autumn, winter or spring quarter.

EXAMINATIONS

The regular quarterly examinations are held during the last week of each quarter.

In certain courses running through two or more quarters the examination on the work of the first quarter is merely qualifying, final credit not being given until the examination for the entire course has been passed.

SYSTEM OF GRADES

1. The following is the system of grades:*

A	-----	Honor
B	-----	} Intermediate
C	-----	
D	-----	
E	-----	
	-----	Failed
1	-----	Incomplete

(An incomplete is given only in case the student has been in attendance and done satisfactory work to a time within two weeks of the close of the quarter.)

2. Candidates for the bachelor's degrees in the colleges of Liberal Arts, Science, Education, Business Administration, Fine Arts, Forestry, and the Library School and the School of Journalism, must receive grades of A, B, or C in three-fourth of the credits required for their respective degrees. This rule became operative in June, 1913, and does not apply to grades given before the year 1910-11.

FRATERNITY PLEDGING

No fraternity or sorority shall pledge any person for membership whose registration in the University is not complete.

Registration is complete when the election blank has been signed by the student and all required registering officers, when all required fees have been paid, and when all blanks have been left in the registrar's office or other place designated by him.

No student having less than junior standing shall be initiated into a fraternity or sorority until he or she has earned eighteen credits or provisional credits in two quarters, or fifteen in one quarter, at this University. Credits or provisional credits for work taken to remove entrance conditions may not be counted.

Candidates for initiation into either fraternities or sororities shall secure from the registrar's office a certificate of eligibility.

*These grades correspond approximately to the old marking scheme as follows: A, 100-96; B, 95-86; C, 85-76; D, 75-70; E, 70-0.

COLLEGE OF LIBERAL ARTS

THE FACULTY

HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT
JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES
DAVID THOMSON, B. A. (Toronto), Professor of Latin; DEAN
EDMOND STEPHEN MEANY, M. S., (Wisconsin), Professor of History.
J. ALLEN SMITH, PH. D. (Michigan), Professor of Political Science.
CAROLINE HAYEN OBER, Professor of Spanish.
FREDERICK MORGAN PADELFORD, PH. D. (Yale), Professor of English and Dean of the Graduate School.
WILLIAM SAVERY, PH. D., (Harvard), Professor of Philosophy.
PIERRE JOSEPH FREIN, PH. D. (Johns Hopkins), Professor of Romanic Languages.
HERBERT HENRY GOWEN, D. D. (Whitman), Professor of Oriental Languages and Literature.
OLIVER HUNTINGTON RICHARDSON, PH. D., (Heidelberg), Professor of European History.
VERNON LOUIS PARRINGTON, A. B., (Harvard), A. M. (Emporia), Professor of English.
FREDERICK ELMER BOLTON, PH. D. (Clark), Professor of Education and Dean of the College of Education.
EDWIN JOHN VICKNER, PH. D. (Minnesota), Professor of Scandinavian Languages.
ALLEN ROGERS BENHAM, PH. D. (Yale), Professor of English.
STEPHEN IVAN MILLER, JR., A. B. (Stanford), LL. B. (Michigan), Professor of Economics and Dean of the College of Business Administration.
FRED CARLTON AYER, PH. D. (Chicago), Professor of Education.
HOWARD B. WOOLSTON, PH. D. (Columbia), Professor of Sociology.
CLIFFORD WOODY, PH. D. (Columbia), Professor of Education.
THOMAS KIBLER, PH. D. (George Washington University), Professor of Transportation.
HOWARD THOMPSON LEWIS, M. A. (Wisconsin), Professor of Business Administration.
LOREN DOUGLAS MILLIMAN, A. B. (Michigan), Associate Professor of English.
THOMAS KAY SIDET, PH. D. (Chicago), Associate Professor of Latin and Greek.
EDWARD McMAHON, A. M. (Wisconsin), Associate Professor of American History.
GEORGE WALLACE UMPHREY, PH. D. (Harvard), Associate Professor of Romanic Languages.
OTTO PATZER, PH. D. (Wisconsin), Associate Professor of French.
VANDERVEER CUSTIS, PH. D. (Harvard), Associate Professor of Economics.
EDWARD GODFREY COX, PH. D. (Cornell), Associate Professor of English.
WILLIAM DANIEL MORIARTY, PH. D. (Michigan), Associate Professor of Business Administration.
HARRY EDWIN SMITH, PH. D. (Cornell), Associate Professor of Business Administration.
WILLIAM EDWARD COX, A. M. (Texas), Associate Professor of Business Administration.
GEORGE EARL FREELAND, PH. D. (Clark), Associate Professor of Education.
HOWARD HALL PRESTON, PH. D. (Iowa), Associate Professor of Business Administration.
CHARLES GOGGIO, PH. D. (Wisconsin), Associate Professor of Romanic Languages.
RODERICK DUNCAN MCKENZIE, PH. D. (Chicago), Associate Professor of Sociology.
ROBERT MAX GARRETT, PH. D. (Munich), Assistant Professor of English.
HARVEY BRUCE DENSMORE, A. B. (Oxford), Assistant Professor of Greek.
ERNEST OTTO ECKELMAN, PH. D. (Heidelberg), Assistant Professor of German.
CHARLES LOUIS HELMLINGE, A. M. (Washington), Assistant Professor of Romanic Languages.
THERESA SCHMID McMAHON, PH. D. (Wisconsin), Assistant Professor of Economics.
SERENO BURTON CLARK, PH. D. (Harvard), Assistant Professor of Latin and Greek.
MAY MILLMORDE SKINNER, PH. D. (Harvard), Assistant Professor of Business Administration.
CURT JOHN DUCASSE, PH. D. (Harvard), Assistant Professor of Philosophy.
VICTOR LOVITT CHITTICK, PH. D. (Harvard), Assistant Professor of English.
GEORGE HENRY JENSEN, B. S. (Valparaiso), Assistant Professor of Vocational Education and Supervisor of Teacher Training in the Trades and Industries.
CARL DAKAN, B. S. (Missouri), Assistant Professor of Business Administration.
CURTIS TALMADGE WILLIAMS, PH. D. (Clark), Assistant Professor of Education.
JOSEPH BARLOW HARRISON, A. B. (Oxford), Assistant Professor of English.
RUDOLPH HERBERT ERNST, PH. D. (Harvard), Assistant Professor of English.
PAUL WASHINGTON TERRY, PH. D. (Chicago), Assistant Professor of Education.

LOUIS PETER DE VRIES, PH. D. (Wisconsin), Assistant Professor of Romanic Languages,
 WINNIFRED S. HAGGETT, A. M. (Michigan), Associate in English.
 VICTOR JOHN FARRAR, A. M. (Wisconsin), Associate in Historical Research.
 MILDRED STRUBLE, A. M. (Washington), Associate in English.
 PAMELIA JONES, M. A. (Iowa State University), Associate in English.
 SYLVIA FINLAY KERRIGAN, A. B. (Washington), Associate in English.
 ERRA DAHLIN, A. B. (Washington), Associate in History.
 WILBER PATCHIN, B. ED. (Washington), Associate in Spanish.
 OLIVE McCABE, B. A. (Wellesley), Associate in Sociology.
 JEANNE MERCIER, B. S. (Whitman), Associate in French.
 GERTRUDE BROWNING, M. A. (Columbia), Associate in English.
 HERBERT PHILLIPS, A. B. (Washington), Associate in Philosophy.
 BERTHA ALMER VICKNER, A. M. (Washington), Associate in English.
 ALICE ERNST, A. M. (Washington), Associate in English.
 ALMIRA BONHAM, B. L. (California), Associate in Spanish.
 WALTER BELL WHITTLESLEY, A. M. (Washington), Instructor in French.
 FRANK LAUDE, A. M. (Washington), Instructor in Political Science.
 MAX PATTEN PHILBRIK, A. B. (Colby), Instructor in Romanic Languages.
 RALPH MASON BLAKE, PH. D. (Harvard), Instructor in Philosophy.
 HARRY EWART GREGORY, M. A. (Chicago), Instructor in Business Administration.
 KARL ELIAS LEIB, B. A. (Stanford), Instructor in Business Administration.
 HERBERT A. STURGES, M. A. (Oberlin), Instructor in Sociology.
 OSCAR ELDRIDGE DRAPER, M. ACCTS. (Vories), Instructor in Business Administration.
 JOHN GERALD DRISCOLL, LL. B. (Stanford Business College), Instructor in Accounting.
 WILLIAM W. EDDY, A. M. (Harvard), Instructor in History.
 GENO VINCENT MEDICI DE SOLENNI, A. M. (Ohio State University), Instructor in Romanic Languages.
 VON VALJEAN TARBILL, M. B. A. (Harvard), Instructor in Business Administration.
 LESLIE SPIER, PH. D. (Columbia), Instructor in Anthropology.
 JAMES LAND ELLIS, A. B. (Washington), Instructor in History.
 HAROLD TURPIN, Assistant in Business Administration.
 ELIZABETH WRIGHT, A. B. (Mount Holyoke), Assistant in English.
 CONSTANCE BURNHAM, B. A. (Wellesley), Assistant in English.
 RACHEL HAMILTON, B. LIT. (Whitman), Assistant in French.
 HELEN HADLEY, B. A. (Smith), Assistant in English.
 BETH McCausland, A. B. (Washington), Assistant in English.
 ELEANOR MARIA SICKLES, A. B. (Whitman), Assistant in English.

TREVOR KINCAID, A. M. (Washington), Professor of Zoology.
 FREDERICK ARTHUR OSBORN, PH. D. (Michigan), Professor of Physics and Director of the Physics Laboratories.
 DAVID CONNOLLY HALL, M. D. (Chicago), University Health Officer and Professor of Hygiene.
 IRVING MACKEY GLEN, A. M. (Oregon), Professor of Music and Dean of the College of Fine Arts.
 EFFIE ISABEL RAITT, M. A. (Columbia), Professor of Home Economics.
 STEVENSON SMITH, PH. D. (Pennsylvania), Professor of Psychology.
 WILLIAM PIERCE GORSUCH, A. B. (Knox), Professor of Dramatic Art.
 JAMES EDWARD GOULD, A. M. (Harvard), Professor of Maritime Commerce.
 SAMUEL LATIMER BOOTHROD, M. S. (Colorado Agricultural College), Associate Professor of Astronomy.
 GEORGE BURTON RIGG, PH. D. (Chicago), Associate Professor of Botany.
 ALLEN FULLER CARPENTER, PH. D. (Chicago), Associate Professor of Mathematics.
 EDWIN JAMES SAUNDERS, A. M. (Harvard), Assistant Professor of Geology.
 FRED HARVEY HEATH PH. D. (Yale), Assistant Professor of Chemistry.
 MARY EMMA GROSS, A. M. (Columbia), Assistant Professor of Physical Education and Hygiene.
 JAMES GEORGE ARDUTHNOT, B. S. (Kansas State College), Assistant Professor of Physical Education.

COLLEGE OF LIBERAL ARTS

The College of Liberal Arts provides instruction in the languages, education, economics and business administration, history, philosophy, political science, and sociology. Together with the College of Science, it affords the student an opportunity to acquire a general education which shall serve as a sure foundation for real success in whatever profession he may choose. In the College of Liberal Arts the junior certificate plan is in operation, through which the work of the high school is closely articulated with that of the college. In order to obtain the degree of bachelor of arts, it is necessary for the student first to obtain his junior certificate. This represents the satisfactory completion of the work of the first two years in college, and leads, after two more years of work, to the degree. The details of the plan are set forth below.

It is highly desirable that students entering the college of Liberal Arts from another institution should obtain from the registrar, as soon as possible, a statement of what they must do in order to be granted the junior certificate and later, their bachelor's degree. Otherwise, by failing to fulfill the requirements, they will find their graduation postponed for a quarter or more, despite the fact that they may have earned credits sufficient in number to entitle them to the degree.

*REQUIREMENTS FOR ADMISSION

Correspondence.—Credentials and all correspondence relating to admission to any college or school of the University should be addressed to the Registrar, University of Washington, Seattle.

Freshman Standing.—Freshman standing in the University is granted to any recommended graduate of a four-year accredited secondary school who presents fifteen units[†] of credit, distributed as follows:

- (a) 3 units of English.
- (b) 1 unit of algebra.
- (c) 1 unit of plane geometry.
- (d) 8 units selected from one of the following groups (or 2 units, if 3 units of mathematics are presented).
 - (1) Foreign language, either ancient or modern, (at least 2 units in one language; not less than one unit will be counted in any language).
 - (2) History, civics, economics (at least one unit to form a year of consecutive work in history).
 - (3) Physics, chemistry, botany, zoology, general biology, physical geography, geology, physiology. (Not less than one unit will be counted in physics, chemistry, or general biology. No science will be counted as applying on this requirement unless it includes a satisfactory amount of laboratory work).
- (e) 2 units in subjects presented in the above groups (1)-(3).
- (f) 5 units selected from subjects accepted by an approved high school for its diploma. Not less than one full unit will be counted in physics, chemistry, general biology, or a foreign language. A maximum of 4 units will be counted in vocational subjects, except for admission to the College of Business Administration. For admission to this college only, a maximum of 8 units in vocational subjects will be accepted, of which at least 4 units must be in commercial branches; and a student

*More detailed information concerning admission is furnished on pages 43-47.

†To count as a "unit", a subject must be taught five times a week, in periods of not less than forty-five minutes, for a school year of not less than thirty-six weeks.

presenting 8 such vocational units and 2 units in history, and fulfilling requirements (a), (b) and (c), will be given freshman standing in that college without being held for requirements (d) and (e). If the student is transferred later to another college, only 4 vocational units will be counted, and the student will be required to meet the requirements (d) and (e).

A candidate who fulfills these requirements will be admitted to freshman standing in any of the colleges of the University. However, if he has not taken in high school, certain of the subjects recommended for admission to the college that he may decide to enter, he must take them in the University, or if they are not offered in the University, he must take them in some secondary school, or with a tutor. Such subjects if taken in the University, may apply toward a degree, as far as elective courses make this practicable. In certain curricula, however, these subjects must be taken in addition to the prescribed subjects.

A student having any such deficiency is required to register so that the deficiency will be removed by the end of his fourth quarter of residence. A student failing to meet this requirement is ineligible for re-admission until the deficiency has been removed.

Entrance with condition, to freshman standing, is not permitted. Excess admission credit does not establish any presumptive claim for advanced standing, unless the student has taken in high school a graduate course of at least one semester.

Grouping of Subjects in Preparation for Admission.—In addition to the three units of English and two units of mathematics required of all students for admission to the University, the student expecting to enter the college of Liberal Arts is advised to take as many as possible of the subjects specified on a succeeding page among "Requirements of the Lower Division," under group 2, "Subjects Required Either in High School or College." He should also note paragraph 4 on the same page entitled, "subjects Conditionally Required in College." A careful observance of these paragraphs will furnish a more complete preparation for college work, and will give the student correspondingly greater freedom of election in college.

Admission of Normal School Graduates to Advanced Standing.—Graduates of the normal schools of this state and of institutions of like standing elsewhere, who have completed at least two full years of normal school work after graduating from a four-year accredited high school, will be admitted to junior standing in the College of Liberal Arts. For graduation with the degree of bachelor of arts, these students are required to earn a minimum of 90 credits in the University, including the satisfaction of such of the requirements for the degree of bachelor of arts as have not been fairly covered by previous work. Claims for advanced university credit based on excess normal credit will be passed on by a committee consisting of the registrar, the dean of the college and the heads of the departments concerned.

REQUIREMENTS FOR THE DEGREE OF BACHELOR OF ARTS

To secure the degree of bachelor of arts (A. B.) the student must complete not less than a total of 192 credits and must observe the restrictions in regard to major and group requirements, scholarship requirements, and the requirements of the lower division and upper division.

I. MAJOR AND GROUP REQUIREMENTS

(a) From 36 to 60 credits must be in a single department known as the major department (except that with a major in English, 10 credits in English 1-2 may be counted in addition to 60 credits in other English courses).

(b) The number of credits taken in the major and any other single department combined must not exceed a total of 96 (except that when English is combined with the major department for the purpose of this total, credits in English 1-2 may be disregarded).

(c) Not less than 72 credits must be in the group in which the major department falls. For this purpose the departments are grouped as follows:

Group 1. Language and Literature.—Classical languages and literature, English, German, Oriental literature, Romanic languages and literature, Russian, Scandinavian.

Group 2. Philosophical.—Economics and business administration, education, history, philosophy, political science, sociology.

The group requirement of 72 credits does not apply to majors in home economics.

II. SCHOLARSHIP REQUIREMENTS

Not less than three-fourths of the credits required for graduation must be earned with grades of A, B, or C.

III. REQUIREMENTS OF THE LOWER DIVISION

The work of the lower division comprises the studies of the freshman and sophomore years of the undergraduate curriculum and leads to the junior certificate. This work consists primarily of the elementary or introductory courses of the various departments.*

* *NOTE.*—The following (or their equivalents) constitute the courses of the Lower Division:

1. Modern Foreign Language: The first two years.
2. Ancient Language: Intermediate Latin; the first two years of college work; course in civilization and literature.
3. English: Composition; freshman and sophomore literature.
4. Mathematics and the Natural Sciences: The elementary courses (1 and 2) or equivalents.
5. History: The introductory courses in each line, e. g., medieval and modern (1-2-3), American (57-58-59), English (5 and 6), ancient (71-72-73).
6. Philosophy and Psychology: Elementary or introductory course in each line, e. g., general psychology, introduction to philosophy, ethics, logic.
7. Political and Social Science: Introducing courses in economics, government, sociology.
8. Education: Introductory course, viz., Principles of Education.

Its aim is to supplement the work of the high school, to contribute to a broad general training in preparation for the advanced work of the upper division.

To receive the junior certificate the student must have earned not less than 90 college credits (together with required credits in military science or physical education), and must have completed, in high school and college together, the amount of work specified in the subjects mentioned below. In addition thereto, he must have satisfied the qualitative test prescribed in English composition. The object of these requirements is to secure for the student a knowledge of a wide range of subjects, to distribute his knowledge over the fundamental fields. To this end the high school and college are viewed as essentially a unit.

The required subjects are grouped as follows:

1. *Subjects Required in High School.*

- (a) English, 3 years (3 units).

In addition to the completion of this amount of work in English, the student must show by a test examination *proficiency in English composition*, or he must take English composition in the University, as provided under requirement (c) below.

- (b) Elementary algebra, 1 year (1 unit).

- (c) Plane geometry, 1 year (1 unit).

Subjects (a), (b), and (c) are those required of all students for admission to the University.

- (d) A foreign language, 2 years (2 units or 20 credits). See note 5.

2. *Subjects Required Either in High School or College.*

- (e) U. S. history and civics, 2 quarters (1 unit or 9 or 10 credits). See note 1.

- (f) History, 2 quarters (1 unit or 10 credits). See note 2.

- (g) Physics or chemistry, 2 quarters (1 unit or 10 credits). See note 3.

- (h) Botany, or geology, or zoology, 2 quarters (1 unit or 10 credits). See note 3.

3. *Subjects Required in College.*

- (i) Philosophy, 1 quarter (5 credits).

- (j) Psychology, 1 quarter (5 credits).

- (k) Economics, political science, sociology, 2 quarters (10 credits).

- (l) Physical education or military science, regular freshman and sophomore requirements.

4. *Subjects Conditionally Required in College.*

- (m) Ancient life and literature, 2 quarters, (10 credits). See note 4.

- (n) English composition, 2 quarters, (10 credits). See note 6.

NOTES

1. Students who do not take United States history and civics in the high school must take History 57-58-59 in the University.

2. One year of history is required in addition to requirement (e). It may be satisfied in any year (1 unit or 9 or 10 credits) of history.

3. A college course of two quarters, (10 credits) in Introduction to Science will be accepted as fulfilling one of the requirements (g) or (h).

4. Two quarters' work in ancient life and literature is required of all students who have not taken, or do not plan to take, 3 or more years of ancient language. For such students courses are offered in the University on the civilization of the ancients and on the literature in translation.

5. Beginning with 1921, two years of one foreign language will be required for admission to the College of Liberal Arts or the College of Science. If the requirement has not been met in high school, it must be made up in college without credit.

6. English composition is required for the junior certificate except in the case of those persons who show by examination proficiency in that subject. (See University calendar for dates of examination).

Schedule Limitations of the Lower Division.—As a rule students in the lower division must confine their elections to courses designed for such students, viz., courses numbered 1 to 99 in the catalogue. A student, however, who has had the proper prerequisite or who may be deemed in intellectual maturity sufficiently qualified, may, with the consent of the dean and the instructor concerned, register for an upper division course. (In a foreign language a student who has had the proper prerequisite may be enrolled in an upper division course merely with the consent of the class adviser.) Students who are granted this privilege should be careful not to allow it to interfere with the completion of all lower division requirements by the end of the sophomore year; otherwise, an extra quarter of residence in that division may be necessary in order to secure the junior certificate and graduation may be correspondingly postponed.

No student in the lower division shall be registered for more than 16 credit hours per quarter (exclusive of military science and physical education) or for less than 12 credit hours per quarter, except with the consent of the dean.

IV. REQUIREMENTS OF THE UPPER DIVISION

The upper division comprises the studies of the junior and senior years. It consists principally of the advanced work of the undergraduate curriculum, and is therefore differentiated, both in content and method, from that of the lower division.

To be enrolled in the upper division, the student must have completed all the requirements for the junior certificate. The minimum amount of work to be done in the upper division will vary from 90 to 72 hours of credit, according to the number of hours offered for the junior certificate. The student must earn not less than 72 hours of credit while enrolled in the upper division. At least 48 hours of the credit hours taken in the upper division must be in the upper division courses (Courses 100 to 199). Of the 180 academic credits required for graduation at least 60 must be taken in courses numbered 100 or higher and of these 60, eighteen (not counting teacher's courses) must be taken in the major department.

Schedule Limitations of the Upper Division.—No student in the upper division shall be registered for more than 16 or less than 12 credit hours per quarter, except with the consent of the dean. A maximum of 19 hours per quarter may be granted to students who have made an exceptional record in scholarship in the lower division and who maintain that record in the upper division.

SCHEME OF ELECTIVES

For the purpose of election, outside the major department, the College of Liberal Arts, the College of Science, the College of

Education, the College of Business Administration and the School of Journalism are treated as one.

The following courses given outside the College of Liberal Arts may be counted toward a bachelor of arts degree. Not more than 24 such credits altogether shall be counted toward this degree except that from the College of Fine Arts 36 credits may be so counted.

College of Pharmacy.—Materia medica, therapeutics, toxicology. Total amount allowed, 12 credits.

College of Engineering. — Mechanical drawing, descriptive geometry, surveying, direct currents, alternating currents, engineering problems. Total amount allowed, 18 credits.

College of Mines.—General metallurgy.

College of Fine Arts.—A total number of 36 credits in the College of Fine Arts may be counted toward the bachelor of arts degree.

College of Forestry.—General forestry, characteristics of trees, forest economics, silviculture. The maximum number of hours elective from these subjects is 18.

School of Law.—Agency, constitutional law, contracts, general business law, equity, persons, property. From these subjects a total of 18 credits may be counted toward the bachelor of arts degree by a student majoring in the philosophical group; a total of nine credits may be so counted by a student majoring in any other group.

SIX-YEAR ARTS AND LAW CURRICULUM

This combined course allows the student with a good record to obtain an A. B. and an LL. B. in six years. It is open only to those students who have maintained a uniformly good record for scholarship during the first three years of collegiate work. At the end of three years, after the student has earned 135 credits, plus required credits in military science or physical education and including all of the required work, together with a major, he may for the fourth year register in the School of Law for the first year's work in law. He must, however, earn in the College of Liberal Arts additional credits sufficient to make the total credits amount to 156. Thirty-six credits in the first year law work may apply toward the A. B. degree, thus making 192 credits required for this degree.

The last two years of this combined course are devoted to completing the rest of the required work in the School of Law.

Students are strongly advised to complete their full 147 credits in the College of Liberal Arts by the end of the third year so that they can enter the law work clear in the fourth year.

Students from other institutions entering this University with advanced standing may take advantage of this combined course, provided they are registered in the College of Liberal Arts for at least one full year of work, and earn at least 45 credits in this University before entering the School of Law.

This privilege will not be extended to normal graduates attempting to graduate in two years, nor to undergraduates of other colleges who enter this University with the rank of senior.

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index.)

COLLEGE OF SCIENCE

THE FACULTY

- HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), President.
- JOHN THOMAS CONDON, LL. M. (Northwestern), Dean of Faculties.
- HENRY LANDES, A. M. (Harvard), Professor of Geology; Dean.
- THEODORE CHRISTIAN FRYE, PH. D. (Chicago), Professor of Botany.
- TENOR KINGAID, A. M. (Washington), Professor of Zoology.
- FREDERICK AUTHUR OSBORN, PH. D. (Michigan), Professor of Physics and Director of the Physics Laboratories.
- ROBERT EDOUARD MORITZ, PH. D. (Nebraska), PH. N. D. (Strassburg), Professor of Mathematics.
- DAVID CONNOLLY HALL, SC. M., M. D. (Chicago), Professor of Hygiene and University Health Officer.
- HENRY KREITZER BENSON, PH. D. (Columbia), Professor of Industrial Chemistry.
- JOHN WEINZIERL, DR. P. H. (Harvard), Professor of Bacteriology.
- EFFIE ISABEL RAITT, M. A. (Columbia), Professor of Home Economics.
- STEVENSON SMITH, PH. D. (Pennsylvania), Professor of Psychology.
- WILLIAM MAURICE DEHN, PH. D. (Illinois), Professor of Organic Chemistry.
- GEORGE MCPHAIL SMITH, PH. D. (Freiburg), Professor of Inorganic Chemistry.
- JAMES EDWARD GOULD, A. M. (Harvard), Professor of Maritime Commerce.
- CHARLES EDWIN WEAVER, PH. D. (California), Associate Professor of Geology.
- ALLEN FULLER CARPENTER, PH. D. (Chicago), Associate Professor of Mathematics.
- SAMUEL LATIMER BOOTHROYD, M. S. (Colorado Agricultural College), Associate Professor of Astronomy.
- HENRY LOUIS BRAKEL, PH. D. (Cornell), Associate Professor of Engineering Physics.
- GEORGE BURTON RIGG, PH. D. (Chicago), Associate Professor of Botany.
- JOHN L. WORCESTER, M. D. (Med. School, University of Alabama), Associate Professor of Anatomy.
- EDWIN JAMES SAUNDERS, A. M. (Harvard), Assistant Professor of Geology.
- GEORGE IRVING GAVETT, B. S. (C. E.) (Michigan), Assistant Professor of Mathematics.
- ELI VICTOR SMITH, PH. D. (Northwestern), Assistant Professor of Zoology.
- GRACE GOLDENA DENNY, M. A. (Columbia), Assistant Professor of Home Economics.
- JOHN WILLIAM HOTSON, PH. D. (Harvard), Assistant Professor of Botany.
- LOUIS IRVING NEIKIRK, PH. D. (Pennsylvania), Assistant Professor of Mathematics.
- SAMUEL HERBERT ANDERSON, PH. D. (Illinois), Assistant Professor of Physics.
- ROY MARTIN WINGER, PH. D. (Johns Hopkins), Assistant Professor of Mathematics.
- HERMAN VANCE TARTAR, B. S. (Oregon Agricultural College), Assistant Professor of Chemistry.
- ERIC TEMPLE BELL, PH. D. (Columbia), Assistant Professor of Mathematics.
- EDWIN R. GUTHRIE, PH. D. (Pennsylvania), Assistant Professor of Psychology.
- FRED H. HEATH, PH. D. (Yale), Assistant Professor of Chemistry.

- THOMAS GORDON THOMPSON, PH. D. (Washington), Assistant Professor of Chemistry.
- GEORGE EDWARD GOODSPEED, JR., B. S. M. E. (Massachusetts Institute of Technology), Assistant Professor of Geology.
- ELIZABETH AMERY, B. S. (Wisconsin), Assistant Professor of Home Economics.
- VIRGINIA CUNNINGHAM PATTY, (Diploma, Ecole Guerre, Paris), Assistant Professor of Home Economics.
- MARY EMMA GROSS, A. M. (Columbia), Assistant Professor of Physical Education.
- DELBERT H. NICKSON, M. D. (Oregon), Assistant Professor of Pathology.
- JAMES G. ARDUTHNOT, B. S. (Kansas), Assistant Professor of Physical Education.
- HORACE W. GUNTHER, PH. D. (Kansas), Assistant Professor of Zoology.
- MARTHA KOEHNE, A. M. (Ohio), Assistant Professor of Home Economics.
- ROBERT H. PALMER, A. M. (Utah), Assistant Professor of Geology.
- EARL D. WEST, A. M. (Adrian College), Associate in Mathematics.
- ETHEL SANDESON RADFORD, A. B. (McGill), Associate in Chemistry.
- HERMANOE MULLEMEISTER, PH. D. (Royal University of Utrecht, Holland), Associate in Mathematics.
- LILIAN BLOOM, (Graduate, Medical Gymnastic Institute, Stockholm, Sweden), Associate in Physical Education.
- MARJORIE HELEN WHIPPLE, A. B. (Colorado College), Associate in Chemistry.
- CARL ZENO DRAVES, B. S. (Ch. E.) (Washington), Associate in Chemistry.
- CLARENCE EDMUNDSON, B. S. (Idaho), Associate in Physical Education.
- W. A. HAMILTON, A. B. (Cornell), Associate in Mathematics.
- HELEN MACKINNON, A. B. (Wellesley), Associate in Physical Education.
- WALDO SEMON, B. S. (Washington), Associate in Chemistry.
- LILLIAN WOOD, B. S. (Washington), Associate in Chemistry.
- ELIZABETH S. SOULE, R. N. (Malden, Massachusetts, Hospital School of Nursing), Associate in Nursing and Public Health.
- LLOYD LEROY SMAL, PH. D. (Columbia), Instructor in Mathematics.
- MARTHA DRESSLAE, M. S. (Columbia), Instructor in Home Economics.
- WILLIAM B. WILSON, A. B. (Washington), Instructor in Psychology.
- JOSEPH M. TAYLOR, M. S. (Adrian College), Acting Instructor in Mathematics.
- MILDRED LEMON, A. B. (California), Instructor in Physical Education and Hygiene.
- ARTHUR WILLIS BARTON, PH. D. (Northwestern), Instructor in Chemistry.
- SARGENT G. POWELL, PH. D. (Illinois), Instructor in Chemistry.
- LOU EASTWOOD ANDERSON, Acting Instructor in Physical Education.
- WILLARD H. ELLER, B. S. (E. E.) (California), Instructor in Physics.
- F. A. McMILLIN, M. S. (Willamette), Acting Instructor in Chemistry.
- HENRY S. STAGER, PH. D. (California), Instructor in Mathematics.
- CLINTON L. UTTERBACH, M. S. (Washington), Instructor in Physics.
- GEORGE E. WHITWELL, B. S. (Massachusetts Institute of Technology), Instructor in Chemical Engineering.

COLLEGE OF SCIENCE

The student entering the College of Science may take up one of several curricula, general or specialized, with the emphasis upon pure or applied science. These curricula, set forth in detail in succeeding pages, are:

- I. Elective curricula with a major in some one department for students desiring general training in science, and leading to the degree of bachelor of science.
- II. Suggested curricula in the various departments for students desiring to specialize in one department or obtain professional training, and leading to the degree of bachelor of science in the respective subjects.
 - A. Bacteriology
 - B. Biology
 - C. Chemistry
 - D. Geology
 - E. Mathematics
 - F. Physics
 - G. For prospective science teachers
 - H. Combined Science and Law
 - I. Library Science
- III. Prescribed curricula in vocational subjects.
 - A. Pre-medical
 - B. Nurses
 - C. Home Economics
 - D. Physical Education for women

*REQUIREMENTS FOR ADMISSION

Correspondence.—Credentials and all correspondence relating to admission to any college or school of the University should be addressed to the registrar, University of Washington, Seattle.

Freshman Standing.—Freshman standing in the University is granted any recommended graduate of a four-year accredited secondary school who presents fifteen units† of credit, distributed as follows:

- (a) 3 units of English.
- (b) 1 unit of algebra.
- (c) 1 unit of plane geometry.
- (d) 3 units selected from one of the following groups (or 2 units, if 3 units of mathematics are presented).
 - (1) Foreign language, either ancient or modern (at least 2 units in one language; not less than one unit will be counted in any language).
 - (2) History, civics, economics (at least one unit to form a year of consecutive work in history).
 - (3) Physics, chemistry, botany, zoology, general biology, physical geography, geology, physiology. (Not less than one unit will be counted in physics,

* More detailed information concerning admission is furnished on pages 43-46.

† To count as a "unit", a subject must be taught five times a week, in periods of not less than forty-five minutes, for a school year of not less than thirty-six weeks.

chemistry, or general biology. No science will be counted as applying on this requirement unless it includes a satisfactory amount of laboratory work.)

- (e) 2 units in subjects presented in the above groups (1) - (3).
- (f) 5 units selected from subjects accepted by an approved high school for its diploma. Not less than one full unit will be counted in physics, chemistry, general biology, or a foreign language. A maximum of 4 units will be counted in vocational subjects, except for admission to the College of Business administration. For admission to this college only, a maximum of 8 units in vocational subjects will be accepted, of which at least 4 units must be in commercial branches; and a student presenting 8 such vocational units and 2 units in history, and fulfilling requirements (a), (b), and (c), will be given freshman standing in that college without being held for requirements (d) and (e). If the student is transferred later to another college, only 4 vocational units will be counted, and the students will be required to meet the requirements (d) and (e).

A candidate who fulfills these requirements will be admitted to freshman standing in any of the colleges of the University. However, if he has not taken in high school certain of the subjects recommended for admission to the college that he may decide to enter, he will take them in the University, or if they are not offered in the University, he will take them in some secondary school, or with a tutor. Such subjects if taken in the University, may apply toward a degree, as far as elective courses make this practicable. In certain curricula, however, these subjects must be taken in addition to the prescribed subjects.

A student having any such deficiency is required to register so that the deficiency will be removed by the end of his fourth quarter of residence. A student failing to meet this requirement is ineligible for re-admission until the deficiency has been removed.

Entrance with condition, to freshman standing, is not permitted. Excess admission credit does not establish any presumptive claim for advanced standing, unless the student has taken a graduate course in the high school of at least one semester.

CURRICULA

I. ELECTIVE CURRICULA WITH A MAJOR IN ONE DEPARTMENT

In this division of the college, in order to secure the degree of bachelor of science, a student must complete a total of at least 192 credits, and must observe the restrictions in regard to a major subject, necessary scholarship and elections in other colleges.

A. REQUIREMENTS IN A MAJOR SUBJECT

A student must earn from 36 to 60 credits in a single department, known as his major department. Not more than 96 credits may be counted in the major and one other department.

B. SCHOLARSHIP REQUIREMENTS

Not less than three-fourths of the credits required for graduation must be earned with grades A, B, or C.

C. ELECTIONS IN OTHER COLLEGES

In engineering, fine arts, fisheries, forestry, law, mines, and pharmacy, electives will be allowed to the extent of 25 credits from any one college, and not to exceed 36 from all.

D. DISTRIBUTION OF REQUIRED WORK

At least 60 of the scholastic credits presented for graduation shall be in courses numbered above 100, of these 60 credits, at least 18 shall be in the major subject. The requirements for graduation and their distribution shall be as follows:

1. *Subjects Required in a Secondary School.*

- (a) English, three years.
- (b) Elementary algebra, one year.
- (c) Plane geometry, one year.
- †(d) One foreign language, two years.

2. *Subjects Required Either in a Secondary School or in the University.*

- (e) United States history and civics, one year (or ten credits).
- (f) History other than (e), one year (or ten credits).
- (g) Mathematics, geology*, or astronomy, one year (or ten credits).
- (h) Chemistry, one year (or ten credits).
- (i) Physics, one year (or ten credits).
- (j) Botany or zoology, one year (or ten credits).
- (k) A certificate of proficiency in English must be obtained either by registration or entrance examination.

3. *Subjects Required in the University.*

- (l) Physical education or military science, two years.
- (m) Economics, history, language and literature, philosophy, political science, psychology, sociology, 20 credits (ten credits only may be taken in any of these subjects).

II. CURRICULA IN THE VARIOUS DEPARTMENTS

A. BACTERIOLOGY

		FIRST YEAR			
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
English 1	5	English 2 or Elective...	5	Elective	5
Chemistry 1	5	Chemistry 2	5	Chemistry 3	5
Zoology 1 or 3	5	Zoology 2 or 4	5	Sociology 1	5
Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½
SECOND YEAR					
Bacteriology 101	5	Bacteriology 102	5	Bacteriology 103	5
Chemistry 131	5	Chemistry 132	5	Chemistry 111	5
Anatomy 105	5	Anatomy 106	5	Anatomy 107	5
Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½
THIRD YEAR					
Bacteriology 201	4	Bacteriology 202	4	Bacteriology 203	4
Physics 1	5	Physics 2	5	Physics 3	5
Elective	6	Elective	6	Elective	6
FOURTH YEAR					
Bacteriology 110	4	Bacteriology 111	4	Bacteriology 112	4
Bacteriology 210	2	Bacteriology 211	2	Bacteriology 212	2
Bacteriology 213	3	Bacteriology 214	3	Bacteriology 215	3
Elective	6	Elective	6	Elective	6

B. BIOLOGICAL SCIENCES

FIRST YEAR

English 1	1	English 2 or Elective...	5	Mathematics or Elective. 5
Botany or Zoology.....	5	Botany or Zoology.....	5	Electives10
Electives	5	*Mathematics or Elect....	5	
Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed.... 1½

*Physiography (with laboratory work) taken in a high school will be accepted.

†Beginning with 1921, a student who has not taken in high school the amount of foreign language which may be required for admission to the college that he plans to enter, will make up the deficiency in the University as part of his regular schedule of work, but without receiving college credit for it. For the College of Fine Arts, the requirement may be satisfied by 20 hours of a modern foreign language; for the Colleges of Liberal Arts, Science and Education, by 20 hours in any one foreign language.

*Two and one-half years of mathematics required which may be taken in high school or University.

UNIVERSITY OF WASHINGTON

SECOND YEAR					
Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Chemistry or Physics.... 5		Chemistry or Physics.... 5			
Major 5		Major 5		Major 5	
Electives 5		Electives 5		Electives 10	
Mil. Sci. or Phys. Ed.... 1%		Mil. Sci. or Phys. Ed.... 1%		Mil. Sci. or Phys. Ed.... 1%	
THIRD YEAR					
Major 5		Major 5		Major 5	
Soc., Pol. Sci. or Econ... 5		Soc., Pol. Sci. or Econ... 5		Electives 10	
Electives 5		Electives 5			
FOURTH YEAR					
Major 5		Major 5		Electives 15	
Electives 10		Electives 10			

When a student decides to graduate under this curriculum with a major in anatomy, botany, or zoology, he should at once consult with the department concerned, a member of which will act as his advisor. The advisor will then plan a special curriculum for the student, fitting him for his chosen field of work, which curriculum must be submitted to the Dean of the College of Science for approval. Any change in the individual curriculum can only be made with the consent of the advisor and the dean.

C. CHEMISTRY

FIRST YEAR					
Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Chemistry 1 or 21..... 5		Chemistry 2 or 22..... 5		Chemistry 3 or 23..... 5	
Mathematics 4 5		Mathematics 5 5		Mathematics 6 5	
English 1 5		English 2 or *Elective... 5		*Elective 5	
Mil. Sci. or Phys. Ed.... 1%		Mil. Sci. or Phys. Ed.... 1%		Mil. Sci. or Phys. Ed.... 1%	
SECOND YEAR					
Physics 1 or 97..... 5		Physics 2 or 98..... 5		Physics 3 or 99..... 5	
Chemistry 101 5		Chemistry 112 5		Chemistry 113 5	
Mathematics 61 3		Mathematics 62 3		*Electives 5	
*Elective 2		Electives 2		Mil. Sci. or Phys. Ed.... 1%	
Mil. Sci. or Phys. Ed.... 1%		Mil. Sci. or Phys. Ed.... 1%			
THIRD YEAR					
Chemistry 181 5		Chemistry 182 5		Chemistry 183 5	
*Electives 5		*Electives 5		*Electives 5	
GROUP OPTIONS		GROUP OPTIONS		GROUP OPTIONS	
(a) General		(a) General		(a) General	
Chemistry 221 3		Chemistry 222 3		Chemistry 114 5	
Electives 2		Electives 2			
(b) Industrial ²		(b) Industrial		(b) Industrial	
Chemistry 121 5		Chemistry 122 5		Chemistry 128 5	
(c) Physiological Chemistry		(c) Physiological Chemistry		(c) Physiological Chemistry	
Botany 143 5		Botany 144 5		Botany 145 5	
(d) Sanitary and Food		(d) Sanitary and Food		(d) Sanitary and Food	
Chemistry		Chemistry		Chemistry	
Chemistry 105 5		Chemistry 106 5		Chemistry 107 5	

¹Options: A—Mechanical Drawing, B—Geology or Mineralogy, C—Biology Science.

²Students expecting to elect the industrial group in junior year will take Chemical Technology (Chem. 52) lectures only, 3 credits, during the sophomore year.

³In addition to the subjects specifically listed above, 10 credits in either French or German are required, to be completed before the end of the third year.

All electives must be approved by the head of the Department of Chemistry or other registration officer appointed by the Department of Chemistry.

COLLEGE OF SCIENCE

77

		FOURTH YEAR			
Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Chemistry 181	5	Chemistry 182	5	Chemistry 183	5
Chemistry 224	2	Chemistry 225	2		

GROUP OPTIONS	
(a) General	
Chemistry 211 or)	
Chemistry 212 or) ..	5
Chemistry 250) ..	3
(b) Industrial	
Chemical Engineer-	
ing 215	5
Electives	3
(c) Physiological Chem-	
istry	
Chemistry 141	5
Chemistry 192	3
(d) Sanitary and Food	
Chemistry	
Chemistry 141	5
Chemistry 192)	
Electives)	3

GROUP OPTIONS	
(a) General	
Chemistry 250	5
Electives	3
(b) Industrial	
Chemistry 211	3
Chemistry 250	3
Electives	3
(c) Physiological Chem-	
istry	
Chemistry 142	5
Chemistry 193	3
(d) Sanitary and Food	
Chemistry	
Chemistry 142	5
Chemistry 193	3

GROUP OPTIONS	
(a) General	
Chemistry 250	5
Electives	5
(b) Industrial	
Chemistry 250	5
Electives	5
(c) Physiological Chem-	
istry	
Chemistry 146	3
Elective	7
(d) Sanitary and Food	
Chemistry	
Chemistry 146	3
Electives	7

D. GEOLOGY

		FIRST YEAR			
Geology 1	5	Mathematics 4	5	Mathematics 6	5
English 1	5	English 2 or Elective ..	5	Geology 2	5
Chemistry 1 or 21	5	Chemistry 2 or 22	5	Chemistry 3 or 23	5
Mil. Sci. or Phys. Ed.	1½	Mil. Sci. or Phys. Ed.	1½	Mil. Sci. or Phys. Ed.	1½
		SECOND YEAR			
Physics 1	5	Geology 21	5	Geology 117	3
Chemistry 111	4	Physics 2	5	Geology 120	3
Civil Engineering 1	3	Civil Engineering 21	3	Geology 122	2
Astronomy 11	5	Elective	3	Civil Engineering 4	3
Mil. Sci. or Phys. Ed.	1½	Mil. Sci. or Phys. Ed.	1½	Mil. Sci. or Phys. Ed.	1½
		THIRD YEAR			
Botany or Zoology	5	Botany or Zoology	5	Geology 125	4
Geology 123	3	Geology 124	4	Geology 121	3
Geology 131	5	Geology 118	3	Geology 134	5
Elective	5	Elective	3	Elective	3
		FOURTH YEAR			
Geology 126	3	Geology 127	5	Geology 128	2
Mining 51	3	Law 158	2	Metallurgy 102	5
Thesis	2	Thesis	2	Thesis	2
Elective	3	Elective	3	Elective	3

E. MATHEMATICS

FIRST YEAR					
Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
English 1	5	English 2 or Elective	5	History	5
Mathematics 4	5	Mathematics 5	5	Mathematics 6	5
*Physics 1	5	*Physics 2	5	Modern Foreign Lang.	5
Mil. Sci. or Phys. Ed.	1½	Mil. Sci. or Phys. Ed.	1½	Mil. Sci. or Phys. Ed.	1½
SECOND YEAR					
History	5	Economics 1	5	Political Science 1	5
Mathematics 107	5	Mathematics 108	5	Mathematics 109	5
Modern Foreign Lang.	5	Chemistry 1	5	Chemistry 2	5
Mil. Sci. or Phys. Ed.	1½	Mil. Sci. or Phys. Ed.	1½	Mil. Sci. or Phys. Ed.	1½
THIRD YEAR					
GROUP I—SECONDARY SCHOOL TEACHERS					
Psychology 1	5	Philosophy or Logic	5	Astronomy 1	5
Biological Science	5	Biological Science	5	Mathematics	2 or 3
Mathematics	2 or 3	Mathematics	2 or 3	Education 75	5
Electives	3 or 2	Electives	3 or 2	Electives	3 or 2
GROUP II—COLLEGE AND UNIVERSITY TEACHERS					
Psychology 1	5	Philosophy or Logic	5	Astronomy	5
Biological Science	5	Biological Science	5	Mathematics	2
Mathematics	2	Mathematics	2	Mathematics	3
Mathematics	3	Mathematics	3	Electives	5

*Students in Group III take Bus. Ad. 11-12 in place of Physics.

GROUP III—STATISTICIANS AND ACTUARIES

Psychology 1	5	Philosophy or Logic	5	Astronomy 1	5
Biological Science	5	Biological Science	5	Mathematics 13	5
Business Ad. 64	5	Business Ad. 65	5	Electives	5

FOURTH YEAR

GROUP I—SECONDARY SCHOOL TEACHERS

Education 85	3	Education 119	3	Mathematics 127	5
Education 145	5	Electives	12	Electives	7
Electives	7			Education 140	3

GROUP II—COLLEGE AND UNIVERSITY TEACHERS

Mathematics	5	Mathematics	5	Mathematics	5
Electives	10	Electives	10	Electives	10

GROUP III—STATISTICIANS AND ACTUARIES

Mathematics 151	3	Mathematics 152	3	Mathematics 153	3
Political Science 60	5	Business Ad. 147	5	Business Ad. 118	5
Electives	7	Electives	7	Electives	7

F. PHYSICS

GROUP I—SECONDARY SCHOOL TEACHERS

First Year	Credits	Second Year	Credits
Mathematics	15	Physics	15
*Chemistry or Physics	15	Mathematics	15
English 5 or Adv. Electives	10	Chemistry	10
Bot., Zool., Geol., or Astron.	10	Psychology	5
Third Year	Credits	Fourth Year	Credits
Physics	15	Physics	6
Education	5	Education	13
Philosophy Group	15	Adv. Electives	13
Free Electives	10	Free Electives	13

GROUP II—COLLEGE AND UNIVERSITY TEACHERS

First Year	Credits	Second Year	Credits
Mathematics	15	Physics	15
*Chemistry or Physics	15	Mathematics	15
English 5 or Adv. Electives	10	Chemistry	10
Bot., Zool., Geol., or Astron.	10	Psychology	5
Third Year	Credits	Fourth Year	Credits
Physics	15	Physics	9
Mathematics	10	Mathematics	9
Philosophy Group	15	Adv. Electives	12
Free Electives	9	Free Electives	15

GROUP III—INDUSTRIAL PHYSICISTS

First Year	Credits	Second Year	Credits
Mathematics	15	Physics	15
*Chemistry or Physics	15	Mathematics	15
English 5 or Adv. Electives	10	Chemistry	5
Bot., Zool., Geol., or Astron.	10	Psychology	5
		Adv. Electives	5
Third Year	Credits	Fourth Year	Credits
Physics	15	Physics	0
Philosophy Group	15	Chemistry	15
Chemistry	5	Adv. Electives	15
Adv. Electives	5	Free Electives	6
Free Electives	5		

Advanced electives must be approved by the department.

G. CURRICULUM FOR PROSPECTIVE SCIENCE TEACHERS

Most of those science students who expect to teach must begin in a small high school. In such schools one teacher usually teaches several or all the sciences. It is therefore desirable that such students get a wide range of scientific knowledge, rather than the intensive training secured by three years' work for a major in some one department. The following course permits the students to prepare in more sciences by not requiring three years of any one science.

*Physics will be taken only when no high school physics is offered.

<i>First Year</i>	<i>Credits</i>	<i>Second Year</i>	<i>Credits</i>
Science (botany, geology, or zoology)...	10	History	10
Science (physics or chemistry).....	10	Economics, Pol. Sci. or Sociology.....	10
Mathematics	5	Science	20
English.....	0 to 10	Elective	5
German or French.....	10	Mil. Sci. or Phys. Ed.....	6
Mil. Sci. or Phys. Ed.....	6		
<i>Third Year</i>	<i>Credits</i>	<i>Fourth Year</i>	<i>Credits</i>
Philosophy and Psychology.....	10	Education	18
Science	20	Science	10
Elective	15	Elective	17

REGULATIONS GOVERNING THIS CURRICULUM

- (a) A student may select any three of the following sciences and must do the amount of work in any particular science, as indicated.
 Botany (exclusive of bacteriology), 20 credits.
 Chemistry, 20 credits.
 Geology, 20 credits.
 Mathematics (exclusive of astronomy), 20 credits.
 Physics, 20 credits.
 Zoology, 20 credits.
- (b) Included in or in addition to the work in (a) every student must take 5 credits in mathematics, 10 credits in physics, 10 credits in chemistry, 10 credits in botany or zoology.
- (c) In (a) chemistry and zoology may *not* be selected in a group together.
- (d) If 20 credits of chemistry are taken, only 15 of geology are required.
- (e) When mathematics is selected as one of the three sciences, physics must be selected also.
- (f) The modern foreign language required shall be either French or German and a continuation of the language taken in high school.
- (g) The work in freshman composition shall be 0 to 10 credits.

H. SIX-YEAR COURSE IN SCIENCE AND LAW

This is a combination course whereby a student may obtain the degrees of bachelor of science and bachelor of laws in six years. At the end of his third year, after he has earned 135 credits, together with the required credits in military science or physical education, including all of the required work, together with a major in some department, he may register in the School of Law for the first year's work in law. He will be granted the bachelor of science degree at the end of the fourth year, or whenever he completes the required work above specified, together with 9 additional credits in the College of Science and 36 credits in the School of Law; making a total of 190 credits for graduation. The fifth and sixth years of the combined course are devoted to completing the remainder of the required work for graduation from the School of Law.

I. FIVE-YEAR COURSE IN SCIENCE AND LIBRARY SCIENCE

This course is for students who are preparing to become professional librarians and who desire to receive degrees of bachelor of science and bachelor of library science. Under this arrangement a student should first complete, all the required work of the course for Science Teachers (outlined above), substituting courses in library science for 12 credits in education, as stipulated for the senior year. A portion of the fourth year and all of the fifth year are devoted to the required subjects in library science. If this plan is carefully followed, a student should earn the degree of bachelor of science at the end of the fourth year, and the degree of bachelor of library science at the end of the fifth year. (See Library School.)

III. PRESCRIBED CURRICULA IN VOCATIONAL SUBJECTS

A. PRE-MEDICAL CURRICULA

TWO AND FOUR-YEAR CURRICULA PREPARATORY TO MEDICINE

The University offers two curricula preparatory to the study of medicine. One of these is for two years, and will meet the requirements of those medical schools which require no more than two years of college work for admission to their professional study. The second is for four years, and prepares students for those medical schools that require for admission the completion of a full four years college course. The curricula will not reduce the amount of work to be done by the student in the medical school but they are designed to increase its efficiency.

These courses are also well adapted for pre-dental students, as the best dental schools require the same foundation work as the medical schools.

Students entering the pre-medical courses should present the following among the 15 units required for entrance to the University (see Requirements for Admission):

- 8 units of English
- 1 unit of Algebra
- 1 unit of Plane Geometry
- 1 unit of United States History and Civics
- 1 unit of Medieval and Modern History
- 1 unit of Physics
- 2 units of one foreign language

Below is the outline of the four-year curriculum. The first and second years constitute the two-year curriculum:

FIRST YEAR					
Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Chemistry 1 or 21.....	5	Chemistry 2 or 22.....	5	Chemistry 3 or 23.....	5
Zool. 3 (Pre-medical)...	5	Zool. 4 (Pre-medical)...	5	Zool. 5 (Pre-medical)...	5
English 1	5	English 2	5	Psychology 1	5
Mil. Sci. or Phys. Ed....	1%	Mil. Sci. or Phys. Ed....	1%	Mil. Sci. or Phys. Ed....	1%
SECOND YEAR					
Physics 1	5	Physics 2	5	Physics 3	5
Chem. 131 (Organic)...	5	Chem. 132 (Organic)...	5	Sci. French or German..	5
English 73	5	Psych. 126 (Abnormal)...	5	Ec. 1 or Pol. Sci. 1....	5
Mil. Sci. or Phys. Ed....	1%	Mil. Sci. or Phys. Ed....	1%	Mil. Sci. or Phys. Ed....	1%
THIRD YEAR					
Anatomy 101	6	Anatomy 102	6	Anatomy 103	6
Anatomy 105	6	Anatomy 106	6	Anatomy 107	6
Bacteriology 104	4	Bacteriology 105	4	Bacteriology 106	4
FOURTH YEAR					
Zoology 151	5	Zoology 152	5	Zoology 153	5
Chemistry 141	5	Chemistry 142	5	Bacteriology 112	4
Bacteriology 110	4	Bacteriology 111	4	Elective	0
Anatomy 104	4	Elective	4		

B. THREE-YEAR CURRICULUM FOR NURSES

Believing that a broader scientific education is desired by young women entering the nursing profession, the University offers a three-year pre-hospital course which when followed by the two-year hospital course in such hospitals as may be selected by the University, leads to a degree of bachelor of science in nursing and a certificate of nursing.

For admission to this curriculum a student must present 15 units by examination or certificate from an accredited school from which she has graduated. (See Requirements for Admission). These 15 units should include the following:

- 3 units of English
- 1 unit of Algebra
- 1 unit of Plane Geometry
- 1 unit of United States History and Civics
- 1 unit of Medieval and Modern History
- 1 unit of Physics
- 2 units of one foreign language

The curriculum:

FIRST YEAR					
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Home Economics 4	3	English 1	5	Chemistry 6	5
Nursing 1	5	Chemistry 5	5	Psychology 1	5
Physics 89	5	Physics 90	5	English 2	5
Phys. Ed.	1½	Phys. Ed.	1½	Phys. Ed.	1½
SECOND YEAR					
Zoology 3	5	Home Economics 106	4	Nursing 8	3
Home Economics 105	4	Physiology 55	5	Philosophy 1	5
Physiology 54	5	Anatomy 101	6	Anatomy 102	6
Elective	2	Elective	2	Dramatic Art	3
Phys. Ed.	1½	Phys. Ed.	1½	Phys. Ed.	1½
THIRD YEAR					
Pharmacy 13	5	Nursing 102	3	Economics 1	5
English Literature 73	5	Bacteriology 102	4	English Literature 75	5
Bacteriology 101	4	Psychology 126	5	Bacteriology 103	2
Education 95	3	Sociology 1	5	Nursing 103	3
				Elective	2

NOTE—It is advised that the two years in the hospital follow the first quarter of the third year. This enables the student to return to the University to specialize in public health nursing.

CURRICULUM TO BE FOLLOWED IN A SELECTED HOSPITAL

<i>Credits</i>	<i>Credits</i>
Demonstration of Nursing..... 5	Eye, Ear, Nose and Throat Nursing... 5
Anesthesia 10	Neurological Nursing 5
Clinical Analysis 10	Children's Nursing 5
Medical Nursing 20	Infectious and Contagious Disease Nursing 5
Surgical Nursing 20	Administration 5
Obstetrical and Gynecological Nursing... 20	

C. PRESCRIBED CURRICULA IN HOME ECONOMICS

Many fields of activity other than teaching are being offered to women trained in the work given in the department of home economics. In each line of vocational work offered, there is opportunity to put into practice the technical work of the laboratory. In food preparation, the students work in the University Commons, in commercial establishments and in hospitals to gain practical experience. In clothing, students learn first to sew for themselves and then for customers.

Seniors are required to live in the practice cottage located on the campus, where they take full responsibility for the management and care of the house for a family of four during a period of three weeks.

The following grouping is arranged as a guide in selecting the work that will best satisfy the requirements of each individual:

Group I, General, is planned for students who want a liberal college training with emphasis upon the subjects that pertain to the home and home life. Those who are interested in social betterment and who wish to enter definite welfare work may combine home economics and sociology in this curriculum.

Group II, Food and Nutrition, is offered for those students who wish to specialize for the purpose of teaching this phase of the work in institutions of higher education, for laboratory or research workers, and for students who wish to become dietitians in hospitals, sanatoria or private work. Those who intend to become sanitary and food inspectors are also advised to take the course.

Group III, Teachers' Curriculum. There is always a demand for the well-trained home economics teacher. This group combines some liberal arts subjects in other departments, chemistry, physics, bacteriology, fine arts, physiology and economics. The courses are especially arranged to meet in the most efficient manner the particular needs of home economics students. Practice teaching extending through one quarter in the Seattle schools is required. Graduates of this course will upon application to the State Board of Vocational Educations receive a Smith-Hughes certificate.

Group IV, Institutional Management. In this course there are combined the fundamental sciences, technical and business courses, with practice work. Young women with initiative and ability find positions that offer increasingly attractive returns when trained in this line of work. Institutions operating for groups of people are seeking trained women to manage the commissary and housekeeping departments.

Group V, Textiles, Clothing and Fine Arts. This curriculum requires a minimum of science but gives ample opportunity for combining work in design with clothing and textiles for the purpose of general culture or for use in a commercial field.

A teaching major in home economics consists of: H. E. 4, 5, 6, 8, 25, 107, 112, 113, 143, 144, 145, 146, 147—with their prerequisites.

Any one of the five lines may lead to the degree of bachelor of science in home economics. Students who fulfill all entrance requirements of the College of Liberal Arts may use home economics as a major for the degree of bachelor of arts.

Students eligible to freshman standing in any college of the University are eligible to enter any one of the above five curricula in home economics; 180 + 12 credits are required for graduation from any of these curricula. For students who complete H. E. 5-6 or H. E. 105-106, 183 + 9 credits are required.

"Preferred elective" means that these requirements must be satisfied before any other course is taken.

GROUP I—GENERAL CURRICULUM

To provide a liberal college training, also for those students who wish to fit themselves for the following vocations:

1. Homemaking.
2. Social Service. (Elect economics and sociology.)

FIRST YEAR

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
English 1	5	English 2	5	Physiology 8	5
Zool. 1 or Bot. 1	5	Chemistry 5	5	Chemistry 6	5
Home Economics 7	2	Zool. 2 or Bot. 2	5	Language	5
Elective	3	Phys. Ed.	1	Phys. Ed.	1%
Phys. Ed.	1%				

Preferred electives—H. E. 4, 8, 25, 43; Nursing 5.

SECOND YEAR

Language	5	Language	5	Language	5
History	5	History	5	Psychology	5
Phys. Ed.	1	Phys. Ed.	1%	Economics	5
				Phys. Ed.	1

Preferred electives—H. E. 5, 6; P. S. D. 3; Bact. 101.

THIRD YEAR

Philosophy 2	5	Sociology 1	5		

Preferred electives—H. E. 105-106, 112, 113; Physics 89-90.

FOURTH YEAR

Preferred electives—H. E. 144-145, 146, 148, 143; Arch. 1-2.

GROUP II—FOOD AND NUTRITION

FIRST YEAR

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
English 1	5	English 2	5	Chemistry 6	5
Home Economics 7	2	Chemistry 5	5	Physiology 8	5
Phys. Ed.	1%	Phys. Ed.	1%	Lang., Lit., or Hist.	5
				Phys. Ed.	1%

Preferred electives—H. E. 4, 8, 25; P. S. D. 3.

SECOND YEAR

Lang., Lit., or Hist.	5	Lang., Lit., or Hist.	5	Lang., Lit., or Hist.	5
Bacteriology 101	5	Bacteriology 102	5	Psychology 1	5
Chemistry 135	5	Chemistry 136	5	Chemistry 104	5
Phys. Ed.	1%	Phys. Ed.	1%	Phys. Ed.	1%

Preferred electives—H. E. 5-6.

THIRD YEAR

Economics	5	Chemistry 104	4
		Sociology	5

Preferred electives—H. E. 107-108; Nursing 5; Physics 89-90.

FOURTH YEAR

Preferred electives—H. E. 103, 148, 189, 190, 191 and related sciences

GROUP III—SMITH-HUGHES TEACHER TRAINING

FIRST YEAR

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
English 1	5	English 2	5	Lang., Lit. or Hist.	5
Physiology 8	5	Chemistry 5	5	Chemistry 6	5
Home Economics 7	2	Phys. Ed.	1%	Phys. Ed.	1%
Phys. Ed.	1%				

Preferred electives—H. E. 4, 8, 25; P. S. D. 3.

If H. E. 4 and 8 are carried in high school, substitute H. E. 43 and Nursing 5.

SECOND YEAR

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Lang., Lit. or Hist.	5	Lang., Lit. or Hist.	5	Lang., Lit. or Hist.	5
Chemistry 135	5	Chemistry 136	5	Psychology 1	5
Phys. Ed.	1	Phys. Ed.	1	Phys. Ed.	1

Preferred electives—

Home Economics 5	5	Home Economics 6	6	Bacteriology 101	5
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THIRD YEAR					
Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Education 75	5	Education 85	3	Economics 1	5
				Education 119	3
				Sociology 1	5
Preferred electives—					
Physics 89	5	Physics 90	5	Home Economics 107-108....	
Home Economics 112....	5	Home Economics 113....	5	Home Economics 143	
FOURTH YEAR					
Home Economics 146....	3	Home Economics 147....	3	Education 145	5
				Education 140	3
Preferred electives—					
Home Economics 148....	2	Home Economics 144....	3	Home Economics 145....	3
Architecture 101-102					

GROUP IV—INSTITUTIONAL MANAGEMENT

To be taken by those who wish to fit themselves for the following vocations:

1. Dietitians.
2. House directors.
3. Managers of tearooms, lunchrooms, cafeterias.
4. Food service in state, municipal, or charitable institutions.

FIRST YEAR					
Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
English 1	5	English 2	5	Chemistry 5	5
Physiology 8	5	Chemistry 5	5	Lang., Lit. or Hist....	5
Home Economics 7....	2	Phys. Ed.	1½	Phys. Ed.	1½
Phys. Ed.	1½				
Preferred electives—H. E. 4, 25; P. S. D. 3; Law 54.					

SECOND YEAR					
Lang., Lit. or Hist....	5	Lang., Lit. or Hist....	5	Lang., Lit. or Hist....	5
Phys. Ed.	1	Chemistry 135	5	Chemistry 136	5
		Phys. Ed.	1	Psychology 1	5
				Phys. Ed.	1
Preferred electives—H. E. 5-6; Bact. 101.					

THIRD YEAR					
Economics 1	5	Sociology 1	5		
Preferred electives—H. E. 107-108, 124, 143; Chem. 108, 144; Physics 80-90.					

FOURTH YEAR					
Preferred electives—H. E. 121, 122, 123, 125, 144, 145, 189, 190; B. A. 11; Arch. 1-2					

GROUP V—TEXTILES, CLOTHING AND FINE ARTS

SUMMARY					
Credits			Credits		
College requirements	64	Free electives	29		
Fine Arts	31	Physical Education	12		
Home Economics	56				192
Total					
Credits			Credits		
College Requirements	64	Fine Arts	31	Home Economics	57
English	10	P. S. & D. 3-10-11....	13	H.E. 25, Textiles.....	5
Lang., Lit. or Hist....	20	P. S. & D. 16-17-18....	3	H.E. 8, Ele. Clothing...	3
Laboratory Science	10	P. S. & D. 169-170....	4	H.E. 11-12, Needlework..	4
Physiology	5	Arch. 1-2	5	H.E. 27, Non-textiles...	3
Economics	5	P. S. & D. 111-112....	6	H.E. 112-113 (clothing).	10
Sociology	5			H.E. 130-131 Trade	
Psychology	5			dressmaking	12
Philosophy	5			H. E. 133-134 Costume	
				design	10
				H.E. 143 Home Furnish..	3
				H.E. 135 Millinery.....	3
				H.E. 144 House Managem't	2
Total	64	Total	31	Total	57
Free Electives	29	Physical Education	12		

D. PHYSICAL EDUCATION FOR WOMEN

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
English 1	5	Lang., Lit., Hist.	5	English	5
Lang., Lit., Hist. or		Chemistry 5	5	Lang., Lit., Hist., or	
Elective	5	Zoology 4	5	Elective	5
Zoology 3	5	Phys. Ed.	1½	Chemistry 6	5
Phys. Ed.	1½			Phys. Ed.	1½

SECOND YEAR

Physiology 54	5	Physiology 55	5	Sociology	5
Lang., Lit., Hist. or		Psychology 1	5	Education 75	5
Elective	5	Anatomy 102	3	Anatomy 103	3
Anatomy 101	3	Phys. Ed.	1½	Phys. Ed.	1½
Phys. Ed.	1½				
Preferred Electives					
Physical Education 111.	3	Physical Education 112.	3	Physical Education 113.	3

THIRD YEAR

Physics 89	5	Physics 90	5		
		Education 85	3	Education 140	3
Preferred Electives					
Phys. Ed. 104 (Dancing)	2	Phys. Ed. 105 (Dancing)	2	Phys. Ed. 106 (Dancing)	2
Phys. Ed. 101 (Gymna.)	3	Phys. Ed. 102 (Gymnas.)	3	Phys. Ed. 103 (Gymnas.)	3
Phys. Ed. 131 (Correc.)	4	Phys. Ed. 132 (Correc.)	4	Phys. Ed. 133 (Correc.)	4
Phys. Ed. 167 (Athlec.)	2	Phys. Ed. 168 (Athlet.)	2	Phys. Ed. 122 (Kin'g'y)	3

FOURTH YEAR

Education 145	3	Education 146	2	Elective	7
Elective	3	Education 119	3		
		Elective	2		
Preferred Electives—					
Phys. Ed. 161 (Anthro.)	2	Phys. Ed. 155 (Dancing)	2	Phys. Ed. 163 (N. Diag.)	2
Phys. Ed. 164 (Dancing)	2	Phys. Ed. 152 (Theo.		Phys. Ed. 156 (Dancing)	2
Phys. Ed. 161 (Theo.		& P.)	2	Phys. Ed. 153 (Theo.	
& P.)	2	Phys. Ed. 171 (Athlet.)	2	& P.)	2
Phys. Ed. 170 (Athlet.)	2			Phys. Ed. 172 (Athlet.)	2
Phys. Ed. 164 (Gymnas.)	2	Phys. Ed. 165 (Gymnas.)	2		
Physical Education, 69 credits.		Electives, 32 credits.			

If chemistry and physics have been taken in high school, Chemistry 5 and 6 and Physics 89 and 90 may be eliminated.

Of the preferred electives in physical education, the minimum is 58 and the maximum 64 credits.

A student may also use physical education as a major, following the prescriptions outlined under group I (curricula with major in one department).

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index.)

GENERAL NOTE.—Each student is to be held either for the admission and graduation requirements of the catalogue under which he enters, or for those of the catalogue under which he graduates.

COLLEGE OF EDUCATION

THE FACULTY

- HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.
JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.
FREDERICK ELMER BOLTON, PH. D. (Clark), Professor of Education; DEAN.
FRED CARLETON AYER, PH. D. (Chicago), Professor of Education.
*CLIFFORD WOODY, PH. D. (Columbia), Professor of Education.
GEORGE EARL FREELAND, A. M. (Clark), Associate Professor of Education.
GEORGE HENRY JENSEN, B. S. (Valparaiso), Assistant Professor of Vocational Education and Supervisor of Teacher Training in the Trades and Industries.
CURTIS TALMADGE WILLIAMS, PH. D. (Clark), Assistant Professor of Education.
PAUL WASHINGTON TERRY, PH. D. (Chicago), Assistant Professor of Education.
HARLAN CAMERON HINES, PH. D. (Iowa), Assistant Professor of Education.
DENNIS C. TROTH, A. M. (Washington), Teaching Fellow in Education.
-
- CAROLINE HAVEN OBER, Professor of Spanish.
TREVOR KINCAID, A. M. (Washington), Professor of Zoology.
FREDERICK MORGAN PADELFORD, PH. D. (Yale), Professor of English; Dean of the Graduate School.
FREDERICK ARTHUR OSBORN, PH. D. (Michigan), Professor of Physics; Director of the Physics Laboratories.
WILLIAM SAVERY, PH. D. (Harvard), Professor of Philosophy.
DAVID THOMSON, B. A. (Toronto), Professor of Latin; Dean of the College of Liberal Arts.
PIERRE JOSEPH FREIN, PH. D. (Johns Hopkins), Professor of French.
THEODORE CHRISTIAN FRYE, PH. D. (Chicago), Professor of Botany.
ROBERT EDOUARD MORITZ, PH. N. D. (Strassburg), Professor of Mathematics.
DAVID CONNOLLY HALL, SC. M., M. D. (Chicago), University Health Officer.
IRVING MACKAY GLEN, A. M. (Oregon), Professor of Music; Dean of the College of Fine Arts.
JOHN WEINZILL, DR. P. H. (Harvard), Professor of Bacteriology.
EDWIN JOHN VICKNER, PH. D. (Minnesota), Professor of Scandinavian Languages.
EFFIE ISABEL RAITT, A. M. (Columbia), Professor of Home Economics.
WILLIAM PIERCE GORSUCH, A. B. (Knox), Professor of Public Speaking and Debate.
STEVENSON SMITH, PH. D. (Pennsylvania), Professor of Psychology.
STEPHEN IVAN MILLER, JR., A. B. (Stanford), LL. B. (Michigan), Professor of Economics; Dean of the College of Business Administration.
HOWARD WOOLSTON, PH. D. (Columbia), Professor of Sociology.
EDWARD McMAHON, A. M. (Wisconsin), Associate Professor of American History.
GEORGE WALLACE UMPHREY, PH. D. (Harvard), Associate Professor of Spanish.
EDWIN JAMES SAUNDERS, A. M. (Harvard), Assistant Professor of Geology.
ROBERT MAX GARRETT, PH. D. (Munich), Assistant Professor of English.
HARVEY BRUCE DENSMORE, A. B. (Oxford), Assistant Professor of Greek.
ALLEN FULLER CARPENTER, PH. D. (Chicago), Assistant Professor of Mathematics.
ERNEST OTTO ECKELMAN, PH. D. (Heidelberg), Assistant Professor of German.
FRANCES DICKEY, A. M. (Columbia), Assistant Professor of Music.
EDWIN R. GUTHRIE, PH. D. (Pennsylvania), Assistant Professor of Psychology.
MARY EMMA GROSS, A. M. (Columbia), Assistant Professor of Physical Education.
WILLIAM WILSON, A. B. (Washington), Instructor in Psychology.

* Resigned.

COLLEGE OF EDUCATION

Scope and Aims.—The curriculum of the College of Education assumes that teachers should have a broad and liberal education, supplemented by professional training which gives a knowledge of the pupils to be taught, the problems to be met, and new meaning to the subjects of instruction, as well as fundamental principles of teaching; and, that they should be masters of some special subject which they expect to teach.

The college is especially fitted to provide teachers of the following types: (1) high school teachers; (2) high school principals; (3) superintendents of public schools; (4) grammar school principals; (5) supervisors of primary schools; (6) supervisors and teachers of music, drawing, manual and industrial arts, home economics, physical training and other special subjects; (7) normal school and college instructors in education; (8) experts in educational research; (9) specialists in the education of defectives; (10) playground directors; (11) Y. M. C. A. and Y. W. C. A. workers; (12) juvenile court workers.

General Academic Work—Because of the variety of work which every teacher is likely to be required to do upon beginning to teach, and because of the requirements for state certificates, elementary college courses should be taken in not less than four subjects which are taught in the high schools.

Specialized Academic Work.—Each teacher should have thoroughly extended preparation in one subject and reasonable preparation in at least two additional subjects. Experience has shown that the following combinations are most frequently demanded: Latin, French; Latin, Greek; English, French; English, history, civics; English, Latin, history; Spanish, French; mathematics, physics, chemistry; botany, zoology, physiology, physiography; home economics alone or in connection with one or two other subjects; manual and industrial arts alone or in connection with one or two other subjects; commercial subjects alone or with other subjects; athletics, music or drawing in combination with other work. One teacher is frequently required to teach all of the sciences. Public speaking is desirable as a part of the preparation for teaching English.

Professional Work.—The requirements for the academic major and minors secure a proper distribution of the academic subjects. The professional work consists (a) of the courses given in the department of education, (b) the teachers' courses given in the various academic departments, and (c) the courses in zoology, psychology, and sociology, fundamental to those in education.

Special Teachers' Courses.—Many of the academic departments have teachers' courses for the purpose of studying the problems of teaching their subjects in the high schools. Work in special methods relating to particular subjects is given by those dealing most directly with the subject matter. Foundation principles of general methods as based upon the laws of learning and teaching are developed in the department of education.

Observation and Supervised Teaching.—By an arrangement between the University and the schools of Seattle students in the department of education may observe the regular work in certain schools (at present twelve are used) and do supervised teaching under direction of the regular teachers of the school and the university professor in charge of that work. In this way students have an opportunity to observe and gain valuable experience under exceptionally favorable conditions.

Industrial Arts.—While no separate department of industrial arts is maintained during the regular year, special attention has been devoted to this work during the summer quarter. A good curriculum may be secured during the regular academic year by selecting from the courses in engineering, fine arts, and education. Because of the excellent industrial arts work in the Seattle public schools, students have unusual facilities for observing the best organization and equipment. A large number of industrial centers and pre-vocational classes are maintained in various parts of the city.

Under the terms of the Smith-Hughes act "the training of teachers for trades and industries in resident work and extension work shall be conducted through the University of Washington, under the supervision of the State Board of Vocational Education, with the approval of the Federal Board."

Athletics and Playground Activities.—There is at the present time, a strong demand for teachers, both men and women, who can direct the various forms of athletics and playground activities in the high school and the grammar grades.

Public School Music.—Not only is there a demand for specially trained supervisors of music in the schools, but every school needs teachers who can give some assistance in the general musical activities of the school and the community. Every teacher who has any musical ability ought to secure some training in music and participate in some of the musical organizations of the University.

Debating, Dramatics, Public Speaking.—Every teacher will be called upon to assist in the incidental work of the school. The small towns cannot afford special teachers of public speaking and debate and consequently the teacher who can assist in these lines

increases his usefulness. Every student should participate in some of these lines all through the college course and definite courses in them should be taken.

Journalism in High Schools.—Newspaper writing is being introduced in some of the best high schools as a part of the English course. It seems to afford a valuable incentive to many pupils in their English work. The teacher who undertakes this work needs to be especially well trained professionally as well as in English and journalism. For a proper combination of courses the student should consult the departments of education, English, and journalism.

Commercial Subjects.—At present the demand upon the University for teachers of commercial subjects far exceeds the supply. To prepare for this line of work the student should include courses in bookkeeping, stenography, commercial law, commercial policies, commercial geography, besides courses in economics, and the professional training in education.

Teaching of Technical Subjects in College.—Many students of engineering, forestry, law and other technical subjects ultimately plan to teach those subjects in colleges or technical schools. An increasing number of such students desire professional training in educational theory and methods as a part of their preparation.

The Study of Education and Citizenship.—Courses in education are valuable, not only for those who expect to teach, but also for those who expect to be citizens of any community. Many of the courses in education, therefore, are rightly coming to be pursued by students not expecting to become teachers.

Extension Service.—The department of education is glad to render service to the cause of education in many ways besides through the regular courses of instruction. Members frequently give addresses at teachers' institutes, parent-teachers' associations, educational associations, community centers, school dedications, school commencements, etc. They are also glad to conduct educational surveys as far as time will permit.

Saturday and Evening Classes.—To accommodate the teachers of Seattle and vicinity several classes in education are scheduled on Saturday and during the late afternoon and evening.

Vocational Secretary.—The University maintains a vocational secretary for the purpose of assisting students to secure desirable positions. The services of this officer are entirely free to students and graduates of the University and to employers.

ORGANIZATION AND REQUIREMENTS

Lines of Work.—Three lines of work are provided in the College of Education: (a) The course leading to the degree of bachelor of education; (b) the courses leading to the degrees of master of arts in education and master of science in education; (c) work leading to the degree of master of arts or master of science with education as a major subject; (d) work leading to the normal diploma and life diploma in connection with a degree from the College of Liberal Arts, the College of Science or the College of Education.

The College of Education is so organized that the student shall begin to think of the profession of teaching immediately upon entering the University. While the main work in education does not come until the junior and senior years, the student receives guidance and counsel from the outset in selecting his courses and is helped to get in touch with the professional atmosphere that should surround a teachers' college. The foundation work in zoology and psychology will be given as far as possible with the teaching profession in mind. It is planned to give some work of a general nature in education during the two first years that will serve as vocational guidance and will assist the student to arrange his work most advantageously and to accomplish it most economically. By the more prolonged individual acquaintance between students and the faculty of the College of Education it is hoped that the student will receive greater professional help and the faculty will be better able to judge of the teaching qualities of the students.

Under the new plan the student does not take so many required courses as formerly. The specific requirements in foreign language, physical science, mathematics, history and a half year of philosophy have been omitted. The student may elect these if he chooses. By this means the curriculum will be much more flexible and the student will be given the important educational privilege of choosing largely his own courses. This is in harmony with the idea of the greater vocationalizing of education.

The work of education and allied courses has been so extended that adequate professional preparation can now be secured. The courses in zoology, psychology, and sociology are all directly contributory to knowledge and interpretation of the courses in education.

A degree may be obtained at the end of the fourth year, but the standard which the University encourages and hopes to establish for high school teaching is the five-year course, consisting of thorough professional work combined with advanced academic work. Students expecting to teach are encouraged on entering to plan their courses for the master's degree in education. While the extended combined course is preferred it is possible for students with adequate preparation to secure the master's degree in a year of graduate work.

REQUIREMENTS FOR ADMISSION

Full information regarding requirements for admission,, registration, and expenses may be found on pages 45-51.

REQUIREMENTS FOR GRADUATION WITH THE DEGREE OF BACHELOR OF EDUCATION.

To secure the degree of bachelor of education the candidate must fulfill the following conditions:

1. Comply with the admission regulations as stated above.
2. Complete the requirements in college subjects as follows:

	<i>Credits</i>
*Zoology, botany or geology	10
Psychology	5
Sociology	5
Physical education	12
Education	36
†English	10
Teaching subjects:	
(a) Two academic majors or	
(b) One academic major and two academic minors.	
‡Free electives, depending upon the foregoing selections.....	
Total for graduation.....	192

1. An academic major consists of from 35 to 45 credits in some subject other than education. At the option of the major professor this may include the teachers' course.

2. An academic minor consists of from 20 to 30 credits in some subject other than education.

3. The distribution of the work in the academic majors and minors is under the advice of the dean of the College of Education and the head of the department in which the academic major is selected. The distribution of the majors and minors is considered in the light of the actual calls for teachers year by year.

Not later than the beginning of his junior year, each student in the College of Education is required to file with the Registrar,

* Students who have had one year in zoology in the high school may be excused from the laboratory work in zoology in the University, but shall be required to take the courses in evolution and eugenics. The distribution of the required work in zoology shall be determined by the head of the department of zoology.

If a student has taken one of these subjects (zoology, botany or geology) in the high school, he shall either take an advanced course in the given subject in college or an elementary course in one of the other subjects.

† All freshmen are given an opportunity to take an examination in English on entrance to the College of Education. Those whose standings are especially high in the examination may be excused from a part of the required ten credits.

‡ The student's free elective will vary from 15 to 50 credits, according to the exemption in English and the number of credits secured in the major and minor subjects.

††Beginning with 1921, a student who has not taken in high school the amount of foreign language which may be required for admission to the college that he plans to enter, will make up the deficiency in the University as part of his regular schedule of work, but without receiving college credit for it. For the College of Fine Arts, the requirement may be satisfied by 20 hours of a modern foreign language; for the Colleges of Liberal Arts, Science and Education, by 20 hours in any one foreign language.

a statement of his choice of majors (or major and minors) bearing the written approval of the dean of the college and the heads of the departments concerned.

4. The teachers' course in the academic major is required, if offered.

5. The teaching subjects may be selected from any subjects now recognized in the Colleges of Liberal Arts, Science, Fine Arts, or Business Administration, and regularly taught in high schools. Students may minor (but not major) in journalism.

6. The 36 credits in education required for the degree of bachelor of education should include as foundation work the 18 credits required for the normal diploma. The work should also include a course in the history of education and one in childhood or adolescence. The remainder of the work should be selected so as to emphasize the line of special interest, as, for example, administration, secondary education, educational psychology, child study, etc.

7. Candidates for the bachelor's degree in the College of Education must receive grades of A, B, or C in at least three-fourths of the credits required for the degree. This rule does not apply to grades given before the year 1910-1911.

8. Students are allowed to combine, in preparation for teaching, courses from the departments of political science, sociology and economics, for the academic majors or the academic minors. Such combinations must be approved by the dean of the College of Education and the head of the department in which the academic major is selected.

9. Courses in manual and industrial arts, or in those combined with drawing, will be accepted as a minor toward the degree of bachelor of education.

10. Students in the College of Liberal Arts have the right to major in the department of education. Students majoring in education must take at least 36 credits. Students in the Colleges of Science, Engineering, Forestry, Mines, Law, Pharmacy, Fine Arts, and Business Administration may elect courses in education according to conditions fixed by those colleges.

FRESHMAN YEAR

During the freshman year the student should aim to take approximately the following work:

	<i>Credits</i>
English	10
Zoology, botany or geology.....	10
Physical education	5
Psychology	5
Sociology	5
Introduction to education (How to study).....	5
Probable academic major.....	10

ELECTIVES OPEN TO FRESHMEN

Languages: English, French, German, Italian, Scandinavian, Spanish.

Sciences: Astronomy, botany, chemistry, geology, home economics, mathematics, physics, zoology.

Social and Philosophical Subjects: Economics, education, history, journalism, philosophy, political science, psychology, sociology.

Fine Arts: Drawing, design, music, painting, dramatic art.

Manual and Industrial Arts: Drawing, woodwork, forgework.

SOPHOMORE YEAR

During the sophomore year the student should continue physical education. If psychology and sociology have not been taken in the freshman year they should be taken during the first quarter of the sophomore year. Principles of Education should be taken during the sophomore year, the academic major should be continued, and at least one academic minor begun. The range of electives open to sophomores is very wide. For limitations see the departmental statements.

JUNIOR AND SENIOR YEARS

During the junior and senior years about five hours of work in education will be necessary each quarter. The academic major and minors should also be completed. The remainder of the work is elective.

ADMISSION OF NORMAL SCHOOL GRADUATES TO ADVANCED STANDING

Graduates of the normal schools of this state and of institutions of like standing elsewhere, who are likewise graduates of accredited four-year high schools, are admitted to full junior standing in the College of Education. For graduation with the degree of bachelor of education, these students are required to earn a minimum of 90 credits in this University, including the satisfaction of such of the requirements for graduation as have not been fairly covered by previous work. The distribution of the majors and minors is considered in the light of actual calls for teachers year by year. The presumption is that they will take all the required subjects in the College of Education for which they have not had a fair equivalent elsewhere. Requests for modification of this procedure will be considered by the committee on graduation only when recommended by the dean of the college.

Graduates from the approved normal schools who major in education in the College of Liberal Arts may be exempted from such portions of the work in education as they have completed satisfactorily in the normal school, such exemption to be granted only upon the recommendation of the head of the department of education. Claims for advanced university credit based on excess normal credit will be passed on by a committee consisting of the registrar, the dean of the College and the heads of the departments concerned.

REQUIREMENTS FOR NORMAL DIPLOMAS AND LIFE DIPLOMAS

The University is authorized by law to issue teachers' diplomas, valid as teachers' licenses in all public schools of the state, as described below. Candidates for these diplomas should consult with the dean of the College of Education as early as possible regarding their work for the diploma and their preparation for teaching.

1. *The University Five-Year Normal Diploma*, valid for a period of five years from date of issue, is granted on the following conditions:

1. (a) Graduation from this University from the Colleges of Liberal Arts, Science, Education, Fine Arts, or Business Administration, (see also following paragraph); (b) Completion of at least 18 credits (quarter hours) in the department of education; (c) completion of a teachers' course in the major academic subject, if offered, maximum, 9 credits; (d) general psychology, 5 credits; (e) evidence of such general scholarship and personal qualities as give promise of success and credit in the profession of teaching. Legible handwriting, good spelling and correct English are indispensable. Active interest in the prospective work of a teacher will be considered.

Graduates of the professional schools and colleges are eligible to the University normal diplomas and the life diplomas, provided they have completed the requirements in psychology and education and a teachers' course in some academic subject and give evidence of fitness to teach.

The courses in education include the following:

	Credits
Principles of Education	5
Educational Sociology	3
High School curriculum	3
Methods of teaching	3
Practice of teaching	5

The department reserves the right to adjust these requirements in education subject to individual cases. Variations will sometimes need to be made in the case of normal school students, persons who have taken education courses in summer sessions, and teachers with considerable experience. No deviations will be permitted except on approval of the dean of the College of Education.

2. Persons who have received the master's or doctor's degree from this University are eligible to the University five-year normal diploma, provided they have fulfilled the specific requirements exacted of those with the bachelor's degree.

3. Graduates of other accredited colleges or universities than the University of Washington who desire the University five-year normal diploma are required to be in residence in this University at least one quarter subsequent to graduation and to earn not less

than 15 credits in approved subjects. Of these 15 credits 5 credits must be in courses in education approved by the dean of the College of Education, and 10 credits in teaching subjects, in courses approved by the major professor. They must have earned here or elsewhere at least 5 credits in psychology, a total of 18 credits in education, and have completed a teachers' course in an academic subject. Probably most persons coming as graduates from other accredited colleges or universities who wish to earn a Washington teacher's certificate in one quarter would do better to complete the required 18 credits in education, and then have the credits certified to the State Board of Education who will issue a five-year state certificate entitling the holder to teach in Washington.

4. The use of education as the only teaching subject (or major subject) is (for normal diploma) limited to cases of men and women in administrative positions whose undergraduate work shows a fair preparation in two or more high school subjects.

5. Graduates of the advanced courses of state normal schools who subsequently graduate from this University and who become candidates for the University five-year diplomas must earn at least 12 credits in education in this University.

6. Normal school graduates must qualify for the University normal diploma or life diploma to be eligible to teach in high schools. The diplomas from the normal schools qualify the holders for elementary schools only. The work in the University must include courses 75, Principles of Education; 85, Educational Sociology; 119, High School Curriculum. Any deviation must be approved by the dean of the College of Education.

II. *The University Life Diploma* is granted to candidates who fulfill the requirements for the University five-year diploma and also give satisfactory evidence of having taught successfully for at least twenty-four months.

EDUCATION

Sociology and zoology as well as psychology are very desirable as a foundation for the study of education. The courses in principles of education and social foundations of education are fundamental to all other courses in education. Students should take psychology during the freshman or the sophomore year, and principles of education in either the last half of the sophomore year or the first half of the junior year. This should be followed by educational sociology, the high school curriculum, and methods of teaching; practice teaching should be taken in the senior year. Students who major in the department should take all of the fundamental courses required for the normal diplomas and then select enough to total 36 credits in the department. Major students in edu-

cation must take course 186, Educational Measurements or 171, Experimental Education. They should also include child study or adolescence.

Psychology 1 is prerequisite to all courses in education except Education 1. In exceptional cases Psychology 1 may be taken concurrently, but only on the approval of the dean of the College of Education.

The dean of the College of Education may accept as the equivalent of such a fundamental course in psychology the incidental psychological training which may have been received by experienced teachers, with the understanding that they are eventually to take psychology as part of the professional work.

REQUIREMENTS FOR ACADEMIC MAJORS AND MINORS AND RECOMMENDATIONS FOR THE NORMAL AND LIFE DIPLOMAS

"An academic major consists of from 35 to 45 credits in some subject other than education. At the option of the major professor this may include the teachers' course.

"An academic minor consists of from 20 to 30 credits in some subject other than education.

"The teachers' course in the academic major is required, if offered."

The foregoing means that in order to fulfill the requirements for the academic major the student must secure a minimum of 35 credits and may count for the academic major a total of 45 credits. The major professor may require in addition the teachers' course.

For the academic minor the student must secure a minimum of 20 credits and may offer 30 credits toward the academic minor. The student determines whether more than 35 credits are to be earned for the major or more than 20 credits for the minor. The departments may require additional work for recommendations to teach the subjects or for the normal or life diploma recommendations.

Below are listed the courses specified by the various departments for the academic majors and minors in the College of Education. Those who expect major or minor recommendations by the academic departments for teaching or on the normal or life diplomas, as required by the State Board of Education, should comply with the requirements made by the various departments. However, the academic major or minor graduation requirements will be fulfilled with the minimum of 35 or 20 credits respectively. For descriptions of the courses see the respective department statements.

ASTRONOMY

Academic Minor (major not offered): Courses 1, 2, 112, 123, 131. It is recommended that students who wish to combine astronomy with mathematics or physics add course 172.

BACTERIOLOGY

Academic Major: Courses 101, 102, 103, 201, 202, 203, and 9 hours selected from 210-211-212, 213-214-215; total 36 credits.

Academic Minor: Courses 101, 102, 103, and from numbers above 200 enough to total 20 credits.

BOTANY

Academic Major: Minimum 35 credits, including courses 105, 106, 107, and 140, 141, 142, or 143, 144, 145.

Academic Minor: Minimum 20 credits of which at least 15 credits should be in courses above 100. For a minor recommendation to teach botany at least 25 credits.

Major students in botany should take at least a year of chemistry.

CHEMISTRY

Academic Major: Courses 21-22-23, 101, 111, 131-132; minimum 35 credits.

Academic Minors Courses 21-22-23, 101, 111, or (131-132); or course 5-6, 135-136; minimum 20 credits. To be recommended to teach the subject the student must add 23 or 101; total 25 credits.

For the minor, students should have had at least high school physics; for the major they should have a year of college physics. Grades must average at least C to secure a recommendation for teaching chemistry.

CIVICS

Academic Major, combining Political Science, Sociology and Economics: Political Science 1, Sociology 1, Economics 1, and one of the following groups: Political Science, 10, 60, 100, Political Science, electives; Sociology 29, 51, 55, 56, 60; Economics 57, 61, 105, 160; minimum 35 credits.

Academic Minor: Political Science 1, Economics 1, Sociology 1, and 5 (for teaching recommendation 10) additional from one of the three subjects; minimum 20 credits.

CLASSICAL LANGUAGES AND LITERATURE

Academic Major in Latin: Latin 4, 5, 6, Greek 1 and 2, Latin 50 or 60 or 70, and Latin 103-104-105; total 39 credits.

Academic Minor in Latin: Latin 4, 5, 6; and two of 50, 60, 70; or 103-104-105; total 25 or 24 credits.

Academic Major in Greek: Greek, 1, 2, 3, 4, 5, 11, 101-102-103, Latin 10 credits; total 40 credits.

Academic Minor in Greek: Greek 1, 2, 3, 4, 5, 11; total 26 credits.

COMMERCIAL TEACHING

See Economics and Business Administration.

DRAMATIC ART

Academic Major: Courses 1-2-3, 21-22-23, 101-102-103, 111-112-113; total 45 credits.

Academic Minor: Courses 1-2-3, 21-22-23, 101-102-103; total 30 credits.

DRAWING

Academic Major: Courses 5-6-7, 9-10-11, 16-17-18, 101, 153, and either 53-54-55, or 103-104 or 105-106; total 36 to 42 credits.

Academic Minor: Courses 5-6-7, 9-10-11, 16-17-18, 101, 153; total 30 credits.

ECONOMICS AND BUSINESS ADMINISTRATION

Academic Major: Courses 1, 57, 61, 105, 160; electives to total minimum of 35 credits.

Academic Minor: Courses 1, 57, 61; electives to total minimum of 20 credits.

See also Civics for combinations with Political Science and Sociology.

COMMERCIAL TEACHING

Academic Major: Courses 11, 12, 54, 55, 65, 182; minimum 35 credits.

If more are elected 101-102 is recommended.

Academic Minor: Courses 11, 12, 64, 65; minimum 20 credits.

Shorthand and typewriting are almost absolutely necessary for commercial teaching in high school and should be taken although no college credit is given.

ENGLISH

Academic Major: Freshman composition, teachers' course 188-180-190, senior conference 191-192-193, electives to total 35 credits, exclusive of freshman composition.

Academic Minor: 20 credits exclusive of freshman composition.

For either a major or a minor it is desirable to divide the time between the extensive courses which give broad surveys and the intensive courses which deal critically with limited periods or movements.

FINE ARTS

(See Drawing and Music.)

GEOLOGY

Academic Major: Courses 1 or 12, 2, 10, 11, 21, 31, 116, 120; minimum 36 credits.

Academic Minor: Courses 1 or 12, 2, 21; minimum 20 credits.

GERMANIC LANGUAGES AND LITERATURE

Academic Major: Minimum 35 credits. Must include or add course 160-161-162.

Academic Minor: Minimum 20 credits.

Major Recommendation for teaching, at least 30 credits in courses above 100, and include or add course 160-161-162.

HISTORY

Academic Major: Minimum 35 credits, including course 1-2. Electives on advice of the head of the department.

Academic Minor: Minimum 20 credits, including 1-2, or 5-6, or 57-58. Electives on advice of the head of the department.

HOME ECONOMICS

Academic Major: Courses 4, 5-6, 7, 8, 25, 107-108, 112-113, 143, 144-145, 146-147, 148; total 56 credits.

Academic Major in Food and Nutrition: Courses 4, 5-6, 7, 43 or 144, 107-108, 145, 146-147, 148; total 39 credits.

Academic Minor in Food and Nutrition: Courses 5-6, 7, 107-108, 145, 146-147; total 28 credits.

Academic Minor in Textiles and Clothing: Courses 7, 8, 25, 112-113, 143, 146; total 26 credits.

Academic Major in Textiles and Clothing: In addition to the minor 148, and at least 8 credits from 130, 133, 135; total 36 credits.

JOURNALISM

Academic Minor: Courses 51-52-53, 101-102-103, 120-121-122, 150-151; total 30 credits.

Academic Major in Journalism not offered in the College of Education.

MATHEMATICS

Academic Major: Minimum 35 credits, including courses 5, 109, 127.

Academic Minor: Minimum 20 credits, including courses 4, 5.

MUSIC: (PUBLIC SCHOOL)

Academic Major: Courses 1-2-3, 4-5-6, 7-8-9, 14-15-16, 51-52-53, 54-55-56, 113-114-115; total 45 credits.

Academic Minor: Courses 1-2-3, 7-8-9, 14-15-16, 54-55-56; total 24 credits.

PHILOSOPHY

Academic Major: Minimum 35 credits, including course 101-102-103.

Academic Minor: Minimum 20 credits, including course 101-102-103.

PHYSICAL EDUCATION FOR WOMEN

Academic Major: Total of 45 credits including 101-102-103, 104-105-106, 111-112-113, 131, 154-155-156, 170. Education 140 additional in all cases unless excused. Electives will be chosen to suit different needs under advice of the head of the department of physical education, and the dean of the college of education. Anatomy 101-102-103, and Physiology 54-55 are prerequisite to certain of the foregoing courses. The courses in physiology or anatomy may be offered as an academic minor in physiology.

Students desiring to prepare for *Community Recreation* and *Leadership* may select the following combination for an academic major in the Department of Physical Education:

Academic Major: Dramatic Art 31; Sociology 1, 55, 57, 62; Drawing 169, 170, 171; Physical Education 104-105-106, 111-112-113, 154-155-156, 167, 169, 170-171-172, 179; minimum 34 credits.

(Anatomy or other Sciences not required for the courses in physical education mentioned in the foregoing paragraph.)

PHYSICS

Academic Major: Courses 1, 2, 3, and not less than 20 credits from other courses under 200; minimum 35 credits.

Academic Minor: Courses 1, 2, 3, and not less than 5 credits from other courses under 200; minimum 20 credits.

Recommendation as a major or minor for the normal diploma same as the foregoing with all grades above C.

POLITICAL SCIENCE

Academic Major: Courses 1, 10, 60, 100, and electives to make minimum of 35 credits.

Academic Minor: Courses 1, 10, 60, 100, minimum 18 credits.

For teaching civics, courses in history, economics and sociology are desirable as supporting subjects. See also "civics" for combination with economics and sociology.

PSYCHOLOGY

Academic Major: Courses 1, 101, 106, 109, 111, 112, 114, 124 and electives to make a minimum of 35 credits.

Academic Minor: Courses 1, 106, 112, 114, and electives to make a minimum of 20 credits.

Recommendations for the normal diploma are made on the basis of quality rather than merely the required number of credits. Only high grade students can be recommended because of the specialized character of psychology work as a teaching subject.

ROMANIC LANGUAGES AND LITERATURE

Academic Major: Minimum of 35 college credits in one language.

Academic Minor: Minimum of 20 college credits in one language.

Recommendation for Teaching French: Courses 1-2-3, 4-5-6, 7-8-9, 41, 101-102-103, 191-192-193, electives from literary course 10 credits; total 58 credits.

Recommendation for Teaching Spanish: Courses 1-2-3, 4-5-6, 7-8-9, 101-102-103, electives from literary courses 10 credits; total 55 credits.

In many cases a part of the French or Spanish courses may have been taken in high school.

The distinction between major and minor recommendations for teaching French or Spanish are determined upon the basis of quality rather than quantity.

SCANDINAVIAN LANGUAGES AND LITERATURE

Academic Major: Minimum 35 credits.

Academic Minor: Minimum 20 credits.

Suggested minors in Swedish: Courses 1-2-3, 23-24-25, 103-104-105; minimum 21 credits.

Because of the diversity of previous preparation it will be necessary to consult the head of the department in each case.

SOCIOLOGY

Academic Major: Courses 1, 29, 51, 55, 56, 60, and electives to make a minimum of 35 credits.

Academic Minor: Courses 1, 29, 51, and electives to make a minimum of 20 credits.

Electives may be along one of three lines, viz: anthropology, social theory or social problems. Important basic and supplementary subjects, zoology, psychology, statistics, political science.

See civics for combination with economics and political science.

ZOOLOGY

Academic Major: Courses 1-2 or 54-55 and electives to make a minimum of 35 credits.

Academic Minor: Courses 1-2 or 54-55 and electives to make a minimum of 20 credits.

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index.)

LIBRARY SCHOOL

THE FACULTY

HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.

JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.

WILLIAM ELMER HENRY, A. M. (Indiana), Professor of Library Science; DIRECTOR.

CHARLES WESLEY SMITH, A. B., B. L. S. (Illinois), Associate Professor of Library Science.

ELLEN F. HOWE, A. B. (Washington), Graduate in Library Science (Washington), Certificate (Carnegie Library School), Instructor in Library Science.

ROBINSON SPENCER, A. B. (Wesleyan University), B. L. S. (Illinois), Instructor in Library Science.

EVELYN MAY BLODGETT, A. B. (Vassar), (Pratt Institute School of Library Science), Instructor in Library Science.

THE LIBRARY SCHOOL

The Library School is a professional school offering opportunity for education in librarianship.

Being an educational institution, the library should not be entrusted to persons of merely elementary acquirements. Its conduct requires a larger and more comprehensive educational equipment and outlook than can be had with less than that signified by the bachelor's degree.

The technical curriculum extends through three quarters—short in comparison with the academic curriculum, because the general educational equipment of the librarian is of larger significance than the technical education, but neither is sufficient without the other.

Graduates of the School are competent to take charge of a small public library or to take an assistant's place in any department of the larger libraries. After a reasonable experience in either of these positions, they have shown themselves competent to conduct libraries of medium size with excellent success.

ADMISSION

Admission is granted as follows:

1. To graduate students who hold the baccalaureate degree from any college or university of good standing, and whose undergraduate work in either or both high school and college has included the equivalent of at least twenty college credits in each of two modern foreign languages, German and French preferred. Slight deficiencies in the languages, however, may be accepted as conditions, but must be removed within the period of study in the Library School. Upon the completion of forty-six credits in library science, and the removal of any language conditions, the candidate will be granted the degree of bachelor of science in library science.

2. To students who have qualified for senior standing in the College of Liberal Arts or in the elective curricula in the College of Science—having earned 147 credits, including 12 credits in military science or physical education and including all required work. Such students may finish the curriculum in three quarters, provided they meet the language requirements prescribed in paragraph one above. The completion of forty-six credits in library science shall constitute and satisfy the requirements for the degree of bachelor of arts.

ADVISORY SUGGESTIONS

Before entering the School the student should be able to operate a typewriting machine with accuracy and fair speed.

No one with serious physical defects or in ill health can readily secure a position in library service, therefore such persons should not ask admission to the School.

Persons beyond thirty years of age are advised not to enter the School unless they have already had experience in library service.

CURRICULA IN LIBRARY SCIENCE

	<i>Credits</i>
Order, accession and trade bibliography.....	1
Circulation administration	1
Classification and subject headings	3
Cataloging	6
Reference	6
History of books and libraries.....	2
Organization and extension.....	2
Administration	2
Subject bibliography	2
Book selection	7
Work with children and schools.....	2
Special lectures	1
Special study of specific libraries.....	1
Practice (300 clock hours).....	10

Each recitation or lecture period presupposes two hours preparation and twelve such periods are counted as one credit, and thirty clock hours of practice are counted as one credit.

Practice.—Practice under careful supervision covers 300 clock hours, fifteen hours per week through ten weeks each during the winter and spring quarters.

The practice time is divided about equally between the University Library and the Seattle Public Library.

The Seattle Public Library offers rather unusual opportunities for students to practice in varied phases of work under careful supervision of trained librarians of large experience.

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index.)

COLLEGE OF BUSINESS ADMINISTRATION

THE FACULTY

HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.

JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.

STEPHEN IVAN MILLER, JR., A. B. (Stanford), LL. B. (Michigan), Professor of Economics;
DEAN.

LESLIE JAMES AYER, B. S., J. D. (Chicago), Professor of Law.

THOMAS L. KIBLER, PH. D. (George Washington University), Professor of Business Administration.

HOWARD T. LEWIS, M. A. (Wisconsin), Professor of Business Administration.

JAMES E. GOULD, A. M. (Harvard), Professor of Navigation; Dean of Men.

VANDERVEER CUSTIS, PH. D. (Harvard), Associate Professor of Business Administration.

HARRY E. SMITH, PH. D. (Cornell), Associate Professor of Business Administration.

WILLIAM D. MORIARTY, PH. D. (Michigan), Associate Professor of Business Administration.

WILLIAM E. COX, A. M. (Texas), Associate Professor of Business Administration.

HOWARD H. PRESTON, PH. D. (Iowa), Associate Professor of Business Administration.

THERESA S. MCMAHON, PH. D. (Wisconsin), Assistant Professor of Business Administration.

MAOY M. SKINNER, PH. D. (Harvard), Assistant Professor of Business Administration.

CARL S. DAKAN, B. S. (Missouri), Assistant Professor of Business Administration.

JAMES M. MCCONAHEY, M. A. (Washington and Jefferson), LL. B. (Northwestern), C.P.A.,
Lecturer in Accounting.

HOMER E. GREGORY, A. M. (Chicago), Instructor in Business Administration.

OSCAR E. DRAFER, Instructor in Business Administration.

KARL LEID, A. B. (Stanford), Instructor in Business Administration.

V. V. TARBILL, M.B.A. (Harvard), Instructor in Business Administration.

J. G. DRISCOLL, A. B., LL. B. (Stanford), Instructor in Business Administration.

HAROLD TURPIN, Teaching Assistant in Business Administration.

HORACE D. MCGIRR, Teaching Assistant in Business Administration.

FREDERICK W. WOODBRIDGE, Teaching Assistant in Business Administration.

PAUL ELLSWORTH, Teaching Assistant in Business Administration.

FREDERICK M. PADEFORD, PH. D. (Yale), Professor of English; Dean of the Graduate School.

EDWARD MCMAHON, A. M. (Wisconsin), Associate Professor of American History.

WILLIAM SAVERY, PH. D. (Harvard), Professor of Philosophy.

ROBERT EDOUARD MORITZ, PH. D. (Nebraska), PH. N.D. (Strassburg), Professor of Mathematics.

HENRY KREITZER BENSON, PH. D. (Columbia), Professor of Chemical Engineering.

CARL EDWARD MAGNUSSON, PH. D. (Wisconsin), E. E. (Minnesota), Professor of Electrical Engineering; Dean of the College of Engineering.

FREDERICK ELMER BOLTON, PH. D. (Clark), Professor of Education; Dean of the College of Education.

EFFIE ISABEL RAITT, A. M. (Columbia), Professor of Home Economics.

STEVENSON SMITH, PH. D. (Pennsylvania), Professor of Psychology.

COLLEGE OF BUSINESS ADMINISTRATION

Modern business has reached that stage where internal and external economies must be realized. The industrial management of today seeks to reduce waste in materials and labor, and to promote the most effective organization of the factors of production. Such a task requires not only special knowledge, but also vision of the highest order.

A knowledge of accounting, statistics, labor efficiency, resources, credit, insurance, business law and organization, is fundamental for a proper understanding and an intelligent direction of our modern industrial system. Such studies as psychology, sociology, government, ethics, and history provide the larger equipment necessary for dealing with this industrial system in its proper perspective and its social relationships.

The establishment of a well-ordered plant is the basis of a strong position in production. Just as important is the problem of successfully moving the product to the consumer. Markets are no longer local, but national and even international. Every business man has occasion to study salesmanship, advertising, transportation routes and rates, banking, exchange, tariffs and government regulation. The more extended state control of industry especially is calling for unusual ability to cooperate.

The College of Business Administration aims to train students to meet the general as well as the specific problems of modern industry.

REQUIREMENTS FOR ADMISSION

Full information regarding requirements for admission, registration, and expenses may be found on pages 39-51.

Additional Requirements.—The faculty of the College of Business Administration reserves the right to ask for additional work from students who present such irregular or specialized credit as to constitute an insufficient basis for high standard in their college subjects.

GRADUATION

Degrees.—The College of Business Administration is a professional college, and its graduates receive the degree of bachelor of business administration. The degree of bachelor of business administration will be conferred upon any student who has fulfilled the entrance requirements and who presents 192 credits in subjects required or approved by the faculty of the College of Business Administration.

The degree of master of business administration will be conferred upon students who continue their work for an additional year, after completing the requirements for the degree of bachelor

of business administration. Students will not be advised to do graduate work unless they have shown unusual ability in their previous courses. All graduate work must be selected after a consultation with the instructor in charge of the special department in which the student is interested, and after the approval of the dean of the College of Business Administration.

Students entering from other colleges and universities must satisfy not only the general requirements of the University, but also the requirements of the College of Business Administration.

Not less than three-fourth of the credits required for graduation must be earned with grades of A, B, or C.

Curricula.—All students in the College of Business Administration must have their selection of courses approved each quarter by a member of the college faculty. The college requires the following courses:

FIRST YEAR		Credits
B. A. 1	General Economics. Autumn, winter, spring, summer. Lecture and discussion groups. Five hours.....	5
B. A. 7	Economic Resources of the World. Autumn, winter, spring, summer. Five hours.....	5
B. A. 11-12	Elementary Accounting. Autumn, winter, spring, summer. Two quarters.....	10
Math. 11-12	Mathematical Theory of Investments. Autumn, winter, spring, summer. Two quarters.....	10
Eng. 1-2	*Written and Oral English. Autumn, winter, spring, summer. Two quarters.....	10
Psych. 1	Elements of Psychology. Autumn, winter, spring, summer. Five hours.....	5
		<hr/> 45

*If not credited, substitution of approved electives in College other than the College of Business Administration.

SECOND YEAR		
History	Nine or ten hours. Two quarters required.....	9 or 10
B. A. 57	Money and Banking. Autumn, winter, spring, summer.....	5
B. A. 54-55-56	Business Law. Autumn, winter, spring, summer. Three quarters required.....	9
B. A. 61	Social and Economic Standards of Living or Sociology I. Autumn, winter, spring, summer.....	5
Math. 13	Theory of Statistics. Autumn, winter, spring, summer. (Or five hours of approved electives in any College other than that of Business Administration.).....	5
	Approved Electives. Ten hours of accounting or equal number of hours in other colleges than that of Business Administration.....	11 or 12
THIRD YEAR		
Pol. Sci. 1	Elements of Government. Autumn, winter, spring, summer. One quarter required.....	5
	Approved electives. 40 hours.....	40
		<hr/> 45

FOURTH YEAR		Credits
Phil. 2	Introduction to Social Ethics. Autumn, winter, spring, summer. One quarter required.....	5
B. A. 160	Advanced Economics. Autumn, winter, spring, summer. One quarter required.....	5
Research	Five hours in selected major department.....	5
	30 credits of approved electives.....	30
		<hr/> 45

The requirements of the first two years are made sufficiently broad to establish a foundation for the profession of business, regardless of the particular field in which the student may later be interested.

No student is allowed to enter the junior-senior courses of the College of Business Administration unless he has (a) reached at least junior standing and (b) satisfied the prerequisites to these courses.

The prerequisites to the junior-senior courses have been established after the most careful consideration of (a) the standard of efficiency and performance aimed at in the course, and (b) the educational value which the course might have for the student. It has been decided that to admit students who have not completed the carefully arranged prerequisites would imperil not only the quality of the work of the instructor, but also would make it impossible for the students to gain the full benefit of the course. But the college realizes that certain just claims to exceptions from the above rules could be presented, and has decided that exceptions can be granted to those students whose maturity and extended experience in economic affairs of a suitable nature make it just and reasonable. Proof of these experiences and qualifications will be passed upon by the dean of the college of Business Administration.

The junior and senior years are, in large part, reserved for the student's selected field of business interest. Each student or group of students will be guided and assisted by the instructor designated for that department of work, under the general direction of the dean of the College of Business Administration.

Fields of Training.—The following fields of business training are suggested:

- | | |
|------------------------------------------|-------------------------|
| 1. Accounting | 7. Transportation |
| 2. Business Finance | 8. Maritime Commerce |
| 3. Industrial and Employment Management. | 9. Foreign Trade |
| 4. Marketing and Sales | 10. Insurance |
| 5. Merchandising | 11. Secretarial Work |
| 6. Advertising | 12. Commercial Teaching |

SUGGESTED COURSES FOR THE PROFESSIONAL FIELDS

In the first year the student fulfills the standardized requirements (see pages 43-44).

For the second, third and fourth years the following courses are suggested.*

ACCOUNTING

SECOND YEAR

Second Year Accounting, 10 credits.

THIRD YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Advanced Accounting	5	Advanced Accounting	5	Commercial Credits	5
Business Organization	5	Corporation Finance	5	Business Statistics	5
Political Science	5	Banking Practice and Accounting	5	Investments and Speculation	5

FOURTH YEAR

FOURTH YEAR					
Cost Accounting and Installation	5	Auditing Practice and Professional Ethics	5	Income Tax and C.P.A.	5
Corporation and Railroad Accounting	5	Industrial and Employment Management	5	Advanced Economics	5
Social Ethics	5	Office Management	5	Research in Accounting	5

*No student will be permitted to specialize in a field of work without having had his schedule approved by the major professor in charge of that field.

BUSINESS FINANCE

SECOND YEAR

Second Year Accounting, 10 credits.

THIRD YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Business Organization . . .	5	Corporation Finance . . .	5	Investments and Speculation . . .	5
Foreign Exchange	5	Banking Practice	5	Commercial Credits	5
Political Science	5	Social Ethics	5	Business Statistics	5

FOURTH YEAR

Economics of Transportation	5	Railroad Finance	5	Advanced Money and Banking	5
Risk and Social Insurance	5	Research in Business Finance	5	Research in Business Finance	5
Approved Electives	5	Approved Electives	5	Approved Electives	5

INDUSTRIAL AND EMPLOYMENT MANAGEMENT

SECOND YEAR

Second Year Accounting, 10 credits.

THIRD YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Business Organization . . .	5	Corporation Finance . . .	5	Business Statistics . . .	5
Economics of Markets . . .	5	Sales Management	5	Political Science	5
Economics of Advertising . .	5	Advanced Accounting . . .	5	Advanced Accounting . . .	5

FOURTH YEAR

American Labor Problems . .	5	Industrial and Employment Management	5	Commercial Credits	5
Cost Accounting	5	Ethics	5	Investments and Speculation	5
Plant Construction	5	Advanced Economics . . .	5	Research in Industrial and Employment Management . .	5

MARKETING

THIRD YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Economics of Transportation	5	Corporation Finance . . .	5	Business Statistics . . .	5
Economics of Marketing . . .	5	Sales Management	5	Commercial Credits . . .	5
Economics of Advertising . .	5	Political Science	5	Electives	5

FOURTH YEAR

Advanced Money and Banking	5	Advanced Economics . . .	5	History of Economic Thought	5
Trade of Far and Near East	5	Trade of Europe	5	Trade of Americans	5
Research in Marketing and Advertising	5	Industrial Management . .	5	Electives	5

MERCHANDISING

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
General Economics	5	English	5	English	5
Economic Resources	5	Accounting	5	Accounting	5
Psychology	5	Approved Electives	5	Approved Electives	5

SECOND YEAR

Business Law	3	Business Law	3	Business Law	3
Money and Banking	5	Social and Economic Standards	5	Theory of Statistics	5
Textiles	3	Industrial History	5	Home Furnishing	3
Industrial History	5			Approved Electives	4

THIRD YEAR

Economics of Marketing . . .	5	Sales Management	5	Ethics	5
Economics of Advertising . .	5	Political Science	5	Sociology	5
Approved Electives	5	Approved Electives	5	Approved Electives	5

FOURTH YEAR

During the senior year the student will spend alternate quarters on full time in the merchandising field in which he desires to specialize. (See general statement of Apprenticeships in Marketing, Merchandising and Advertising.) The program for the other two quarters of the senior year will be made up of approved electives chosen with reference to his special field, only advanced economics being required of all.

ADVERTISING

THIRD YEAR					
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Advanced Composition ...	5	Advanced Composition ...	5	Business Statistics	5
Economics of Marketing... 5		Sales Management	5	Commercial Credits	5
Economics of Advertising.. 5		Corporation Finance	5	Political Science	5
Electives	2	Electives	2		
FOURTH YEAR					
Trade of Far and Near East	5	Trade of Europe	5	Trade of Americas	5
Advanced Money and Banking	5	Advanced Economics	5	Electives	5
Typography of Advertising 2		Typography of Advertising 2		Typography of Advertising 2	
Research in Marketing and Advertising.....	3	Research in Marketing and Advertising.....	3	Research in Marketing and Advertising.....	3

TRANSPORTATION

THIRD YEAR					
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Economics of Transportation: Rails, Water, Ports	5	Business Administration ..	5	Business Statistics	5
Political Science	5	Corporation Finance	5	Second Year Accounting.. 5	
Economics of Markets..... 5		Railroad Finance and Administration	5	Social Ethics	5
FOURTH YEAR					
Corporation and Railroad Accounting	5	Industrial and Employment Management	5	Rail and Marine Rates... 5	
Exporting and Importing.. 5		Research in Transportation 5		Research in Transportation 5	
Advanced Economics	5	Ship Operation and Management	5	Approved Electives	5

MARITIME COMMERCE

This suggested curriculum in Maritime Commerce is intended to give preliminary training for the position of general manager and foreign representative in firms engaged in foreign trade, for port managers, auditors, and deck officers in shipping organizations. The courses after the first year will be taken on the alternating quarter system, quarters of office practice and sea service being coordinated with the academic work.

<i>First Quarter</i>	<i>Credits</i>	<i>Second Quarter</i>	<i>Credits</i>	<i>Third Quarter</i>	<i>Credits</i>
Elementary Economics	5	Economic Resources	5	Business Correspondance .	5
Elementary Accounting ...	5	Elementary Accounting ..	5	General Psychology	5
Ship Operation	5	Ship Operation	5	Electives	5
<i>Fourth Quarter</i>	<i>Credits</i>	<i>Fifth Quarter</i>	<i>Credits</i>	<i>Sixth Quarter</i>	<i>Credits</i>
Business Law	3	Business Law	3	Business Law	3
Money and Banking	5	Economics of Transporta-		Risk and Insurance.....	5
Ship Operation	5	History	5	History	5
Electives	2	Electives	2	Electives	2
<i>Seventh Quarter</i>	<i>Credits</i>	<i>Eighth Quarter</i>	<i>Credits</i>	<i>Ninth Quarter</i>	<i>Credits</i>
Economics of Markets	5	Rail and Marine Rates... 5		Economics of Advertising. 5	
Marine Insurance	5	Exporting and Importing.. 5		Terminal Costs and Man-	
Electives	5	Electives	5	agement	5
				Electives	5
<i>Tenth Quarter</i>	<i>Credits</i>	<i>Eleventh Quarter</i>	<i>Credits</i>	<i>Twelfth Quarter</i>	<i>Credits</i>
Advanced Economics	5	Industrial and Employment		Electives	15
Electives	10	Management	5		
		Electives	10		

NOTE.—In so far as opportunities are available students will be assigned to business practice apprenticeships at the end of the first college year. Assignments will be made according to scholastic grades and general ability. Reasonable facility in the use of the typewriter must be shown before assignment. To retain an apprenticeship beyond the second year, a student must learn shorthand.

NOTE 2.—The hours devoted to electives are intended to permit compliance with requirements for graduation and specialization along chosen lines.

NOTE 3.—Consult the Maritime Commerce bulletin for information concerning the apprenticeship plan.

FOREIGN TRADE*THIRD YEAR**

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Economics of Transportation	5	Marine Insurance	5	Commercial Credits	5
Economics of Markets	5	Political Science	5	Economics of Advertising	5
Foreign Exchange	5	Electives	5	Business Statistics	5

FOURTH YEAR

Exporting and Importing ..	5	Trade of Far and Near East	5	Rail and Marine Rates ..	5
Commercial Policies	5	Trade of Europe	5	Trade of Americas	5
Advanced Economics	5	Research in Foreign Trade ..	5	Social Ethics	5

*At least two years of a modern foreign language will be required of all majors in Foreign Trade unless they are specifically exempted from the requirement.

INSURANCE

Second Year Accounting, 10 credits.

THIRD YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Risk and Insurance	5	Political Science	5	Life Insurance	5
Business Organization	5	Office Management	5	Business Statistics	5
Social and Economic Standards of Living or Sociology I.	5	Business Administration ..	5	Economics of Advertising ..	5

FOURTH YEAR

Fire Insurance	5	Marine Insurance	5	Miscellaneous Property Insurance and Real Estate ..	5
Advanced Economics	5	Corporation Finance	5	Research in Insurance	5
Social Ethics	5	Research in Insurance	5		

SECRETARIAL WORK**THIRD YEAR**

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Political Science	5	Office Management	5	Social and Economic Standards	5
Secretarial Training	5	Electives	10	Electives	10
Business Organization	5				

FOURTH YEAR

Advanced Economics	5	Business Administration ..	5	Electives	15
Research in Secretarial Training	5	Ethics	5		
Elective	5	Elective	5		

COMMERCIAL TEACHING**SECOND YEAR**

Second Year Accounting, 10 credits.

THIRD YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Political Science	5	Office Management	5	Business Organization	5
Principles of Education	5	Electives	10	Business Statistics	5
Secretarial Training	5			Elective	5

FOURTH YEAR

Social Ethics	5	Advanced Economics	5	Practice Teaching	5
Commercial Teacher's Course	5	Commercial Teachers' Course	5	Electives	10
Elective	5	Elective	5		

GENERAL INFORMATION

Textbooks—Syllabus Fees.—Many courses in the College of Business Administration require a textbook, and in a few instances more than one. It is the aim of the faculty to keep the textbook expense as low as is consistent with a high standard of class work.

In all, except research courses, it will be necessary to ask from each student a syllabus or consultation fee. The service rendered in

either case is a necessary and valuable one and will prove of considerable benefit to the student's work. This fee has been fixed at \$1.50 a course. As the shorthand and typewriting courses do not form a part of the regular curriculum and are expected to finance themselves, a fee of \$10 will be asked for any one quarter of instruction in either subject.

Library Facilities.—The college is placing in the library a large number of supplementary books. For many years government reports, containing a vast amount of material for the student of business, have been filed in the library. Most of the domestic journals in economics and commerce, as well as many foreign ones, are received by the college. Each student is expected to make use of the material and to report from time to time on current topics of interest.

Student Organizations.—Three professional societies with national affiliations have been established at the College of Business Administration. Beta Gamma Sigma and Alpha Kappa Psi are professional fraternities for men which at present count chapters in many eastern institutions. Membership is based upon high scholarship. Their aim is to further serious study of business problems. Phi Sigma Chi is a similar organization among the women majoring in business administration. Its purpose is not social, but professional, and membership is restricted to candidates for the B. B. A. degree. A number of prominent business women in Seattle and eastern cities are counted among its honorary members. The parent chapter of Pan Xenia, an honor society for majors in foreign trade, was founded two years ago at the University of Washington and bids fair to play an important part in the future of our foreign trade department.

Required Military Science and Physical Education.—The University requirements in military science, physical education and hygiene are satisfied as follows:

Men students.—Freshmen and sophomores: five hours of military science per week.

Women students.—Physical education, five times per week for two years.

Correspondence.—Inquiries in regard to the College of Business Administration may be addressed to the dean of the college. All correspondence regarding admission should be sent to the registrar of the University.

Contact with Actual Business.—The business men of the state and especially of the city of Seattle are cooperating in a most genuine way with the College of Business Administration. Students

are encouraged to avail themselves of the many opportunities to do part-time work in local concerns along their chosen lines, thereby combining practical experience with scientific training.

In addition to this part-time employment an alternating quarter system of office practice and academic work has been established in the division of maritime commerce. The office practice work is made a definite part of the training. Students are referred to the Maritime Commerce bulletin for further information.

During their senior year, or during a year of graduate work, students specializing in marketing, merchandising, or advertising are given the opportunity to spend alternate quarters in actual business under the immediate supervision of a field director. This plan involves either attendance at summer school or working under supervision during the summer between the junior and senior year. These apprenticeships are made possible by the active cooperation of Seattle and Tacoma business houses and will not only give the student the benefit of a more favorable introduction to the best business practice than he might secure for himself but will give him this introduction while he is still in college in order that his theories may be vitalized by supervision of both department heads in the business and the teacher of theory in college discussing with him the application of theory to actual business as the student finds it.

This apprenticeship system is to be extended until it includes students in all of the departments of the College. One interesting phase of the plan, already worked out, is that of placing Chinese students of the College of Business Administration in Seattle business houses, which are either already engaged in trade with the Orient or contemplate entering that field. The China Club of Seattle has shown its usual fine desire to cooperate with the University, in securing twenty or more such apprenticeships. Much benefit is expected to accrue both to the Chinese students who are thus initiated into actual American business methods as well as to the firms which will now receive advice as to the needs of the market in China and will later have native representatives in China who will know their goods, their methods, or their business standing.

Advisory Boards.—The College of Business Administration has already formed advisory boards of business men throughout the state for foreign trade, money and banking, merchant marine management, and insurance. Other boards for transportation, employment management and executive management, salesmanagement, accounting, commercial teaching, secretarial training and merchandising are being formed. The purpose of these boards is to create a direct cooperation between education and industry, principle and practice.

The Students' Advisory Council.—The B. A. Council, organized in the autumn quarter of 1919 by the students of the College, is a

representative body having as its members three officers, two representatives from each of the three upper undergraduate classes, one representative from the freshman class, and one from the graduate school. It functions in an advisory capacity on matters relating to standard of scholarship, student esprit-de-corps, cooperation between the faculty and the student body on other matters which are brought to its attention by the faculty or the student body. The regular Business Administration assemblies are organized and conducted under the direction of the Council.

The Council has been instrumental in inculcating a keener student conception of the honor system throughout the University; cases of student discipline are investigated and reviewed, and the council renders service as a court of appeals.

The mentor system is the conception of the Council and with its inception in the spring quarter of 1921 a larger field of responsibility was entered upon. The mentor plan provides for the appointment of a group of senior and graduate students who will meet the freshmen of the College at certain appointed times in three conferences during the quarter. It is the Big Brother and Sister movement made concrete. The mentors take the responsibility of seeing that every freshman student in his or her group gets the largest possible benefit out of his College life. The mentors have been of great aid to the Council in helping to achieve the ends for which that body was created.

International Relations.—Plans are now being completed to establish exchange scholarships with China and with some of the South American republics. The opportunities which are thus afforded for American students to study abroad and for foreign students to gain a better understanding of American life and thought will be of a great educational value.

Fellowships.—The college is now in a position to grant several fellowships with opportunity for assisting in the instruction. Address, Dean of the College of Business Administration.

Outside Lectures.—It is the policy of the College of Business Administration to supplement as far as possible the work given with practical lectures and discussions by business men. Many of the leading business men of Seattle and the state have delivered lectures in their special fields to classes and a still more extended use of this outside assistance is a definite part of plans for linking up the College of Business Administration with actual business.

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index.)

SCHOOL OF JOURNALISM

THE FACULTY

- HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.
JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.
MATTHEW LYLE SPENCER, PH. D. (Chicago), Professor of Journalism, DIRECTOR.
FRED WASHINGTON KENNEDY, Assistant Professor of Journalism, DIRECTOR of the Journalism Laboratories.
RALPH D. CASEY, A. B. (Washington), Assistant Professor of Journalism.
ROBERT WILLIAM JONES, A. B., LL. B. (Missouri), A. M. (South Dakota), Assistant Professor of Journalism.
MAURICE HICKLIN, A. B., B. J. (Missouri), Instructor in Journalism.
GLADYS ADELIA LANSDON, Editorial Secretary.
-
- EDMOND STEPHEN MEANY, M. L. (Wisconsin), Professor of History.
WILLIAM SAVERY, PH. D. (Harvard), Professor of Philosophy.
PIERRE JOSEPH FREIN, PH. D. (Johns Hopkins), Professor of Romanic Languages.
STEVENSON SMITH, PH. D. (Pennsylvania), Professor of Psychology.
LESLIE JAMES AYER, J. D. (Chicago), Professor of Law.
FRED CARLETON AYER, PH. D. (Chicago), Professor of Education.
WILLIAM DANIEL MORIARTY, PH. D. (Michigan), Associate Professor of Business Administration.
ROBERT MAX GARRETT, PH. D. (Munich), Assistant Professor of English.
HORACE HARDY LESTER, PH. D. (Princeton), Instructor in Physics.
AMBROSE PATTERSON, Associate in Fine Arts.
HAROLD L. TURPIN, Assistant in Business Administration.
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THE SCHOOL AND ITS EQUIPMENT

The first courses in journalism in the University of Washington were given in 1907. A department of journalism was established in 1909. In March, 1918, the department was formally made a school.

The professional courses in the School of Journalism and those prescribed in the colleges of Liberal Arts and Science are planned with two aims in view—to offer instruction and practice in all the important details of newspaper work, and to provide such studies as are best adapted to give the broad training necessary for the successful pursuit of journalism as a profession. In the first the courses include reporting, copy reading, editorial writing, advertising, cartooning, trade journalism, the mechanics of printing and publishing, and the practical work of the business and administrative

¹ Absent on leave.

offices. In the second are history, economics, political science, sociology, philosophy, psychology, language, literature, and similar subjects necessary in developing the broader scholarship indispensable in modern journalism.

This double ideal of the School of Journalism curriculum has justified itself in the increasing demands of Pacific coast editors for University graduates. Requests to date have exceeded the supply to such an extent that the School has been compelled to recommend students who have not completed their training. Ultimately the School hopes to meet the demand with graduates only.

Equipment.—Journalism and printing take up the entire first floor of Commerce Hall, 208 x 70 feet, occupied first in September, 1917. On this floor are the class rooms, the exchange room, the journalism library and reading room, the faculty offices, the University of Washington Daily offices, the Columns, Sun Dodger, and Tyee quarters, the printing and stock rooms, and all the mechanical equipment for teaching practical journalism. The printing laboratory of the School does practically all the printing and publishing work required on the University campus.

Frederick A. Churchill Junior Memorial Library.—In March, 1918, a separate journalism library and reading room was opened, known as the Frederick A. Churchill Junior Memorial Library, in memory of a brilliant student of the School who died in 1916 while doing newspaper work in New York. The Memorial Library contains carefully selected books and periodicals relating to printing, advertising, current events, short story, and all phases of the editorial side of the newspaper.

Journalism "Morgue."—In the Memorial Library has been installed a journalism "morgue," for newspaper and periodical clippings on current topics classified for instant reference. This contains biography, book reviews, and dramatic criticism, besides the continuous chronicle of events.

Student Publications.—The editorial and business offices of the University of Washington Daily, Sun Dodger, Columns, and Tyee are on the first floor of Commerce Hall. Ownership of The Daily and Tyee is vested in the student body. Ownership and control of The Columns and Sun Dodger are held by corporations of students. None of these is supervised by the School of Journalism, though the staff members of each are recruited mainly from the School. All these publications offer opportunities for practical experience in journalistic work. Places on the editorial and business staffs of each, awarded for the most part on a basis of literary and executive ability, are open to all students in the School of Journalism. Opportunity for wide experience in reporting, copy reading, editorial writing, and advertising is offered on The University of Washington Daily, published as a four to six-page paper by the students.

Journalistic Clubs.—Three national organizations are maintained by students in the School of Journalism. Junior and senior men have a chapter of Sigma Delta Chi, one of the two national journalistic fraternities. Junior and senior women maintain a chapter of Theta Sigma Phi, the national journalistic sorority founded at the University of Washington in 1910. Members of the Sun Dodger staff have also a chapter of Hammer and Coffin, the national comic-magazine fraternity.

Opportunity for Self-Help.—The director of the School of Journalism has frequent calls from business managers and publishers for students with some experience to do part time work in advertising, publicity, and reporting. All the local newspapers and many of the more important dailies in neighboring cities maintain special reporters and correspondents at the University. Remuneration for this work ranges up to \$50 a month, according to the services given. Promise of employment, however, cannot be made in advance. Positions usually are given those on the ground who are able to show by actual experience that they can do the work required.

ADMISSION TO THE SCHOOL OF JOURNALISM

Pre-Journalism Majors.—The director of the School of Journalism is the advisor for all students in journalism from the beginning of the freshman year. Registration of pre-journalism majors at the beginning of each quarter is held in the director's office. To him should be taken requests for leave of absence from the University, questions about co-ordinating courses in other schools, and any matters touching the scholastic work of journalism majors.

Journalism Curriculum.—From the beginning of the freshman year a specific curriculum of studies (see page 119) is required of students expecting to major in journalism. Courses in news writing, the country newspaper, and elements of publishing are open to students of sophomore rank. Entrance to the School of Journalism is granted on the ability shown by the individual in these courses to do newspaper work successfully. Formal admission is not permitted until the junior year.

Admission.—On the successful completion of 90 plus 12 credits of prescribed and elective work at the University of Washington, or an equivalent amount from another institution of accredited standing, students are granted the junior certificate, which admits to the School of Journalism. (See page 43.)

Fees.—In certain courses in journalism laboratory fees are charged. These go toward purchase of textbooks, student materials, community typewriters—of which the School has nineteen—and toward subscriptions for newspapers and periodicals, of which the School takes forty or fifty annually, in addition to a large number of

weeklies that come to the director's desk on exchange. The number of courses requiring fees varies from year to year. In 1921-22 the maximum laboratory fees in journalism, in addition to the regular University fees, will not be more than \$2.50 a quarter for any student, regardless of the number of courses taken.

Shorthand and Typewriting.—All written work in the School of Journalism must be done on a typewriter. Both shorthand and typewriting are required for graduation. Prospective students may save themselves much time, however, by learning shorthand and typing before entering the University. Tests in each are given quarterly. Those passing the tests successfully are excused from the University courses.

Graduation.—The curriculum of the School of Journalism leads to the degree of bachelor of arts in journalism, for which 180 crédits must be obtained, plus 12 hours in physical training or military science. Sixty of these crédits must be in journalism, and a minimum of 90 plus 12 hours must have been earned before the student is formally registered in the School of Journalism. An oral examination before the journalism faculty is required of seniors not less than two weeks before the end of the quarter in which they expect to graduate.

Graduate Study.—Advanced courses in journalism, history, economics, political science, sociology, and English are offered students wishing to take graduate study in preparation for newspaper work or teaching journalism. A wide demand exists in high schools, colleges, and universities for instructors adequately trained to teach journalism. The University library contains a large collection of bound newspapers and magazines and furnishes unusual opportunity for a historical study of American journalism. Special provision is made for directing the work of graduate students interested in historical, political, psychological, or language studies in journalism. The courses required will be determined by the nature and amount of undergraduate work the candidate has done in journalism and the phase of it in which he wishes to specialize, such as advertising, the business office, trade journalism, or the purely editorial field. A thesis constitutes one of the requirements. On completion of the requisite number of hours, the degree of master of arts in journalism is granted by the University.

Specialization.—Students looking forward to specialized branches of journalistic work, such as trade or class journalism, advertising, or the business office, will find the School of Journalism equipped to aid them. While emphasis is laid on the editorial side of the newspaper field, provision is made in the curriculum for practical training in other departments as well.

CURRICULUM

Requirements for the degree of bachelor of arts in journalism are scheduled below. The courses are arranged in the order in which they normally follow each other. Those starred are required. Those marked with a dagger are regarded as essential. Others are suggested electives.

FIRST YEAR ¹			
	<i>Credits</i>		<i>Credits</i>
<i>Architecture</i>		<i>History</i>	
10-11-12. Freehand Drawing.....	3	5-6. English Political and Social History	10
<i>Economics</i>		<i>Military Science</i>	
1. *General Economics	5	1-2-3. *Practical Military Science...	6
8. Business Correspondence	5	<i>Political Science</i>	
81. *Typewriting		1. *Elements of Government.....	5
<i>English</i>		10. †American Government	3
1. *Composition	5	11. †State Government	3
64-65. *Great English Writers.....	10	<i>Science</i>	
<i>Foreign Language</i>	15	<i>Sociology</i>	
		1. †Introductory Sociology	5
SECOND YEAR			
	<i>Credits</i>		<i>Credits</i>
<i>Economics</i>		<i>Musio</i>	
11-12. Elementary Accounting	10	1-2-3. Music Appreciation	6
84. *Shorthand		4-5-6. History of Music	6
137-138. Advertising	10	<i>Painting</i>	
<i>English</i>		56-57-58. Illustration and Life Study	9
67-68-69. †Great American Writers...	6	<i>Philosophy</i>	
70-71-72. Shakespeare	9	5. *Introduction to Logic	5
<i>Foreign Language</i>	10	<i>Political Science</i>	
<i>History</i>		52. †Political Parties	3
57-58-59. †History of the United States	9	<i>Psychology</i>	
71-72-73. Ancient History	9	1. *General Psychology	5
<i>Journalism</i>		<i>Science</i>	15
51. *News Writing	5	<i>Sociology</i>	
61. *The Country Newspaper	2	51. Evolution of Material Culture...	3
75-76. *Elements of Publishing	2	55. Community Organization	3
<i>Military Science</i>		56. The Family	3
51-52-53. *Practical and Theoretical		60. Social Psychology	3
Military Science	6	63. †Municipal Sociology	3
THIRD YEAR			
	<i>Credits</i>		<i>Credits</i>
<i>Architecture</i>		<i>Journalism</i>	
101-102-103. History of Architecture	6	120. *Copy Reading	5
<i>Astronomy</i>		130. †Fundamentals of Advertising...	5
1. Introduction to Astronomy	1	131. †Display Advertising	5
<i>Economics</i>		133-134-135. Advertising Typography	6
118. Business Statistics	5	136. Comparative Journalism	2
<i>English</i>		138. *History of Journalism.....	3
98-99-100. †The Bible as Literature	6	140-141-142. *Business Office	6
104-105-106. Contemporary Literature	9	<i>Latin</i> ²	
136-137-138. *Shakespeare	9	11. *Roman Civilization	5
147-148-149. The English Novel.....	9	<i>Law</i>	
<i>Foreign Language</i>	10	54-55-56. *Business Law	9
<i>Greek</i> ²		<i>Philosophy</i>	
11. *Greek Civilization	5	101-102-103. History of Philosophy..	9
<i>History</i>		114-115-116. History of Religion	9
130. Europe, 1814-1870	3	<i>Political Science</i>	
131. Europe since 1870	5	100. †Municipal Government	5
147. The Civil War Period	3	102. Municipal Problems	5
148. The Reconstruction Period.....	3	125. Public Finance	5
149. National Development	3	127. Municipal Finance	5
<i>Journalism</i>		<i>Psychology</i>	
90. *Current Events	3	111. History of Psychology	2
101. *Reporting	5	126. Abnormal Psychology	5
104. †Newspaper Administration	2	<i>Science</i>	15
105. The Sporting Page	2	<i>Sociology</i>	
109. Literary and Dramatic Review-		106. American Social Conditions....	2
ing	2	129. The Social Survey	3

- Students who have not had science in high school are required to take ten hours of chemistry or physics and ten of botany or geology or zoology in the University. Students entering without foreign language are required to take twenty hours of a modern foreign language in the University without credit.
- Students who have taken, or who plan to take, three or more years of ancient language may omit this requirement.

FOURTH YEAR

<i>Architecture</i>	<i>Credits</i>	<i>Journalism</i>	<i>Credits</i>
157-158-159. Freehand Drawing	6	150. *Editorial Writing	5
<i>Economics</i>		160-161-163. Trade Journalism	6
105. Trusts and Combinations.....	3	170-171-172. Magazine and Feature Writing	6
120. Business Administration	3	173. The Short Story.....	3
121. Corporation Finance	5	174-175. Short Story Writing.....	6
153. Railroad Administration	2	188. News Writing for Teachers....	2
161. American Labor Movement.....	3	250. Research in Journalism.....	5
162. Modern Labor Problems	3	<i>Political Science</i>	
<i>English</i>		110. International Law	3
171-172-173. Romantic Poets	9	111. International Politics	3
174-175-176. †Victorian Poets	9	<i>Science</i>	15
183-184-185. General Literature	9	<i>Sociology</i>	
<i>Foreign Language</i>	10	155. Modern Philanthropy	3
<i>History</i>		156. Criminology	3
154. †Development of the Pacific....	3		
163-164-165. †Northwestern History..	0		

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index.)

COLLEGE OF ENGINEERING

THE FACULTY

HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.

JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.

CARL EDWARD MAGNUSSON, PH. D. (Wisconsin), E. E. (Minnesota), Professor of Electrical Engineering; Director of Engineering Experiment Station; DEAN.

EVERETT OWEN EASTWOOD, C. E., M. A. (Virginia), S. B. (Massachusetts Institute of Technology), Professor of Mechanical Engineering.

CHARLES CHURCH MORE, M. S., C. E. (Lafayette), M. C. E. (Cornell), Professor of Civil Engineering.

WILLIAM FRANKLIN ALLISON, B. S., C. E. (Purdue), C. E. (Cornell), Professor of Municipal and Highway Engineering.

HENRY KREITZER BENSON, PH. D. (Columbia), Professor of Chemical Engineering.

GEORGE SAMUEL WILSON, B. S. (Nebraska), Associate Professor of Mechanical Engineering.

CHARLES WILLIAM HARRIS, C. E. (Cornell), Associate Professor of Civil Engineering.

EDGAR ALLEN LOEW, B. S. (E.E.) (Wisconsin), Associate Professor of Electrical Engineering.

ARTHUR MELVIN WINSLOW, PH. B. (Brown), B. S. (Massachusetts Institute of Technology), Associate Professor of Mechanical Engineering.

HARRY RUBBY, B. S. (C. E.), (Illinois), Associate Professor of Civil Engineering.

FREDERICK KURT KIRSTEN, B. S., E. E. (Washington), Assistant Professor of Electrical Engineering.

LESLIE FOREST CURTIS, B. S. (Tufts), M. S. (E.E.) (Washington), Assistant Professor of Electrical Engineering.

FRANK DEMETRIUS HAYDEN, B. S., (C. E.) (Massachusetts Institute of Technology), Assistant Professor of Civil Engineering.

IRA LEONARD COLLIER, B. S. (C. E.) (Washington), Assistant Professor of Civil Engineering.

CHARLES CULBERTSON MAY, B. S. (C. E.) (Washington), Assistant Professor of Civil Engineering.

JOHN CHARLES RATHBUN, JR., A. M., B. S., C. E. (Washington), Assistant Professor of Civil Engineering.

FRED FALCONER WELD, C. E. (Pennsylvania State College), Associate in Civil Engineering.

SAMUEL THOMAS BEATTIE, Instructor in Woodwork.

SANDY MORROW KANE, Instructor in Metal Work.

CLARENCE LESTER WHITE, C. E. (Iowa), Instructor in Civil Engineering.

GORDON RUSSELL SHUCK, E. E. (Minnesota), Instructor in Electrical Engineering.

JAMES BAKER HAMILTON, Instructor in Civil Engineering.

HARRY J. MCINTYRE, B. S. (M.E.) (Washington), Instructor in Mechanical Engineering.

EDMOND CLARENCE MILLER, B. S. (E.E.) (Washington), Instructor in Civil Engineering.

ROBERT QUIKOTE BROWN, B. S. (C.E.) (Washington), Instructor in Civil Engineering.

CHRIS GRENSIDE DOBSON, E. M. (Montana School of Mines), Instructor in Civil Engineering.

FOREST CHARLES DANA, B. S. (C.E.) (Washington), Instructor in Civil Engineering.

ALBERT KALIN, B. S. (E.E.) (Washington), Instructor in Electrical Engineering.

BYRON TOWN McMINN, B. S. (Oregon Agricultural College), Instructor in Mechanical Engineering.

- ROBERT H. G. EDMONDS, B. S. (Whitman), Instructor in Mechanical Engineering.
 GEORGE LISLE HOARD, B. S. (E. E.) (Washington), Instructor in Electrical Engineering.
 JOHN HOWARD THOMPSON, B. S. in Metallurgical Engineering (Washington), Acting Instructor in Civil Engineering.
 JACK RODERICK TOLMIE, B. S. (E. E.) (Washington), Instructor in Electrical Engineering.
 ELGIN ROSCOE WILCOX, Met. E. (Washington), Instructor in Civil Engineering.
 CHARLES GUSTAVE STRUBE, B. S. (M.E.) (Washington), Instructor in Mechanical Engineering.
 EDWARD LEONARD STRANBERG, B. S. (C. E.) (Washington), Associate in Civil Engineering.
 CHAUNCEY WERNECKE, B. S. (C. E.) (Washington), Associate in Civil Engineering.
 M. L. WETZEL, Assistant in Mechanical Engineering.

- FREDERICK MORGAN PADELFORD, PH. D. (Yale), Professor of English; Dean of the Graduate School.
 GEORGE MCPHAIL SMITH, PH. D. (Freiburg), Professor of Inorganic Chemistry.
 JOHN WEINZIRL, PH. D. (Wisconsin), DR. P. H. (Harvard), Professor of Bacteriology.
 LESLIE JAMES AYER, B. S. (Upper Iowa), J. D. (Chicago), Professor of Law.
 SAMUEL LATIMER BOOTHROYD, M. S. (Colorado Agricultural College), Associate Professor of Astronomy.
 JOSEPH DANIELS, S. B. (Massachusetts Institute of Technology), M. S. (Lehigh), Associate Professor of Mining Engineering and Metallurgy.
 HENRY LOUIS BRAKEL, PH. D. (Cornell), Associate Professor of Engineering Physics.
 GEORGE IRVING GAVETT, B. S. (C. E.) (Michigan), Assistant Professor of Mathematics.
 LEWIS IRVING NEIKIRK, PH. D. (Pennsylvania), Assistant Professor of Mathematics.
 ERIC TEMPLE BELL, PH. D. (Columbia), Assistant Professor of Mathematics.
 SAMUEL HERBERT ANDERSON, PH. D. (Illinois), Assistant Professor of Physics.

COLLEGE OF ENGINEERING

Curricula and Degrees.—The College of Engineering offers two four-year curricula in each of the departments of chemical, civil, electrical and mechanical engineering. One of these leads to the degree of bachelor of science in the respective branches of engineering, as B. S. in civil engineering. The other is offered to meet the need for a more general training than is given in the regular four-year curricula. This curriculum leads to the degree of bachelor of science (B.S.), and should be followed by a year of graduate work which, under the university regulations for advanced degrees, leads to the degree of master of science (M.S.) in the respective lines.

In arranging the curricula the aim has been: To keep the work fundamental in character; to introduce the student into an engineering atmosphere as soon as possible; to direct the methods of work and study and to provide for a certain amount of flexibility in the selection of subjects.

A distinctive feature is the engineering problems (C. E. 11-12-13) given by engineering instructors in two three-hour periods a

week and consisting chiefly of problems taken from engineering work, and analyzed from an engineering standpoint .

The freshman work in the departments of chemical, civil, electrical and mechanical engineering, is identical, thus making it possible for a student to delay the definite choice until the beginning of the sophomore year.

All freshman and sophomore work is repeated each quarter. Additional courses will be repeated whenever practicable, provided the demand is sufficient to warrant full sections, but not for less than six students. The plan provides a possibility for taking desirable elective courses, or for engaging in practical work for one or more quarters before completing the curriculum.

Degree with Honors.—A degree with honors in engineering may be conferred upon any student of the College of Engineering who, upon recommendation of the engineering faculty of the honors committee and upon vote of the university faculty, may be declared worthy of unusual distinction.

Advanced Degrees.—The degrees of master of science in civil engineering (M. S. in C. E.), master of science in electrical engineering (M.S. in E.E.), master of science in mechanical engineering (M. S. in M. E.), and master of science in chemical engineering (M. S. in Ch. E.), respectively, will be conferred upon graduates of this college, or other engineering colleges of recognized standing, who complete a year (45 credit hours) of graduate work, including a satisfactory thesis, with the grade of A, B or C. The candidate must comply with the regulations of the Graduate School and pass a formal examination open to all members of the faculty. The selection of work for this degree must, in each case, be approved by the head of the department in which the student majors.

The professional degrees, chemical engineer (Ch. E.), civil engineer (C. E.), electrical engineer (E. E.), and mechanical engineer (M.E.), will be conferred in three years on graduates of this college holding the degree (B. S.) in their respective lines, who give evidence of having been engaged continuously in acceptable engineering work and who present satisfactory theses.

Thesis.—The graduating thesis will consist of research or design in some branch of engineering, or the review of some existing construction. The subject must be approved by the professor in charge of the department under which it is classified.

REQUIREMENTS FOR ADMISSION

Full information regarding requirements for admission, registration, and expenses may be found on pages 39-51.

Students entering the College of Engineering must have a *working knowledge* of the fundamentals of arithmetic, algebra and geometry. It is therefore desirable for the student to review his preparatory mathematics *just before entering college*. By such a step much time will be saved and the work of the college will be rendered more valuable to him.

CURRICULA OF THE COLLEGE OF ENGINEERING

FOR THE FRESHMAN YEAR IN ALL DEPARTMENTS

FRESHMAN

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Alg. Math. 51.....	4	Trig. Math. 52.....	4	Anal. Geom. Math. 53...	4
Engr. Prob. C. E. 11...	3	Engr. Prob. C. E. 12...	3	Engr. Prob. C. E. 13...	3
Gen. Chem. 1 or 21....	5	Gen. Chem. 2 or 22....	5	Gen. Chem. 3 or 23....	5
Drawing, C. E. 1.....	3	Drawing, C. E. 2.....	3	Surveying, C. E. 21....	3
Mil. Sci. or Phys. Ed....	1%	Mil. Sci. or Phys. Ed....	1%	Mil. Sci. or Phys. Ed....	1%
	10%		10%		16%

IN CHEMICAL ENGINEERING

Leading to the degree of Bachelor of Science in Chemical Engineering

FRESHMAN

The same for all curricula. See above.

SOPHOMORE

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Physics 97	5	Physics 98	5	Physics 99	5
Qual. Chem. 101.....	5	Quant. Chem. 112.....	5	Quant. Chem. 113.....	5
Mechanism—M. E. 81...	3	Steam Eng.—M.E. 82...	3	Steam Lab.—M.E. 83...	3
Dif. Cal.—Math. 61....	3	Int. Cal.—Math. 62....	3	Chem. Tech. Ch. 120...	3
Mil. Sci. or Phys. Ed....	1%	Mil. Sci. or Phys. Ed....	1%	Mil. Sci. or Phys. Ed....	1%
	17%		17%		17%

JUNIOR

Ind. Chem. 121.....	5	Ind. Chem. 122	5	Ind. Chem. 123	5
English 4	3	Org. Chem. 128 or 132..	5	Org. Chem. 129 or 133..	5
Mach. Des.—M.E. 91...	2	Mach. Des.—M.E. 91...	2	Dir. Cur.—E.E. 101....	4
Org. Chem. 181 or Ther.		Mechanics—C.E. 131...	3	D. C. Lab.—E.E. 102...	2
mo. & Refrig.—M.E.		Metalwork—M.E. 54....	1		
183	5				
Metalwork—M.E. 53....	1				
	16		16		16

SENIOR

		Op. 1	Op. 2		Op. 1	Op. 2
Phys. Chem 181.....	5	Phys. Chem. 182.....	5	Metalurgy 102	5	5
Alt. Cur.—E.E. 121....	4	Chem. Eng. 216.....	5	Thesis	2	
A.C. Lab.—E.E. 122...	2	Ind. Seminar Ch.		Chem. 217	5	
Elective	5	208	2	Elective	8	5
		Thesis	3			
		Elective	5			
	16		15 15		15	15

Electives must in all cases be approved by the head of the department.

IN CIVIL ENGINEERING

Leading to the degree of Bachelor of Science in Civil Engineering

FRESHMAN

The same for all curricula. See page 124.

SOPHOMORE

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Mech.—C.E. 131.....	3	Mech.—C.E. 132.....	3	Mech.—C.E. 133.....	3
St. Eng.—M.E. 82.....	3	St. Eng. Lab.—M.E. 83..	3	Economics.....	3
Physics 97.....	5	Physics 98.....	5	Physics 99.....	5
R. R. Surv.—C.E. 22... 4		Higher Surv.—C.E. 23.. 4		Field Eng.—C.E. 24... 4	
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%	
	16%		16%		16%

JUNIOR

Hydraulics—C.E. 142... 5	Dir. Cur.—E.E. 101... 4	Alt. Cur.—E.E. 121... 4
Struct. Mat.—C.E. 167. 5	D. C. Lab.—E.E. 102.. 2	A. C. Lab.—E.E. 122... 2
Calc.—Math. 61..... 3	Calc.—Math. 62..... 3	Highways—C.E. 122... 3
Mach. Des.—M.E. 91... 2	Mach. Des.—M.E. 92... 2	Mach. Des.—M.E. 93... 2
	Gas Eng.—M.E. 198... 3	English 4..... 3
	Hyd. Eng.—C.E. 143... 3	Elective..... 3
	17	17

SENIOR

Structures—C.E. 134... 3	Thesis or Engr. Proj. Des.	
Water Sup.—C.E. 153... 3 5	
Business Law—B.A. 54. 3	Business Law—B. A. 55. 3	
Geology 5..... 5	Elective..... 8	Elective..... 15
	16	15

Electives must in all cases be approved by the head of the department.

IN ELECTRICAL ENGINEERING

Leading to the degree of Bachelor of Science in Electrical Engineering

FRESHMAN

The same for all curricula. See page 124.

SOPHOMORE

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Physics 97.....	5	Physics 98.....	5	Physics 99.....	5
Dif. Calc.—Math. 61... 3		Int. Calc.—Math. 62... 3		Int. Calc.—Math. 63... 3	
Mechanism—M.E. 81... 3		El. Steam—M.E. 82... 3		Steam Lab.—M.E. 83... 3	
Mach. Des.—M.E. 91... 2		Mach. Des.—M.E. 92... 2		Mach. Des.—M.E. 93... 2	
Shop—M.E. 53..... 1		Shop—M.E. 54..... 1		Shop—M.E. 55..... 1	
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%	
	15%		15%		15%

JUNIOR

D. C.—E.E. 109..... 4	D. C.—E.E. 111..... 4	A. C.—E.E. 101..... 5
D. C. Lab.—E.E. 110... 2	D. C. Lab.—E.E. 112... 4	A. C. Lab.—E.E. 162... 4
Mechanics—C.E. 131... 3	Mechanics—C.E. 132... 3	Mechanics—C.E. 133... 3
English 4..... 3	Hydraulics—C.E. 142... 5	St. Mat.—M.E. 167... 3
Elective..... 4		
	16	15

SENIOR

A. C.—E.E. 163..... 5	Trans.—E.E. 195, 196 or	Trans.—E.E. 198 or The-
A. C.—E.E. 164..... 5	Thesis 186..... 4	sis 188..... 2
Physics 114..... 3	Mach. Des.—E.E. 152.. 5	Elective..... 14
Elective..... 4	Elective..... 7	
	16	16

Electives must in all cases be approved by the head of the department.

IN MECHANICAL ENGINEERING

Leading to the degree of Bachelor of Science in
Mechanical Engineering

FRESHMAN

The same for all curricula. See page 124.

SOPHOMORE

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Cal.—Math. 61	3	Cal.—Math. 62	3	Cal.—Math. 63	3
Physics 97	5	Physics 98	5	Physics 99	5
Mechanism—M.E. 81 ...	3	El. Steam—M.E. 82 ...	3	Steam Lab.—M.E. 83 ...	3
Mach. Des.—M.E. 91 ...	2	Mach. Des.—M.E. 92 ...	2	Mach. Des.—M.E. 93 ...	2
Shop—M.E. 53	1	Shop—M.E. 54	1	Shop—M.E. 55	1
Mil. Sci. or Phys. Ed. ...	1½	Mil. Sci. or Phys. Ed. ...	1½	Mil. Sci. or Phys. Ed. ...	1½
	15%		15%		15%

JUNIOR

Dir. Cur.—E.E. 101 ...	4	Alt. Cur.—E.E. 121 ...	4	Hydraulics—C.E. 142 ...	5
Dir. Cur. Lab.—E.E. 102	2	Alt. Cur. Lab.—E.E. 122	2	English 4	3
Exp. Eng.—M.E. 151 ...	3	Exp. Engr.—M.E. 152 ...	3	Exp. Engr.—M.E. 153 ...	3
Eng. & Boll.—M.E. 128 ..	3	Eng. & Boll.—M.E. 124 ..	3	Mechanics—C.E. 133 ...	3
Mechanics—C.E. 131 ...	3	Mechanics—C.E. 132 ...	3	Metalwork—M.E. 107 ...	1
Metalwork—M.E. 105 ...	1	Metalwork—M.E. 106 ...	1		
	16		16		15

SENIOR

Business Law—B.A. 54 ...	3	Gas. Eng.—M.E. 198 ...	3	Power Plants—M.E. 184 ...	3
Thermo. & Ref.—M.E. 183	5	Heat. & Vent.—M.E. 182 ..	3	Steam Turb.—M.E. 179 ...	3
Mach. Des.—M.E. 101 ...	2	Mach. Des.—M.E. 102 ...	2	Mach. Des.—M.E. 103 or 199	3
Elective	6	Eng. Mat.—M.E. 167 ...	3	Thesis 210	4
	16	Elective	6	Elective	3
			16		16

Electives must in all cases be approved by the head of the department.

IN NAVAL ARCHITECTURE AND MARINE ENGINEERING

FRESHMAN

The same for all curricula. See page 124.

SOPHOMORE

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Cal.—Math. 61	3	Cal. Math. 62	3	Cal.—Math. 63	3
Physics 97	5	Physics 98	5	Physics 99	5
Mechanism—M.E. 81 ...	3	El. Steam—M.E. 82 ...	3	Steam Lab.—M.E. 83 ...	3
Mach. Des.—M.E. 91 ...	2	Mach. Des.—M.E. 92 ...	2	Mach. Des.—M.E. 93 ...	2
Shop—M.E. 53	1	Shop—M.E. 54	1	Shop—M.E. 55	1
Mil. Sci. or Phys. Ed. ...	1½	Mil. Sci. or Phys. Ed. ...	1½	Mil. Sci. or Phys. Ed. ...	1½
	15%		15%		15%

JUNIOR

Dir. Cur.—E.E. 101 ...	4	Alt. Cur.—E.E. 121 ...	4	Hydraulics—C.E. 142 ...	5
Dir. Cur. Lab.—E.E. 102 ..	2	Alt. Cur. Lab.—E.E. 122 ..	2	Exp. Engr.—M.E. 153 ...	3
Exp. Eng.—M.E. 151 ...	3	Exp. Engr.—M.E. 152 ...	3	Nav. Arch.—M.E. 187 ...	3
Nav. Arch.—M.E. 185 ...	3	Nav. Arch.—M.E. 186 ...	3	Mechanics—C.E. 133 ...	3
Mechanics—C.E. 131 ...	3	Mechanics—C.E. 132 ...	3	Metalwork—M.E. 107 ...	1
Metalwork—M.E. 105 ...	1	Metalwork—M.E. 106 ...	1		
	16		16		15

SENIOR

Business Law—B.A. 54 ...	3	Gas Eng.—M.E. 198 ...	3	Mar. Eng.—M.E. 190 ...	3
Thermo. & Ref.—M.E. 183	5	Heat. & Vent.—M.E. 182 ...	3	Steam Turb.—M.E. 179 ...	3
Ship Design—M.E. 188 ...	2	Ship Design—M.E. 189 ...	2	Mach. Des.—M.E. 103 ...	3
Elective	6	Eng. Mat.—M.E. 167 ...	3	Thesis 210	4
	16	Elective	6	Elective	3
			16		16

Electives must in all cases be approved by the head of the department.

IN COMMERCIAL ENGINEERING

Leading to the degree of Bachelor of Science

The student must register in the chemical, civil, electrical or mechanical engineering department of the College of Engineering.

Mathematics 51, 52, 53, 61, 62, 63, 13.....	28
Physics 97, 98, 99	15
Chemistry 1, 2, 3, or 21, 22, 23.....	15
English 4 (Certificate in English Composition).....	8
Military Science or Physical Education.....	10
Civil Engineering 1, 2, 11, 12, 13, 21, 131, 132.....	24
Electrical Engineering 101, 102, and 121, 122 or 161, 162.....	12
Mechanical Engineering 81, 82, 83, 91, 92, 93.....	15
Business Administration 1 or 2, 11, 12, 118, 156, 167, 168.....	24
Technical Electives (Department in which the student is registered)	21
General Electives	27
Total	192

Electives must in all cases be approved by the dean of the College of Engineering.

IN AERONAUTICAL ENGINEERING

Students who desire to major in aeronautical engineering should include the following courses in the technical and general electives of the curriculum for the bachelor of science degree in the College of Engineering. These courses may also be taken as electives in the curricula for the bachelor of science degree in chemical, civil, electrical and mechanical engineering.

- 101. Aerodynamics.
- 111. Aerial Propellers.
- 121. Airplane Design.
- 141. Airships.
- 161. Aerial Transportation.

Electives must in all cases be approved by the dean of the College of Engineering.

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index.)

ENGINEERING EXPERIMENT STATION

THE STAFF

HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.

JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.

CARL EDWARD MAGNUSSON, PH. D. (Wisconsin), E. E. (Minnesota), Electrical Engineering; DIRECTOR.

HUGO WINKENWERDER, M. F. (Yale), Forest Products.

MILNOR ROBERTS, A. B. (Stanford), Mining and Metallurgy.

HENRY KREITZER BENSON, PH. D. (Columbia), Chemical Engineering and Industrial Chemistry.

CHARLES WILLIAM HARRIS, B. S. (C. E.) (Washington), C. E. (Cornell), Civil Engineering.

EVERETT OWEN EASTWOOD, C. E., A. M. (Virginia), S. B. (Massachusetts Institute of Technology), Mechanical Engineering.

FREDERICK ARTHUR OSBORN, PH. D. (Michigan), Physics Standards and Tests.

For description of the work of the Experiment Station see page 35.

COLLEGE OF FINE ARTS

THE FACULTY

- HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.
JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.
IRVING MACKAY GLEN, A. M. (Oregon), Professor of Music, DEAN.
WILLIAM PIERCE GORSUCH, A. B. (Knox), Professor of Dramatic Art.
CARL FRELINGHUYSEN GOULD, A. B. (Harvard), Associate Professor of Architecture.
FRANCES DICKEY, A. M. (Columbia), Assistant Professor of Music.
MORITZ ROSEN, Graduate (Warsaw Conservatory), Assistant Professor of Music.
ALBERT FRANZ VENINO, (New York College, Stuttgart Conservatory, Leschetizky), Assistant Professor of Music.
CARL PAIGE WOOD, A. M. (Harvard), Assistant Professor of Music.
ROBERT FULTON MCCLELLAND, (Massachusetts Institute of Technology), Instructor in Architecture.
GEORGE C. KIRCHNER, (Leipzig), Instructor in Music.
HAROLD OGDEN SEKSMITH, (Armour Institute), (Chicago Art Institute), Instructor in Architecture.
MRS. LOUISE VAN OGLE, Instructor in Music.
ALBERT PORTER ADAMS, Instructor in Music.
ANNETTE EDENS, (New York School of Fine and Applied Arts, Columbia), Instructor in Drawing.
EILENE FRENCH, B. Mus. (Washington), M. A. (Columbia), Instructor in Music.
AMBROSE PATTERSON, Associate in Fine Arts.
MRS. EUGENIA WORMAN, Associate in Fine Arts.
JAMES A. WEHN, Associate in Modeling and Sculpture.
JANE BURNS ALBERT, Associate in Singing.
ADA TILLEY, B. Mus. Instructor in Music.
EDNA WHITMAN CHITTICK, (Mt. Allison Conservatory), Associate in Music.
GLENN HUGHES, A. M. (Washington), Instructor in Dramatic Art.
ELEANOR CAMPBELL, Instructor in Design.
ELLA JANE SIRGINSON, A. M. (Columbia), Instructor in Fine Arts.
ANNA ELFEIDA STORM, Assistant in Design.
HELEN FERRYMAN, B. Mus. (Washington), Assistant in Music.
LOUISE DOW BENTON, B. Mus. (Washington), Assistant in Music.
FLORENCE BERGH WILSON, B. Mus. (Washington), Assistant in Music.
-
- EVERETT OWEN EASTWOOD, C. E., A. M. (Virginia), S. B. (Massachusetts Institute of Technology), Professor of Mechanical Engineering.
CHARLES LEONARD PHILLIPS, *Colonel*, C. A. C., U. S. A. (U. S. Military Academy), A. B. (Colby), C. E. (Maine).
DAVID CONNOLLY HALL, M. D. (Chicago), University Health Officer and Professor of Hygiene.
CHARLES CHURCH MORE, C. E., M. S. (Lafayette), M. C. E. (Cornell), Professor of Civil Engineering.
THOMAS K. SIDEX, PH. D. (Chicago), Associate Professor of Latin and Greek.
GEORGE EARL FREELAND, PH. D. (Clark), Associate Professor of Education.
CHARLES GOGGIO, PH. D. (Wisconsin), Associate Professor of Romanic Languages.
ROBERT MAX GARRETT, PH. D. (Munich), Associate Professor of English.
ERIO TEMPLE BELL, PH. D. (Columbia), Associate Professor of Mathematics.
HARVEY BRUCE DENSMORE, A. B. (Oxford), Assistant Professor of Greek.
GINO ARTURO RATTI, PH. D. (Grenoble), Assistant Professor of French.
ERNEST OTTO ECKELMAN, PH. D. (Heidelberg), Assistant Professor of German.
SAMUEL HERBERT ANDERSON, PH. D. (Illinois), Assistant Professor of Physics.
MARY EMMA GROSS, A. M. (Teachers' College, Columbia), Assistant Professor of Physical Education.
CURT JOHN DUCASSE, PH. D. (Harvard), Assistant Professor of Philosophy.
LESLIE SPIER, PH. D. (Columbia), Assistant Professor of Anthropology.

COLLEGE OF FINE ARTS

This college comprises the departments of architecture, dramatic art, music, and sculpture, painting and design. In the department of architecture a curriculum of four years is offered leading to the degree of bachelor of architecture; in music there are curricula of four years leading to the degree of bachelor of music, with major in applied music, composition, or public school music, and to the degree of bachelor of arts in music. Curricula of four years are offered leading to the degree of bachelor of fine arts, with a major in painting and design, interior decoration, public school drawing, or music and drawing. Two-year curricula lead to certificates of proficiency for supervisors of art and music. The department of dramatic art offers major courses in the study of the drama and dramatic interpretation.

Normal Diploma.—Graduates in music may receive in addition to their bachelor of music degree a normal diploma, entitling them to teach music in the public schools, by meeting the requirements of the department of education and such departmental requirements as the department of music may see fit to institute. This will necessitate a total of at least 192 credits.

Certificates of Proficiency for Music Supervisors.—These may be issued by the head of this college to students who may not have completed the requirements for the degree, but who have satisfactorily completed certain stipulated courses at the discretion of the department. These courses include history of music, elementary harmony, public school music, ear training and melody writing, school music and music education, vocal music, education and drawing or some other approved elective. Only students of advanced standing can complete this course in less than two years.

REQUIREMENTS FOR ADMISSION

Full information regarding requirements for admission, registration, and expenses may be found on pages 39-51.

It is advisable that students intending to enter the course in architecture present credits for preparatory work in trigonometry and freehand drawing. Beginning in 1921, two years of a modern foreign language will be included among specific entrance requirements, to be made up in the University without credit, if they have not been taken in high school.

Students intending to enter any of the music courses leading to a degree must satisfy the head of the department that they have completed in addition to the usual high school preparation the equivalent of four years' work in piano, showing that they are familiar with the rudiments and can play well scales and chords in all positions, the smaller sonatas of Haydn, Mozart and Beethoven,

and easier compositions representative of the best literature for the piano.

CURRICULA

FOR THE BACHELOR OF MUSIC DEGREE WITH A MAJOR IN APPLIED MUSIC

(Piano, Violin, Voice, Violoncello, Organ)

FIRST YEAR					
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Music 1 (Apprec.)	2	Music 2	2	Music 3	2
4 (History)	2	5	2	6	2
7 (Sight Singing)	2	8	2	9	2
14 (Ear Training)	2	15	2	16	2
18 (Applied)	3	19	3	20	3
10 (Chorus) elect.	1	11 or elective	1	12 or elective	1
English Comp.	3	English Comp.	3	English Comp.	3
Phys. Ed.	1%	Phys. Ed.	1%	Phys. Ed.	1%
	16%		16%		16%
SECOND YEAR					
Music 10 or elective	1	Music 11 (or elective)	1	Music 12 (or elective)	1
68 (Applied)	3	69 (Applied)	3	70 (applied)	3
51 (Harmony)	3	52	3	53	3
Pol. Sci.	5	Physics 51	5	Physics 52	5
Modern Language	3	Modern Language	3	Modern Language	3
Phys. Ed.	1%	Phys. Ed.	1%	Phys. Ed.	1%
	16%		16%		16%
THIRD YEAR					
Music 10 (or elective)	1	Music 11 (or elective)	1	Music 12 (or elective)	1
118 (Applied)	3	119	3	120	3
101 (Adv. Harmony)	3	102	3	103	3
104 (Adv. History)	2	105	2	106	2
107 (Counterpoint)	2	108	2	109	2
110 (Instr. Form)	2	111	2	112	2
Modern Language	3	Modern Language	3	Modern Language	3
	16		16		16
FOURTH YEAR					
Music 10 (or elective)	1	Music 11 (or elective)	1	Music 12 (or elective)	1
168 (Applied)	3	169	3	170	3
157 (Composition)	2	158	2	159	2
151 (Adv. Appr.)	2	152	2	153	2
Elective	8	Elective	8	Philosophy 129 (Aesth.)	5
	16		16	Senior Program*	2
					15

FOR THE BACHELOR OF MUSIC DEGREE WITH A MAJOR IN COMPOSITION

FIRST YEAR					
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Music 1 (Apprec.)	2	Music 2	2	Music 3	2
4 (History)	2	5	2	6	2
14 (Ear Training)	2	15	2	16	2
51 (Beg. Harm'y)	3	52	3	53	3
31 (Applied)	3	32	3	33	3
English Comp.	3	English Comp.	3	English Comp.	3
Phys. Ed.	1%	Phys. Ed.	1%	Phys. Ed.	1%
	16%		16%		16%

*As a substitute for the senior program, the student may have the option of offering an approved original composition or work in an elective course approved by the advisor and the dean.

SECOND YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Music 10 (Chor.) or elect 1		Music 11 or elective.... 1		Music 12 or elective.... 1	
101 (Adv. Har.)... 3		102 3		103 3	
107 (Counterpoint) 2		108 2		100 2	
Modern Language 3		Modern Language 3		Modern Language 3	
Political Science 5		Physics 51 5		Physics 52 5	
Phys. Ed. 1%		Phys. Ed. 1%		Phys. Ed. 1%	
	15%		15%		15%

THIRD YEAR

Music 10 (Chor.) or elect 3		Music 11 (Chor.) or elect 1		Music 12 (Chor.) or elect 1	
68 (Applied) ... 3		69 3		70 3	
110 (Instr. Form.) 2		111 2		112 2	
157 (Composition) 2		158 2		150 2	
104 (Adv. History) 2		105 2		106 2	
Modern Language 3		Modern Language 3		Modern Language 3	
Elective 2		Electives 2		Electives 2	
	15		15		15

FOURTH YEAR

Music 10 (Chor.) or elect. 1		Music 11 (Chor.) or elect 1		Music 12 (Chor.) or elect 1	
118 (Applied) ... 3		110 3		120 3	
151 (Adv. Appr.) 2		152 2		153 2	
160 (Polyphonic) 2		161 2		162 2	
201 (Adv. Comp.) 2		202 2		203 2	
204 (Orchest.) ... 2		205 2		206 2	
Elective 5		Elective 5		Philosophy 120 (Aesth.) 5	
	17		17		17

FOR THE BACHELOR OF MUSIC DEGREE WITH A MAJOR
IN PUBLIC SCHOOL MUSIC

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Music 1 (Appreciation) 2		Music 2 (Appreciation) 2		Music 3 (Appreciation) 2	
4 (History) ... 2		5 (History) ... 2		6 (History) ... 2	
7 (Sight Singing) 2		8 (Sight Singing) 2		9 (Sight Singing) 2	
10 (Chor.) or elect 1		11 (Chor.) or elect 1		12 (Chor.) or elect 1	
14 (Ear Training) 2		15 (Ear Training) 2		16 (Ear Training) 2	
51 (Applied) ... 3		32 (Applied) ... 3		33 (Applied) ... 3	
English Composition ... 3		English Composition ... 3		English Composition ... 3	
Phys. Ed. 1%		Phys. Ed. 1%		Phys. Ed. 1%	
	16%		16%		16%

SECOND YEAR

Music 51 (Harmony) ... 3		Music 52 (Harmony) ... 3		Music 53 (Harmony) ... 3	
54 (School Music) 2		55 (School Music) 2		56 (School Music) 2	
10 (Chor.) or elect 1		11 (Chor.) or elect 1		12 (Chor.) or elect 1	
Psychology 1 5		Physics 51 5		Physics 52 5	
Modern Language 3		Modern Language 3		Modern Language 3	
Phys. Ed. 1%		Phys. Ed. 1%		Phys. Ed. 1%	
	15%		15%		15%

THIRD YEAR

Music 68 (Applied) ... 3		Music 69 (Applied) ... 3		Music 70 (Applied) ... 3	
101 (Adv. Harm'y) 3		102 (Adv. Harm'y) 3		103 (Adv. Harm'y) 3	
113 (Education) ... 2		114 (Education) ... 2		115 (Education) ... 2	
Modern Language 5		Education 75 (Princp.) 5		Education 85 (Soc. F.) 3	
Political Science 5		Modern Language 3		Modern Language 3	
	18		16	Electives 2	

FOURTH YEAR

Music 107 (Counterpoint) 2		Music 108 (Counterpoint) 2		Music 109 Counterpoint) 2	
110 (Instr. Forms) 2		111 (Instr. Forms) 2		112 (Instr. Forms) 2	
151 (Adv. Apprec.) 2		152 (Adv. Apprec.) 2		153 (Adv. Apprec.) 2	
154 (Ed. & Superv.) 2		155 (Ed. & Superv.) 2		156 (Ed. & Superv.) 2	
Electives 7		Education 165 (Fract.) 5		Philosophy 120 (Aesth.) 5	
	15	Electives 2		Electives 2	

FOR THE DEGREE OF BACHELOR OF ARTS IN MUSIC

FIRST YEAR					
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
*Music, elective	3	*Music, elective	3	*Music, elective	3
English Composition ...	3	English Composition ...	3	English Composition ...	3
Modern Language	5	Modern Language	5	Modern Language	5
Chem., Botany or Zoology	5	Chem., Botany or Zoology	5	Elective	3
Phys. Ed. or Mil. Sci...	1%	Phys. Ed. or Mil. Sci...	1%	Phys. Ed. or Mil. Sci...	1%
	17%		17%		17%
SECOND YEAR					
*Music, elective	5	Music, elective	5	Music, elective	5
Political Science	5	Physics 51-52	5	Physics 51-52	5
Mod. Lang. or elective..	5	Electives	5	Electives	5
Phys. Ed. or Mil. Sci...	1%	Phys. Ed. or Mil. Sci...	1%	Phys. Ed. or Mil. Sci...	1%
	16%		16%		16%
THIRD YEAR					
Music, elective	6	Music, elective	6	Music, elective	6
Psychology	5	Liberal Arts, elective...	10	Philosophy	5
Liberal Arts, elective...	5			Liberal Arts, elective...	5
	16		16		16
FOURTH YEAR					
Music, elective	5	Music, elective	5	Music, elective	5
Liberal Arts, elective...	10	Liberal Arts, elective...	10	Liberal Arts, elective...	10
	15		15		15

A total of forty hours of modern foreign language pursued either in the high school or in the University is required for a degree in the College of Fine Arts. If a student has finished this work in the high school, he shall substitute approved electives in the University. If he presents no foreign language for admission to the University, he must supply the deficiency in addition to the hours demanded by the respective curricula, without credit. If he presents on entrance two years of Latin, he may be excused from ten hours of the modern language requirement at the discretion of the dean.

Students of the public school music course are required to take Education 145 in the senior year. This practice teaching substitutes for the senior thesis.

CURRICULA IN ARCHITECTURE LEADING TO THE DEGREE OF
BACHELOR OF ARCHITECTURE

FIRST YEAR					
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Hist. & Elem. Archt. 1..	2	Hist. & Elem. Archt. 2..	2	Hist. & Elem. Archt. 3..	2
Archt. Drawing 4	3	Archt. Drawing 5	3	Archt. Drawing 6	3
Descr. Geom. 7	2	Shades & Shadows 8...	2	Perspective 9	2
Statics 47	5	Statics 48	5	Modern Language	5
Freehand Draw. 10	1	Freehand Draw. 11....	1	Freehand Draw. 12	1
English 3	3	English 4	3	English 5	3
Phys. Ed. or Mil. Sci...	1%	Phys. Ed. or Mil. Sci...	1%	Phys. Ed. or Mil. Sci...	1%
	17%		17%		17%

* (1) Among the music courses indicated above the following are required: 1, 2, 3, 4, 5, 6, 7, 8, 9, 51, 52, 53, 101, 102, 103.

(2) Liberal Arts electives for junior and senior years must be chosen from courses in the senior college, except with the consent of the dean.

SECOND YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Hist. & Elem. Archt. 51	2	Hist. & Elem. Archt. 52	2	Hist. & Elem. Archt. 53	2
Archt. Design 54	3	Archt. Design 55	3	Archt. Design 56	3
Bldg. Constr. 60	2	Bldg. Constr. 61	2	Bldg. Constr. 62	2
Modeling 72	1	Freehand Draw. 73	1	Freehand Draw. 74	1
Mathematics 57	3	Mathematics 58	3	Mathematics 59	3
Modern Language 1	5	Modern Language 2	5	Modern Language 3	5
Phys. Ed. or Mil. Sci.	1½	Phys. Ed. or Mil. Sci.	1½	Phys. Ed. or Mil. Sci.	1½
	17½		17½		17½

NOTE.—Students electing structural option will, in spring quarter, junior year, omit Arch. 103, 114, and register for Physics 3-5 hours.

THIRD YEAR

Hist. Archt. 101	2	Hist. Archt. 102	2	Hist. Archt. 103	2
Archt. Design 104	5	Archt. Design 105	5	Archt. Design 106	5
Modeling 112	1	Water Color 113	1	Water Color 114	1
Mechanics (C.E.) 131	3	Mechanics (C.E.) 132	3	Rnf. Concrete (C.E.) 133	3
Physics (Gen.) 1	4	Physics (Gen.) 2	5	Acous. & Illum. (Phys. 87)	4
	15		16		15

FOURTH YEAR
(Design Option)

Hist. Archt. 151	2	Hist. Archt. 152	2	Hist. Archt. 153	2
Archt. Design 154	5	Archt. Design 155	5	Archt. Design 156	5
Freehand Draw. 157	3	Freehand Draw. 158	3	Freehand Draw. 159	3
Art. Apprec. 166	1	Art. Apprec. 167	1	Art. Apprec. 168	1
Steam Eng. (M.E.) 82	3	Heat. & Vent. (M.E.) 182	3	Pl. Survey (C.E.) 21	3
Sanitation & Plbg. 115	2	Spec. & Office Prac. (Archt. 117)	2	Wood Anal. (For. 103)	2
	16		15		16

FOURTH YEAR
(Structural Engineering Option)

Frame Struc. (C.E.) 134	3	Bridges (C.E.) 161	5	Pl. Survey (C.E.) 21	3
Steam Eng. (M.E.) 82	3	Alt. Currents (E.E. 121-122)	6	Wood Anal. (For. 103)	2
Dir. Currents (E.E.) 101-102	6	Heat. & Vent. (M.E.) 182	3	Struc. Mat. (C.E.) 167	3
Bus. Law (Law) 54	3	Bus. Law 55	3	Bus. Law 56	3
Sanitation Plbg. (Archt. 115)	2	Spec. Office Prac. (Archt. 117)	2	Elective	5
	17		17		17

FOR THE DEGREE OF BACHELOR OF FINE ARTS WITH A MAJOR IN
PAINTING AND DESIGN

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
P. S. D. (Freehand) 5	3	P. S. D. (Freehand) 6	3	P. S. D. (Freehand) 7	3
*P. S. D. (Art Struc) 9	4	*P. S. D. (Art Struc) 10	4	*P. S. D. (Art Struc) 11	4
Art. Apprec. 16	1	Art. Apprec. 17	1	Art. Apprec. 18	1
English Composition	3	English Composition	3	English Composition	3
Modern Language	5	Electives	5	Electives	5
Phys. Ed. or Mil. Sci.	1½	Phys. Ed. or Mil. Sci.	1½	Phys. Ed. or Mil. Sci.	1½
	17½		17½		17½

SECOND YEAR

P.S.D. (Art Struc.) 53	4	P.S.D. (Art Struc.) 54	4	*P. D. (Art Struc.) 55	4
P.S.D. (Illustration) 56	3	P.S.D. (Illustration) 57	3	P.S.D. (Illustration) 58	3
Greek Art 9	1	Modern Language	5	Modern Language	5
Modern Language	5	Greek Art 10	1	Greek Art 11	1
Elective	3	Elective	3	Elective	3
Phys. Ed. or Mil. Sci.	1½	Phys. Ed. or Mil. Sci.	1½	Phys. Ed. or Mil. Sci.	1½
	17½		17½		17½

*The course in art structure comprises the following: Freshman, principles of design; sophomore, needle designing, woodblock printing, design; junior, pottery, interior decorating, posters; seniors, jewelry, landscape composition, design.

THIRD YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Arch. 1 (Arch. Dr.) ... 3		Arch. 2 (Arch. Dr.) ... 2		Arch. 3 (Arch. Dr.) ... 2	
P.S.D. (Art Struc.) 103 3		P.S.D. (Art Struc.) 104 3		P.S.D. (Portrait) 100... 3	
P.S.D. (Portrait) 107... 3		P.S.D. (Portrait) 108... 3		Roman Art (Lat. 16)... 1	
Roman Art (Lat. 14)... 1		Roman Art (Lat. 15)... 1		Laboratory Science ... 5	
Political Science 5		Laboratory Science ... 5		Elective 4	
	15	Elective 2	16		15
FOURTH YEAR					
P.S.D. (Art Struc.) 157 3		P.S.D. (Art Struc.) 158 3		P.S.D. (Art Struc.) 150 3	
P.S.D. (Life 160 or		P.S.D. (Life 161, or		P.S.D. (Life 162, or	
Mural Dec. 163)... 3		Mural Dec. 165)... 3		Mural Dec. 165)... 3	
Elective 9	15	Elective 9	15	Elective 9	15

FOR THE DEGREE OF BACHELOR OF FINE ARTS WITH A MAJOR IN
PUBLIC SCHOOL DRAWING

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
P.S.D. (Freehand		P.S.D. (Freehand		P.S.D. (Freehand	
Draw.) 5 3		Draw.) 6 6		Draw.) 7 3	
P.S.D. (Art Struc.) 9... 4		P.S.D. (Art Struc.) 9... 4		P.S.D. (Art Struc.) 11... 4	
Art Appreciation 10... 1		P.S.D. (Illustration) 57. 3		Art Appreciation 18... 1	
English Composition ... 3		English Composition ... 3		English Composition ... 3	
Modern Language 5		Modern Language 5		Modern Language 5	
Phys. Ed. or Mil. Sci... 1%		Phys. Ed. or Mil. Sci... 1%		Phys. Ed. or Mil. Sci... 1%	
	17%		17%		17%

SECOND YEAR

P.S.D. (Art Struc.) 53. 4		P.S.D. (Art Struc.) 54... 4		P.S.D. (Art Struc.) 55... 4	
P.S.D. (Illustration) 56 3		P.D. (Illustration) 57 . 3		P.S.D. (Illustration) 58. 3	
Political Science 5		Elective 6		Psychology 5	
Modern Language 3		Phys. Ed. or Mil. Sci... 1%		Modern Language 3	
Phys. Ed. or Mil. Sci... 1%				Phys. Ed. or Mil. Sci... 1%	
	16%		14%		16%

THIRD YEAR

P.S.D. (Art Struc.) 103 3		P. S. D. (Art Struc.) 104 3		P.S.D. (Art Struc.) 105 3	
P.S.D. (Illustration) 107 3		P. S. D. (Illustration) 108 3		P.S.D. (Illustration) 109 3	
Greek Art 8 1		Greek Art 9 1		Greek Art 10 1	
Education 5		Education 3		Education 3	
Elective 3		Laboratory Science ... 5		Laboratory Science ... 5	
	15		15		15

FOURTH YEAR

P.S.D. (Art Struc.) 157 3		P.S.D. (Art Struc.) 158 3		P.S.D. (Art Struc.) 150 3	
*Education 5		Education 3		Philosophy 5	
P.D. (Methods) 153 ... 3		Elective 9		P.D. (Art. Struc.) 11 . 3	
Elective 4				Elective 4	
	18		15		15

FOR THE DEGREE OF BACHELOR OF FINE ARTS WITH A MAJOR IN
INTERIOR DECORATION

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
P. S. D. (Freehand) 5 . 3		P. S. D. (Freehand) 6. 3		P. S. D. (Freehand) 7.. 3	
P. S. D. (Art Struc.) 9. 4		P. S. D. (Art Struc.) 10 4		P. S. D. (Art Struc.) 11. 4	
P. S. D. (Art App.) 16. 1		P. S. D. (Art App.) 17. 1		P. S. D. (Art App.) 18. 1	
English Composition ... 3		English Composition ... 3		English Composition ... 3	
Modern Language 5		Modern Language 5		Modern Language 5	
Phys. Ed. or Mil. Sci... 1%		Phys. Ed. or Mil. Sci... 1%		Phys. Ed. or Mil. Sci... 1%	
	17%		17%		17%

*Among the courses in Education, Practice Teaching must be included in the senior year.

SECOND YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
P.S.D. (Hahld. Des.) 59. 3		P.S.D. (Hahld. Des.) 60 3		P.S.D. (Hahld. Des.) 61 3	
Arch. (History) 1 3		Arch. (History) 2 3		Arch. (History) 3 2	
Arch. (Dimension Dr.) 13 2		Arch. (Dimension Dr.) 14 2		Arch. (Dimension Dr.) 15 2	
Modern Language 5		Electives 7		Home Ec. (Textiles) 25. 5	
Electives 2		Phys. Ed. or Mil. Sci... 1%		Electives 3	
Phys. Ed. or Mil. Sci... 1%				Phys. Ed. or Mil. Sci... 1%	
	16%		16%		16%

THIRD YEAR

P. S. D. (Interior Decoration) 110 3		P. S. D. (Interior Decoration) 111 3		P. S. D. (Interior Decoration) 112 3	
P. S. D. (Furn. Design) 113 2		P. S. D. (Furn. Design) 114 2		P. S. D. (Furn. Design) 115 2	
Political Science 5		Laboratory Science 5		Laboratory Science 5	
Electives 5		Electives 5		Electives 5	
	15		15		15

FOURTH YEAR

P. S. D. (Int'or Decoration) 172 5		P. S. D. (Int'or Decoration) 173 5		P. S. D. (Int'or Decoration) 174 5	
Greek Art 8 or Roman Art 1		Greek Art 9 or Roman Art 1		Greek Art 10 or Roman Art 1	
Fine or Lib. A. Elec... 6		Fine or Lib. A. Elec... 9		Fine or Lib. A. Elec... 9	
H. E. House Furn. 143. 3					
	15		15		15

FOR THE DEGREE OF BACHELOR OF FINE ARTS WITH A MAJOR IN
MUSIC AND DRAWING

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Music 4 (Hist. of Music) 2		Music 5 (Hist. of Music) 2		Music 6 (Hist. of Music) 2	
Music 7 (Sight Singing) 2		Music 8 (Sight Singing) 2		Music 9 (Sight Singing) 2	
P.S.D. 5 (Drawing) 4		P.S.D. 5 (Drawing) 4		P.S.D. 7 (Drawing) 4	
Modern Language 5		Modern Language 5		Modern Language 5	
English Composition 3		English Composition 3		English Composition 3	
Phys. Ed. or Mil. Sci... 1%		Phys. Ed. or Mil. Sci... 1%		Phys. Ed. or Mil. Sci... 1%	
	17%		17%		17%

SECOND YEAR

Music 14 (ear tr. or elec.) 2		Music 15 (ear tr. or elec.) 2		Music 16 (ear tr. or elec.) 2	
Music 54 (School Music) 2		Music 55 (School Music) 2		Music 56 (School Music) 2	
Modern Language 5		Laboratory Science 5		Psychology 5	
Political Science 5		P.S.D. 10 Art Struc.) 3		Laboratory Science 5	
P.S.D. 9 (Art Struc.) 3		Elective 5		P.S.D. 11 (Art Struc.) 3	
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%	
	18%		18%		18%

THIRD YEAR

Music 31 (Ap. Music) .. 1		Music 32 (Ap. Music) .. 1		Music 33 (Ap. Music) .. 1	
Music 51 (Harmony) ... 3		Music 52 (Harmony) ... 3		Music 53 (Harmony) ... 3	
Music 113 (Music Ed.) .. 2		Music 144 (Music Ed.) .. 2		Music 115 (Music Ed.) .. 2	
P.S.D. 53 (Art Struc.) 3		P.S.D. 54 (Art Struc.) 3		P.S.D. 55 (Art Struc.) 3	
P.S.D. 16 (Art Apprec.) 1		P.S.D. 17 (Art Apprec.) 1		P.S.D. 18 (Art Apprec.) 1	
P.S.D. 103 (Pottery) ... 3		P.S.D. 104 (Pottery) ... 3		Education 3	
Education 5		Elective 2		Elective 5	
	18		18		18

FOURTH YEAR

Music 68 (Ap. Music) .. 2		Music 69 (Ap. Music) .. 2		Music 70 (Ap. Music) .. 2	
Music 151 (Music Apprec.) 2		Music 152 (Music Apprec.) 2		Music 153 (Music Apprec.) 2	
Music 154 (Music Super.) 2		Music 155-6 (Music Super.) 2		Music 154 (Music Super.) 2	
P.S.D. 153 (Pub. School Drawing Methods) 3		P.S.D. 57 (Illus. & Life) 3		P.S.D. 101 (Pub. School Drawing Methods) 3	
P.S.D. 56 (Illus. & Life) 3		Education 3		P.S.D. 58 (Illus. & Life) 3	
*Education 5		Elective 3		Elective 3	
	17		15		15

CURRICULUM IN ART LEADING TO CERTIFICATES OF PROFICIENCY FOR SUPERVISORS OF ART

FIRST YEAR					
<i>Autumn Quarter</i> - <i>Credits</i>		<i>Winter Quarter</i> <i>Credits</i>		<i>Spring Quarter</i> <i>Credits</i>	
P.S.D. (Art Struc.) 9...	4	P.S.D. (Art Struc.) 10...	4	P.S.D. (Art Struc.) 11...	4
P.S.D. (Freehand) 5...	3	P.S.D. (Freehand) 6...	3	P.S.D. (Freehand Cast) 7	3
English Composition ...	3	English Composition ...	3	English Composition ...	3
Art Appreciation 16 ...	1	Art Appreciation 17...	1	Art Appreciation 18 ...	1
Elective	5	Elective	5	Elective	5
<hr/>		<hr/>		<hr/>	
16		16		16	
SECOND YEAR					
P.S.D. (Art Struc.) 53...	4	P.S.D. (Art Struc.) 54...	4	P.S.D. (Art Struc.) 55...	4
P.S.D. (Freehand) 56...	3	P.S.D. (Freehand) 57...	3	P.S.D. (Freehand) 58...	3
Psychology	5	Education	5	Education	5
Methods of Teaching Art	3	Elective	3	Public School Draw. 101	3
				Elective	1
<hr/>		<hr/>		<hr/>	
15		15		16	

CURRICULUM LEADING TO THE DEGREE OF BACHELOR OF ARTS IN DRAMATIC ART

FIRST YEAR		
Dramatic Art, elective . 3	Dramatic Art, elective . 3	Dramatic Art, elective . 3
English Composition ... 3	English Composition ... 3	English Composition ... 3
Modern Language 5	Modern Language 5	Modern Language 5
Chem., Botany or Zool... 5	Chem., Botany or Zool... 5	Elective 5
Phys. Ed. or Mil. Sci... 1½	Phys. Ed. or Mil. Sci... 1½	Phys. Ed. or Mil. Sci... 1½
17½	17½	17½
SECOND YEAR		
Dramatic Art, elective . 5	Dramatic Art, elective . 5	Dramatic Art, elective . 5
Arch. (Hist.) 1 2	P.S.D. (Textile) 170... 2	P.S.D. (Textile) 171... 2
P. S. D. (Textile) 169... 2	Arch. (Hist.) 2 2	Arch. (Hist.) 3 2
Modern Language 5	Elective 5	Political Science 5
Elective 2	Mil. Sci. or Phys. Ed... 1½	Mil. Sci. or Phys. Ed... 1½
Mil. Sci. or Phys. Ed... 1½	15½	15½
17½		
THIRD YEAR		
Dramatic Art, elective . 6	Dramatic Art, elective . 6	Dramatic Art, elective . 6
Psychology 5	Liberal Arts, elective ..10	Liberal Arts, elective ..10
Liberal Arts, elective.. 5		
16	16	16
FOURTH YEAR		
Dramatic Art, elective.. 5	Dramatic Art, elective.. 5	Dramatic Art, elective.. 5
Liberal Arts, elective ..10	Liberal Arts, elective ..10	Liberal Arts, elective ..10
15	15	15

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index.)

*Among the courses in Education, Practice Teaching must be included in the senior year.

COLLEGE OF FISHERIES

THE FACULTY

- HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.
JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.
JOHN N. COBB, Professor of Fisheries, DIRECTOR.
_____, Professor of Fish Culture.
CLARENCE L. ANDERSON, B. S. (Washington), Instructor in Fisheries.
EDMOND STEPHEN MEANT, M. L. (Wisconsin), Professor of History.
TREVOR KINCAID, A. M. (Washington), Professor of Zoology.
FREDERICK MORGAN PADELFORD, PH. D. (Yale), Professor of English and Dean of the Graduate School.
FREDERICK ARTHUR OSBORN, PH. D. (Michigan), Professor of Physics and Director of the Physics Laboratories.
CHARLES WILLIS JOHNSON, PH. C., PH. D. (Michigan), Professor of Pharmaceutical Chemistry, and State Chemist.
THEODORE CHRISTIAN FRYE, PH. D. (Chicago), Professor of Botany.
ROBERT EDOUARD MORITZ, PH. D. (Nebraska), PH. N.D. (Strassburg), Professor of Mathematics.
HARVEY LANTZ, A. M. (De Pauw), LL. B. (Kent), Professor of Law.
EVERETT OWEN EASTWOOD, C. E., A. M. (Virginia), S. B. (Massachusetts Institute of Technology), Professor of Mechanical Engineering.
HENRY KREITZER BENSON, PH. D. (Columbia), Professor of Chemical Engineering.
JOHN WEINZIERL, PH. D. (Wisconsin), DR. P. H. (Harvard), Professor of Bacteriology.
STEPHENSON SMITH, PH. D. (Pennsylvania), Professor of Psychology.
LESLIE JAMES AYER, J. D. (Chicago), Professor of Law.
STEPHEN IVAN MILLER, A. B. (Stanford), LL. B. (Michigan), Professor of Economics and Dean of the College of Business Administration.
GEORGE MOPHAIL SMITH, PH. D. (Freiburg), Professor of Inorganic Chemistry.
WILLIAM MAURICE DEHN, PH. D. (Illinois), Professor of Organic Chemistry.
ARTHUR WILSON LINTON, M. S. (Washington), Associate Professor of Pharmacy.
GEORGE BURTON RIGG, PH. D. (Chicago), Associate Professor of Botany.
WILLIAM DANIEL MORLAERTY, PH. D. (Michigan), Associate Professor of Business Administration.
GEORGE SAMUEL WILSON, B. S. (Nebraska), Associate Professor of Mechanical Engineering.
JOHN LOCKE WORCESTER, M. D. (Medical School, University of Alabama), Associate Professor of Anatomy.
WILLIAM EDWARD COX, A. M. (Texas), Associate Professor of Business Administration.
EDWIN JAMES SAUNDERS, A. M. (Harvard), Assistant Professor of Geology.
ELI VICTOR SMITH, PH. D. (Northwestern), Assistant Professor of Zoology.
FRED HARVEY HEATH, PH. D. (Yale), Assistant Professor of Chemistry.
HERMAN VANCE TANTAR, B. S. (Oregon Agricultural College), Assistant Professor of Chemistry.
HORACE GUNTHERP, A. M. (Kansas), Assistant Professor of Zoology.
THOMAS G. THOMPSON, PH. D. (Washington), Assistant Professor of Chemistry.
ARTHUR WILLIS BARTON, PH. D. (Northwestern), Instructor in Chemistry.
JEAN ROBIN WILKES, PH. C., B. S. (Washington), Assistant State Chemist and Bacteriologist.

ADVISORY BOARD

- E. A. SIMS, Chairman, State Fisheries Board, Port Townsend.
L. H. DARWIN, State Supervisor of Fisheries, Seattle.
HENRY O'MALLEY, Pacific Coast Agent United States Bureau of Fisheries, Seattle.
MILLER FREEMAN, Publisher *Pacific Fisherman*, Seattle.
P. E. HARRIS, P. E. Harris & Company, Seattle.
W.M. J. CALVERT, JR., San Juan Fishing & Packing Company, Seattle.
EDWARD CUNNINGHAM, Pacific Net & Twine Company, Seattle.
E. B. DEMING, Pacific American Fisheries, South Bellingham.
G. P. HALFERTY, Pioneer Packing Company, Aberdeen.
HENRY S. MCGOWAN, P. J. McGowan & Sons, McGowan.
W. A. LOWMAN, Coast Fish Company, Anacortes.

PURPOSE AND LOCATION

The College of Fisheries was established in 1919. It has a two-fold purpose: First, to afford instruction in the principles and practices of fishery; second, to promote the interest of fisheries in the state of Washington and in the United States by encouraging the right use of fishery resources.

The college has exceptional advantages in its location. The university campus is located on the shores of Lakes Washington and Union, which bodies of water are connected by canals with each other and with Puget Sound. In the latter are carried on extensive commercial fisheries for fishes, oysters, clams, crabs, etc., while fleets of vessels with headquarters at Seattle and other cities on the Sound, carry on extensive fisheries in the ocean adjacent to the Washington coast, and on the fishing banks along the Alaska coast. Numerous canneries, smokehouses, cold storage plants, fertilizer plants, etc., are to be found in Seattle and other places on the Sound. A number of fish hatcheries are owned and operated in the state of Washington by the federal, state and county governments. At Friday Harbor the University owns and operates an excellent marine biological station. These many advantages present unrivaled opportunities for the studying of the fisheries, aquatic life and fish culture.

REQUIREMENTS FOR ADMISSION

Full information regarding requirements for admission, registration, and expenses may be found on pages 39-51.

Degrees.—The four-year curricula in the College of Fisheries lead to the degree of bachelor of science (B. S.) in fisheries.

The degree of master of science (M. S.) in fisheries will be conferred upon any graduate of the four-year curricula who has completed at least one year of graduate work and has presented a satisfactory thesis with the grade of A, B, or C. A graduate of any other institution of equal rank will be given full graduate standing, but the candidate must have a satisfactory knowledge of zoology, chemistry, bacteriology and botany. The selection of work for this degree must, in each case, be approved by the director of the College.

Advanced Standing.—Credit will be given for subjects pursued at other colleges of recognized rank upon presentation to the registrar of certificates that such subjects have been satisfactorily completed. Graduates of this institution and others of similar rank are admitted to graduate standing.

FACILITIES FOR STUDY

Shellfish Culture.—On Puget Sound and in Hood Canal are located numerous private oyster beds where cultivation has been practiced for some years. The state also owns certain oyster re-

serves which will be utilized for experimental purposes. These are all within reasonable distance of Seattle and are available for study purposes by the students of the college.

Fishery Operations.—Trap netting, purse and haul seining, gill netting, trolling, hand and long-line fishing, oyster gathering, clam digging, kelp harvesting, and other forms of commercial fishing, are carried on either in the harbor of Seattle, or waters adjacent, during the proper seasons, and can be observed and studied on the ground.

Commercial Plants.—In or near Seattle and available for study are plants for the canning of salmon, pilchards, clams, etc.; the mildcuring of salmon; the pickling of salmon, herring, sablefish, etc.; the freezing and cold storage of salmon, halibut, sablefish, herring, steelhead trout, and smelt; the smoking of salmon, sablefish, herring, sturgeon, etc.; the extraction of oils from fishery products and the preparation of fish meal and fertilizer from the residue; and the extraction of chemical products from kelp and other aquatic plants. Two large can-making establishments, several plants manufacturing canning machinery, and a number of others supplying various machines and supplies for the fisheries, are also located in Seattle. Such of these industries as are not in Seattle are conveniently situated on Puget Sound, and the transportation costs to them would be very low.

Aquarium.—In the Fisheries building of the State Fisheries Board, at Fourth avenue and Seneca street, Seattle, a working aquarium is available for study purposes.

Field Excursions.—Much of the instruction in fish culture and fisheries technology is given in the field, necessitating frequent excursions to nearby hatcheries, fishing camps, oyster beds, and industrial plants. The expenses of these excursions will be comparatively small.

Summer Work.—Students of fisheries are urged to spend their summer vacation in some line of practical work connected with the fishery industry. As the college is convenient to the more important fisheries and hatcheries of the Northwest coast, ample opportunity is afforded for summer employment. Students not only acquire valuable experience in this way, but earn a considerable portion of their university expenses.

Fishery Club.—The Fishery Club is an organization open to all students of the College of Fisheries. It aims: (1) To secure full acquaintance and good fellowship among students and instructors; (2) to keep in touch with everyday problems in fisheries, and the men who are doing things worth while in this industry, and (3) to interest the public in the College of Fisheries and in the fishery problems of the state and nation.

Short Courses for Fishermen and Fish Culturists.—These courses will be given during each winter quarter, providing there are a sufficient number of applicants. Applicants must be at least twenty years old and show ability to carry the work with profit to themselves. Admission to courses is without examination. Examinations will be given in the various subjects at the close of the course and a certificate showing the work satisfactorily covered issued to each student.

OUTLINE FOR CURRICULA

Choice of Electives.—In the election of studies, students should follow the sequence of subjects as outlined in the curriculum. Deviations from the prescribed order will not be allowed by class advisors unless such deviation is imperative.

For specialization in fisheries administration, the following electives are recommended: Fisheries 4, 5; business law (B.A. 54, 55); money and banking, (B.A. 57); economics of markets (B.A. 106); business organization (B.A. 105); plant management (B.A. 167); advertising (B.A. 137); accounting (two quarters, B.A. 11-12); admiralty law (Law 165); psychology 1 and 121; modern language (Spanish or German preferred); business statistics (B.A. 118).

For specialization in fisheries technology and fish culture: Fisheries 4, 5; engineering drawing (C.E. 1, 2); mechanical engineering 82, 198; chemistry and food analysis 105-106-107; industrial chemistry 123; physiological chemistry 144; chemistry of nutrition 193; refrigeration (M.E. 183); economic marine botany 130; public hygiene (Bacteriology 103); modern language (Spanish or German preferred); trigonometry (Mathematics 4); elements of statistical methods (Mathematics 13); business statistics (B.A. 118); oceanography (Geology 114); aquatic botany; parasitology (Zoology 107).

I. FISH CULTURE

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Zoology 1	5	Zoology 2	5	Zoology 5	5
Fisheries 1	2	Fisheries 2	2	Chemistry 23	5
Chemistry 1 or 21	5	Chemistry 2 or 22	5	Economics 2	3
English 4	3	English 5	3	Fisheries 6	2
Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½

SECOND YEAR

Fisheries 3	5	*Physics 48	5	Zoology 108	5
*Physics 47	5	Electives	10	Electives	10
Electives	5	Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½
Mil. Sci. or Phys. Ed....	1½				

THIRD YEAR

Bacteriology 101	5	Fisheries 102	5	Fisheries 103	5
Electives	5	Bacteriology 102	5	Fisheries 105	5
Fisheries 101	5	Fisheries 104	5	Electives	7
		Electives	2		

*If the student has taken one year of physics in high school he will substitute electives for Physics 47 and 48.

FOURTH YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Fisheries 150	5	Fisheries 151	5	Fisheries 152	5
Fisheries 117	5	Electives	10	Electives	10
Electives	5				

II. FISHERIES TECHNOLOGY

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Zoology 1	5	Zoology 2	5	Economics 2	3
Fisheries 1	2	Fisheries 2	2	Chemistry 23	5
Chemistry 1 or 21	5	Chemistry 2 or 22	5	Fisheries 6	2
English 4	3	English 5	3	Electives	5
Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½

SECOND YEAR

Chemistry 128	5	Chemistry 129	5	Chemistry 111	5
Fisheries 8	5	*Physics 48	5	Electives	10
*Physics 47	5	Electives	5	Mil. Sci. or Phys. Ed....	1½
Mil. Sci. or Phys. Ed....	1½	Mil. Sci. or Phys. Ed....	1½		

THIRD YEAR

Bacteriology 101	5	Bacteriology 102	5	Fisheries 107	5
Fisheries 106	5	Fisheries 104	5	Fisheries 105	5
Electives	5	Pharmacy 16	1	Fisheries 115	3
		Electives	5	Electives	3

FOURTH YEAR

Fisheries 155	5	Fisheries 156	5	Fisheries 157	5
Electives	10	Electives	10	Electives	10

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index).

COLLEGE OF FORESTRY

THE FACULTY

HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.

JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.

HUGO WINKENWERDER, M. F. (Yale), Professor of Forestry; DEAN.

BURT PERSONS KIRKLAND, A. B. (Cornell), Professor of Forestry.

ELIAS TREAT CLARK, M. F. (Yale), Associate Professor of Forestry.

BROR LEONARD GRONDAL, M. S. F. (Washington), Assistant Professor of Forestry.

CONRAD W. ZIMMERMAN, A. B. (Washington), Lecturer in Timber Physics.

TREVOR KINCAID, A. M. (Washington), Professor of Zoology.

HENRY KREITZER BENSON, PH. D. (Columbia), Professor of Chemical Engineering.

GEORGE SAMUEL WILSON, B. S. (Nebraska), Associate Professor of Mechanical Engineering.

GEORGE IRVING GAVETT, B. S. (C. E.) (Michigan), Assistant Professor of Mathematics.

JOHN WILLIAM HOTSON, PH. D. (Harvard), Assistant Professor of Botany.

DAVID CONNOLLY HALL, M. D. (Chicago), University Health Officer; Professor of Hygiene.

CLINTON LOUIS UTTERBACK, M. S. (Washington), Instructor in Physics.

FRANK DEMETRIUS HAYDEN, B. S. (Massachusetts Institute of Technology), Assistant Professor of Civil Engineering.

ADVISORY BOARD

R. W. VINNEDGE, North Bend Lumber Co., Edgewick, Chairman.

ROBERT B. ALLEN, Secretary-Manager West Coast Lumbermen's Association, Seattle.

THORPE BABCOCK, North West Lumber Co., Hoquiam.

W. E. CROSBY, Editor *West Coast Lumberman*, Seattle.

H. A. HUEDNER, Cascade Lumber Co., Yakima.

HOWARD JAYNE, Willapa Lumber Co., Portland, Ore.

HON. MARK REED, Simpson Logging Co., Shelton.

W. G. WEIGLE, Supervisor Snoqualmie National Forest, Seattle.

PURPOSE AND LOCATION

The College of Forestry was established in 1907. It has exceptional advantages in its location. The University campus comprises 530 acres, 40 of which are in timber, and offer splendid opportunities for field work in silviculture and forest measurements. Other excellent forests are within walking distance of the campus. The University also owns large forest tracts in various parts of the state, where students may conduct extensive research work. The immense national forests within a few hours' ride of Seattle afford practical object lessons in the art of forest management. The

city of Seattle is in the center of the timber industry of Washington and the Northwest. In its many sawmills and wood-working industries, the student has unrivaled opportunities for studying wood utilization.

Short Courses for Forest Rangers and Lumbermen—Applicants must be at least twenty years old and show ability to carry the work with profit to themselves. Admission to classes is without examination.

Field Observations.—Much of the instruction in technical forestry is given in the field, necessitating frequent excursions in nearby forests, logging camps and sawmills. The expenses of these excursions never exceed \$10 for the freshman year, \$15 for the sophomore year, \$20 for the junior year, \$50 for the senior year, and usually are much less.

SUMMER WORK

Students of forestry are urged to spend their summer vacation in some line of practical work connected with the forest industry. Situated as the school is in the heart of a great lumbering section and near extensive national forests, ample opportunity is offered for summer employment. Students not only acquire valuable experience in this way, but earn a considerable portion of their university expenses.

FOREST CLUB

The Forest Club is an organization open to all students of the College of Forestry. It aims: To secure acquaintance and good fellowship among students and instructors; to keep in touch with everyday problems in forestry and lumbering, and the men who are doing things worth while in these industries; to interest the public in the college and in the forestry and lumbering problems of the state.

Officers of the club for the year 1920-21 are: President, Seldon Andrews; vice-president, Russell Mills; secretary-treasurer, Elwood Hogan.

The club issues every May "The Forest Club Annual," a publication which contains articles and illustrations descriptive of the school, of scientific interest, and a complete roster of students, ex-students, and alumni. A special College of Forestry page is also published each month in the *West Coast Lumberman*.

REQUIREMENTS FOR ADMISSION AND GRADUATION

Admission.—Full information regarding requirements for admission may be found on pages 39-51.

Courses and Degrees.—Beginning with September, 1914, the College of Forestry abandoned its fixed four-year groups of study and has since then offered only one five-year course with a liberal allowance for electives. As technical forestry has reached a stage where some specialization is almost necessary, this arrangement gives the student ample opportunity for specialization along four distinct lines: (1) Forest service and state work, (2) logging engineering, (3) forest products and (4) the lumber business. *The course may, however, be pursued for only four years, and on the completion of four years of work the student will be awarded the degree of bachelor of science in forestry.* It should be emphasized that this arrangement will allow the student to receive practically as broad a training in four years as heretofore, but that if he desires to specialize he should pursue the work for five years.

Undergraduate Work.—For the degree of bachelor of science in forestry (B.S.F.) the student shall have completed in addition to the required subjects outlined in the curriculum, at least 46 credits in subjects selected from forestry, lumbering, engineering, or the botanical, chemical, zoological, geological or economic sciences, the subjects to be approved by the student's class advisor, but in no case shall more than 23 in any department other than forestry be allowed toward graduation. The total number of credits required for graduation shall be 180 exclusive of shop and military science. Candidates for the degree must furthermore receive grades of A, B, or C in at least three-fourths of the credits required for the degree.

Graduate Work.—For the degree of master of science in forestry (M. S. F.), the student in addition to being a graduate of this University or other institution of equal rank, and having a satisfactory knowledge of botany, geology, physics, chemistry, mathematics, and surveying, shall have been credited at this University with 225 credits, of which at least 78 are in technical forestry subjects, including silviculture, dendrology, wood technology, mensuration, management, lumbering, wood preservation, forest economics, and thesis. Only grades of A, B, and C can be counted toward a graduate degree.

SPECIAL OPPORTUNITIES FOR ADVANCED WORK

Attention is called to the equipment and to the special advanced courses for graduate students. The physical equipment of the College of Forestry and the exceptional advantages of its location should prove particularly attractive to graduate students. The advanced courses include dendrology, silviculture, management, wood technology, timber physics, wood preservation, advanced forest products, the business of lumbering, and research. Special facilities and apparatus are provided for this advanced work. Emphasis is placed upon the fact that a graduate from a college of forestry

of equal rank with the College of Forestry of this University may complete the requirements for the advanced degree in one year. Graduates from other institutions of equal rank, but giving no courses in technical forestry, may complete the required work in two years, providing they have training in the fundamental sciences.

OUTLINE FOR CURRICULA

Choice of Electives.—In the election of studies, students should follow the sequence of subjects as outlined in the curriculum. Deviations from the prescribed order will not be allowed by class advisers unless such deviation is imperative.

The curriculum of the College is practically identical for all students during the first two years, but provides for specialization in the upper division courses in (1) Forest Management, (2) Logging Engineering, (3) Forest Products, and (4) Milling and Marketing or the Business of Lumbering. Students should decide by the end of their sophomore year in which field they desire to specialize. The student should be especially careful to register for the electives required for his advanced specialized courses as no student will be admitted to the advanced subjects who has not had the necessary prerequisites. These are definitely stated in connection with the course descriptions.

LOWER DIVISION

It will be the aim to prepare students who cannot go farther than the end of the Lower Division for forest ranger service, and as assistants to logging engineers. Upon approval of the dean they will be allowed to substitute certain of the subjects of the junior year for some of the required freshman and sophomore work.

FIRST YEAR

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
For. 1 (Dend.).....	5	Bot. 11	5	Bot. 12	5
For. 2 (Gen. For.).....	3	For. 3	3	Math. 56	3
Math. 54 (Foresters)...	3	Math. 55	3	For. 4 (Protection)...	3
English	3	C. E. 1	3	C. E. 56	5
For. 5 (Woodcraft).....	2	C. E. 55	2		
Phys. Ed. or Mil. Sci....	1½	Phys. Ed. or Mil. Sci....	1½	Phys. Ed. or Mil. Sci....	1½
Shop		Shop		Shop	

SECOND YEAR

For. 53 (Const.).....	3	Chem. 2	5	For. 52 (Mensurat.)....	5
For. 57 (Silvics).....	3	For. 51 (Mensurat.)...	5	For. 58 (Silvicult.)....	5
Chem. 1	5	English	3	Geol. 5 (Forestry)....	5
Econ. 1 (Gen.)	5	Elective	2		
Phys. Ed. or Mil. Sci....	1½	Phys. Ed. or Mil. Sci....	1½	Phys. Ed. or Mil. Sci....	1½

UPPER DIVISION

Beginning with the Upper Division, the student should carefully consider the electives with reference to the specialty he intends to make his life work.

THIRD YEAR

For. 101 (Technol.)....	5	For. 158 (Util.)	5	For. 105 (Preserva.)....	5
Physics 92 (For.)	5	Physics 93	5	Elective	5
M.E. 82 (Steam Eng.)... 3				For. 104 (Tim. Tests)..	5
Recreation		Recreation			

Suggested Electives

Chem. 101	5	Chem. 111 (Organic)...	5	Bot. 111 (Pathology)...	5
B.A. 11 (Accounting)...	5	B.A. 12 (Accounting)...	5	B.A. 56 (Bus. Law)....	3
C.E. 22 (Log. R.R.)....	5	B.A. 55 (Bus. Law)....	3		
B.A. 106 (Markets)....	5	B.A. 138 (Salesmanship)	5		
B.A. 54 (Bus. Law)....	3	M.E. 83	3		

FOURTH YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
For. 151 (Management) 5		For. 126 (Econ.) 5		All elective.	
For. 153 (Gen. Lumber) 5		For. 152 (Management) 5		Recreation	
Recreation		Recreation			

Suggested Electives

For. 185 (Log. Eng.)... 4	For. 186 (Log. Eng.)... 4	For. 187 (Log. Eng.)...16
For. 183 (Milling)..... 5	For. 184 (Marketing)... 3	For. 188 (Adv. Prod.).. 5
	For. 119 (Admin.) 3	

GRADUATE

The following subjects are primarily for graduate students. Seniors will be allowed to elect them only upon recommendation of the dean and the instructor concerned. With the exception of the thesis none of the subjects is, strictly speaking, required, but the student will elect all those belonging to one specialty as determined upon consultation with his class adviser. A sufficient number will have to be taken to fulfill the requirements for the master's degree.

For. 202 (Thesis)..... 3	For. 202 (Thesis)..... 3	For. 202 (Thesis)..... 3
For. 201 (For. Geog.)... 3	For. 200 (Seminar).... 2	For. 223 (Adv. Manage.) 8
For. 208 (Seminar).... 2	Elective10	For. 224 (Adv. Milling
For. 221 (History)..... 2		and Marketing) 5

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index).

SCHOOL OF LAW

THE FACULTY

HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.

JOHN THOMAS CONDON, LL. M. (Northwestern), Professor of Law, DEAN.

HARVEY LANTZ, A. M. (De Pauw), LL. B. (Kent), Professor of Law.

IVAN WILBUR GOODNER, LL. B. (Nebraska), Professor of Law.

CLARK PRESCOTT BISSETT, A. B. (Hobart), Professor of Law.

LESLIE JAMES ATER, B. S., J. D. (Chicago), Professor of Law.

JOSEPH GRATTAN O'BRYAN, A. B. (Jesuit College), Lecturer on Law.

ORGANIZATION AND EQUIPMENT

General Statement.—The Law School of the University of Washington was established in 1899. The case system is generally used and is designed to give an effective knowledge of legal principles and to develop the power of independent legal reasoning. A thorough legal training is offered to students of maturity and with previous preliminary education, and the courses offered are adapted to train and fit the student for practice in any state or jurisdiction. Special attention and emphasis is given to the law of the state of Washington, and in the illustrations and development of legal principles, cases and statutes are largely cited from the state of Washington and other Northwestern and Pacific states. The Law School is a member of the Association of American Law Schools.

The Law Building.—The Law School occupies the entire upper floor of Commerce Hall. This building, which is one of the largest of the University buildings and is in the center of the campus, in the Liberal Arts Quadrangle, represents the best in modern construction and equipment. The law library occupies the entire end, and an idea of its roominess may be gained from its dimensions, which are, exclusive of stacks, forty by seventy feet. In addition to this general reading room, there is a large consultation room, twenty-five feet square, adjoining. There are three large lecture or recitation rooms, and a large room fitted and used exclusively for the trial court. These are all readily accessible to each other, and every convenience and improvement tending to add to the efficiency of the student, from an equipment standpoint, is present.

The Libraries.—The University Law Library consists of about 25,000 volumes. It contains the reports of all the courts of last resort, the reported lower courts of several states and the English

courts. The latest revisions of all the state statutes and a large collection of the session laws of the various states, including a complete set of each of the Pacific Coast states, are important features.

The library is catalogued and indexed by the Library of Congress cards.

The University General Library contains 96,644 volumes and is especially strong in reference works.

The Public Library of the city of Seattle is open to the free use of our students and is within easy distance of the campus by street car.

GENERAL INFORMATION

The four quarter system is adopted in the Law School. Each quarter is approximately for twelve weeks, and credit for work is usually on the basis of one credit representing a recitation or lecture course one hour per week for one quarter. In adopting this system the total hour values of courses prevailing in the schools of the Association of American Law Schools have been generally retained—e. g., courses formerly given two hours per week per semester are under the quarter system given three hours per week per quarter. This makes possible a better sequence of courses in the first year and permits students to enter at the opening of any quarter. However, students beginning the study of law cannot be registered for the full fifteen-hour course except when entering at the first, or autumn quarter.

Fees.—A fee of fifteen dollars (\$15) per quarter for persons who have been domiciled in the state of Washington or territory of Alaska, for at least one year prior to date of registration, and of fifty dollars (\$50) per quarter for all others, is charged in the Law School, payable at the beginning of each quarter. A law library fee of ten dollars (\$10) per quarter is also charged all law students, payable at the beginning of each quarter. A diploma fee of five dollars (\$5) is charged all students to whom diplomas are issued.

For information on other general University fees and expenses applicable to all students, see pages 47-51.

Admission to the Bar.—The Law School of the University of Washington is by law made the standard of approved law schools for the purpose of admission to the bar of this state. Students intending to practice in the state of Washington should consult the dean of the Law School upon entering the Law School, and register in accordance with the rules of the State Board of Law Examiners.

ADMISSION AND GRADUATION

To be admitted to regular standing in the Law School students must present acceptable credits or pass examination entitling them to admission to this University and in addition thereto present a junior certificate from the College of Liberal Arts or the College of Science of this University, or present acceptable credits or pass examinations equivalent to the junior certificates. The entrance requirements are stated fully in the section of the catalogue relating to Entrance Information.

Advanced Standing.—If, in addition to satisfying the entrance requirements for regular standing in the Law School, the student has earned credits in another law school of satisfactory standing, by regular attendance for at least one academic year of not less than eight months, he will ordinarily receive credit for such work, subject to the following restrictions: The work must equal in amount and character that required by this Law School. Not more than two years' credit will be allowed for such work. The right is reserved to refuse advance credit in law in whole or in part, save upon examination. Candidates for a degree, with advanced standing, must spend at least one full college year in the Law School.

Special Students.—No person will be admitted as a special student in law, unless he is twenty-one years of age and his general education is such as to entitle him to take the state bar examination.

Special students who comply with these requirements and with the regulations for admission of special students (see Entrance Information, page 45) will be admitted to take such work in law as their previous preparation enables them to carry successfully, and upon satisfactory completion of sufficient law work to entitle them to take the state bar examination, will be given a certificate or affidavit entitling them to apply for examination. Students who intend to take this method must file notice of their intention to study law with the clerk of the Supreme Court as required by law.

Special Students Becoming Candidates for Degree.—Special students may become candidates for a degree upon complying with all the entrance requirements as above set forth in reference to regular students. If a special student intends to become a candidate for a degree by clearing up his entrance requirements during his law studies, he must notify the dean of the Law School upon registration. Such students will be permitted to carry a limited amount of work in the College of Liberal Arts or the College of Science to enable them to clear up their entrance requirements in law.

Combined Curriculum in Arts and Law.—This combined course allows the student with a good record to complete the requirements for the degrees of bachelor of arts and bachelor of laws in six years.

It is open only to those students who have maintained a uniformly good record for scholarship during the first three years of Liberal Arts.

The student is enrolled in the College of Liberal Arts during the first three years. If at the end of three years he has uniformly good record for scholarship and has earned 135 or more credits, including all the required work, he may for the fourth year register in the Law School for the first year's work in law and must earn in the College of Liberal Arts additional credits sufficient to make his total of arts and science credits amount to 144, and earn in the Law School at least 36 credits in the first year law work, to apply on his bachelor of arts degree, thus making his 180 credits required for the degree of bachelor of arts. The degree of bachelor of arts may be granted upon the completion of the fourth year.

The last two years of this combined course are devoted to completing the rest of the work in the Law School.

Students are advised to complete their full 144 credits in Liberal Arts by the end of the third year, so they can enter the law work clear in the fourth year.

Students from other schools entering this University with advanced standing may take advantage of this combined course, provided they are registered in the College of Liberal Arts for at least one full year's work and earn at least 45 credits in the University before entering the law work.

This privilege will not be extended to normal graduates attempting to graduate in two years nor to undergraduates of other colleges who enter this University with the rank of senior.

Thesis.—It is the desire of the faculty to encourage original investigation and research by the students. Each candidate for a degree is required to prepare and deposit with the dean of the Law School, before the beginning of the spring vacation of his senior year, a thesis of not less than thirty folios in length, upon some legal topic selected by the student and approved by the faculty. The student will be examined by the faculty upon this thesis. It must be printed or typewritten, and is to be kept permanently in the library of the Law School.

The Jaggard Prize.—Miss Anne Wright Jaggard, daughter of the late Edwin Ames Jaggard, LL. D., Justice of the Supreme Court of Minnesota, offers an annual prize of \$50 for the best thesis submitted by members of the senior class, candidates for the degree of bachelor of laws, upon a subject in the courses of history of the law or jurisprudence.

Summer Session of the Law School.—Courses are offered each summer by the Law School for both beginning and advanced students. Different courses are offered successive summers. This

work counts toward a degree as a part of the regular instruction of the Law School. By increasing the number of periods per week, the equivalent of a quarter's work in the regular session is completed in each of the offered courses.

Instruction in Other Departments.—Students in the Law School may pursue studies, for which they are prepared, in other departments of the University without charge, other than the prescribed fee for excess hours, except that in the laboratory courses the usual laboratory deposits will be required.

Degrees.—The degree of bachelor of laws (LL. B.) will be conferred on all students who comply with the entrance requirements for regular students stated hereinbefore, remain in residence in the Law School for three school years, successfully complete all the law work in the Law School, aggregating 135 credits, and comply with all the rules and regulations of the faculty and board of regents of this University.

Students admitted to advanced standing based upon credits earned at another law school may count that work toward graduation, subject to the restrictions heretofore stated.

Examination.—The members of each class are examined daily throughout the year in their studies, and may be subjected to written examinations at any time in the discretion of the faculty without notice. At the end of each quarter the members of each class are subject to written examination on the courses during the year, and their promotion is dependent on successfully passing such examination.

To receive the degree of bachelor of laws it is necessary to pass satisfactory examinations in the entire course of three years. Students who pass these examinations with distinguished excellence will receive the degree of bachelor of laws *cum laude*.

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index).

COLLEGE OF MINES

THE FACULTY

HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.
JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.
MILNOR ROBERTS, A. B. (Stanford), Professor of Mining Engineering and Metallurgy; DEAN.
JOSEPH DANIELS, S. B. (Massachusetts Institute of Technology), M. S. (Lehigh), Associate Professor of Mining Engineering and Metallurgy.
CLARENCE RAYMOND COREY, E. M. (Montana State School of Mines), A. M. (Columbia), Assistant Professor of Mining Engineering and Metallurgy.
HEWITT WILSON, CER. E. (Ohio State University), Assistant Professor of Ceramics.
HARVEY L. GLENN, B. S. (Iowa State College), Lecturer on Assaying of Bullion.
FREDERICK POWELL, E. M. (Columbia), Lecturer on Gold Dredging.
JOHN G. SCHONING, Foreman Miner in charge of Mine Rescue Training, U. S. Bureau of Mines, Mine Safety Station.
LEVI J. MERRILL, Assistant in Metallurgy.
OSCAR A. GLAESER, Assistant in Mining.
JAMES MCKIM, Assistant in Ore Dressing.

JOHN THOMAS CONDON, LL. M. (Northwestern), Professor of Law.
HENRY KREITZER BENSON, PH. D. (Columbia), Professor of Chemical Engineering.
TREYOR KINCAID, A. M. (Washington), Professor of Zoology.
FREDERICK ARTHUR OSBORN, PH. D. (Michigan), Professor of Physics.
ROBERT EDOUARD MORITZ, PH. D. (Nebraska), PH. N. D. (Strassburg), Professor of Mathematics.
CARL EDWARD MAGNUSSON, E. E. (Minnesota), PH. D. (Wisconsin), Professor of Electrical Engineering and Dean of the College of Engineering.
EVERETT OWEN EASTWOOD, C. E., A. M. (Virginia), S. B. (Massachusetts Institute of Technology), Professor of Mechanical Engineering.
DAVID CONNOLLY HALL, SC. M., M. D. (Chicago), Professor of Hygiene.
CHARLES CHURCH MORE, M. S., C. E. (Lafayette), M. C. E. (Cornell), Professor of Civil Engineering.
WILLIAM FRANKLIN ALLISON, C. E. (Cornell), Professor of Municipal and Highway Engineering.
CHARLES LEONARD PHILLIPS, Colonel C. A. C., U. S. A. (U. S. Military Academy), A. B. (Colby), C. E. (Maine), Professor of Military Science and Tactics.
LOREN DOUGLAS MILLMAN, A. B. (Michigan), Associate Professor of English.
CHARLES WILLIAM HARRIS, C. E. (Cornell), Associate Professor of Civil Engineering.
VANDERVEER CUSTIS, PH. D. (Harvard), Associate Professor of Economics.
GEORGE SAMUEL WILSON, B. S. (Nebraska), Associate Professor of Mechanical Engineering.
EDGAR ALLEN LOEW, B. S., E. E. (Wisconsin), Associate Professor of Electrical Engineering.
HENRY LOUIS BRAKEL, PH. D. (Cornell), Associate Professor of Engineering Physics.
CHARLES EDWIN WEAVER, PH. D. (California), Associate Professor of Geology.
ALLEN FULLER CARPENTER, B. S., C. E. (Chicago), Associate Professor of Mathematics.
GEORGE IRVING GAVETT, B. S., C. E. (Michigan), Assistant Professor of Mathematics.
GEORGE E. GOODSPEED, S. B. (Massachusetts Institute of Technology), Assistant Professor of Geology.
FRED HARVEY HEATH, PH. D. (Yale), Assistant Professor of Chemistry.
SAMUEL THOMAS BEATTIE, Instructor in Woodwork.
SANDY MORROW KANE, Instructor in Metal Work.
CHRIS. G. DOBSON, E. M. (Montana State School of Mines), Acting Instructor in Civil Engineering.

ADVISORY BOARD COLLEGE OF MINES

UNIVERSITY OF WASHINGTON

ROY H. CLARKE, mining engineer, Peyton Building, Spokane.
JOHN ERIKSON, mine operator, Erikson Building, Seattle.
J. T. HEFFERNAN, president of the Heffernan Engine Works, mine operator, 108 Railroad Avenue South, Seattle.
CHARLES HUSSEY, general manager of estate of John A. Finch, mine operator, Empire State Building, Spokane.
W. R. RUST, founder of the Tacoma Smelter, president of Tacoma Exploration Company, Box 1454, Tacoma.
NATHANIEL D. MOORE, General Manager of Pacific Coast Coal Company, Seattle.

SCOPE AND FACILITIES

Degrees.—The College of Mines offers specialized training in mining engineering, metallurgy, and ceramics. The four-year curricula lead to degrees as follows:

- I. Bachelor of science in mining engineering, B. S. (Min. E.)
- II. Bachelor of science in geology and mining, B. S. (Geol. and Min.)
- III. Bachelor of science in metallurgical engineering, B. S. (Met. E.)
- IV. Bachelor of science in coal mining engineering, B. S. (Coal Mine E.)
- V. Bachelor of science in ceramics, B. S. (Ceramics)

The degree of engineer of mines (E. M.) is given to graduates in mining engineering who have practiced their profession for at least three years and who present a satisfactory thesis. Graduates in metallurgy may receive the degree of metallurgical engineer (Met. E.) under similar conditions, and the appropriate advanced degrees are open to graduates of the other curricula.

Mining and Metallurgical Industries Available for Study.—Excellent opportunities for becoming familiar with mining and metallurgical operations are open to students in the College of Mines. Mining machinery of the best type is in operation within easy reach of the University. Much of the heavy mining machinery used in the neighboring states and Alaska is built in the city of Seattle, while patented machines, such as drills and concentrating tables of all makes, are kept in stock and as working exhibits by the firms that supply the North Pacific coast regions. More than 40 eastern firms dealing in mining equipment make their Seattle branches the distributing center for the Pacific Northwest, British Columbia and Alaska. Methods important to the mining engineer are the operations of the steam shovels, which are now used largely in iron, copper and gold mining. The engineers in charge of these plants have given the mining students every opportunity to become familiar with the methods of planning and carrying on the work, and the same statement applies to the mine operators throughout the state.

A partial list of the other available works of interest includes coal mines and coke ovens, with the largest production west of the Rocky mountains; metal mines of gold, silver, copper, arsenic, antimony, iron, etc.; cement plants, several stone quarries and dressing works; clay mines, clay and pottery works; gravel and sand pits with large production and approved methods; a region of varied geology with many economic minerals; the Tacoma smelters and

refineries; the U. S. assay office; the West Seattle steel plant of the Pacific Coast Steel Co., and several plants engaged in electro-metallurgical work.

Mining Society.—The Mining Society, affiliated with the American Institute of Mining and Metallurgical Engineers, has a membership composed of all students in the College. At the monthly meetings of the society addresses are made by prominent mining engineers, and papers descriptive of their summer work are presented by the student members.

MINING AND METALLURGICAL RESEARCH

The purpose of this department is to stimulate and encourage development in the mining, metallurgical and ceramic industries of Washington, the Pacific Northwest and Alaska by research in the special problems presented, and to solve the problems through the efforts of fellowship holders and others studying in the department.

Graduates from suitable technical courses at institutions of recognized standing, or men who present evidence of technical training which has fitted them to undertake investigations, are eligible to enroll in mining and metallurgical research. The degree of master of science may be granted to those students who, holding a suitable bachelor of science degree, complete investigative work in compliance with the University requirements for the master's degree. Although as much latitude as possible will be allowed in the choice of subjects for research, the general topics will be those which are of special importance to this region.

Research Fellowships.—In connection with the department, four research fellowships of \$900 annual value have been established. These fellowships are open to qualified graduates of scientific or technical courses in institutions of recognized standing. Applicants should send a copy of their record from the registrar's office of the college where they have been, or will be, graduated, and the names and addresses of at least three references who know their character, training and ability. Applications for these fellowships are due not later than June 1, and should be addressed to the Dean, College of Mines, Seattle, Washington.

Appointees to the fellowships report for duty on July 1, and are required to be on duty during the entire year, except that in case of reappointment for a second year, the fellowship holder is given a vacation from June 15 to July 1.

Fellowship holders are required to register as graduate students in the University of Washington and to become candidates for the degree of master of science in mining engineering, metallurgy or ceramics, unless an equivalent degree has previously been earned.

Arthur A. Denny Fellowship.—In addition to the foregoing, a fellowship of \$500 annual value is open to students in the College of Mines who are residents of the state of Washington. This fellowship is awarded on the bases of scholastic excellence and general merit, but only to those who need financial assistance. Applications must be made to the Dean of the College before March 15 preceding the academic year for which the fellowships are to be granted. The purpose of the fellowship is to encourage graduate work in the College.

Investigations of Problems.—The University will, under certain conditions, permit mining and metallurgical companies who have special problems for solution, to detail a representative to work on such problems, or to meet the expense of engaging a man to do so. Experiments which can be carried on as readily in commercial laboratories and which do not require direction from the Bureau's experts are not undertaken. The research work shall be under the direction of the department, and complete records of all the data obtained in the investigation of the problems shall be filed with the department, which shall have the right to publish this information for the benefit of the mining and metallurgical industry.

Instruction for Coal Mining Men.—Miners taking the rescue training also receive instruction in the College of Mines on the subjects of mine gases, explosions and the origin and distribution of Pacific Coast and Alaska coals. Laboratory experiments are carried on to show the methods of analyzing coals and determining the uses to which they may be put. The methods of testing for permissible explosives at the Pittsburg station and the safe methods of charging, tamping, and firing are explained. Coal men interested in the washing of coals are given full practice with the several types of apparatus used for this purpose.

REQUIREMENTS FOR ADMISSION

Full information regarding requirements for admission, registration, and expenses may be found on pages 39-51.

CURRICULA OF THE COLLEGE OF MINES

MINING ENGINEERING (OPTION I)

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Mathematics 51	4	Mathematics 52	4	Mathematics 53	4
Civil Engineering 1.....	3	Civil Engineering 2.....	3	Civil Engineering 13....	3
Civil Engineering 11.....	3	Civil Engineering 12....	3	Civil Engineering 21....	3
Chemistry 1 or 21.....	5	Chemistry 2 or 22.....	5	Chemistry 3 or 23.....	5
Mil. Sci. or Phys. Ed... 1½		Mil. Sci. or Phys. Ed... 1½		Mil. Sci. or Phys. Ed... 1½	

†Practice in mining, metallurgy, geology or ceramics, accompanied by a report on the work performed is required of all students during a summer vacation following the sophomore or junior year.

SECOND YEAR

Mathematics 61	3	Mathematics 62	3	English 4	3
Physics 97	5	Physics 98	5	Physics 99	5
Geology 1	5	Geology 21	5	Geology 120	3
Mining 51	3	Civil Engineering 27....	3	Chemistry 111	5
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%	

THIRD YEAR

Civil Engineering 131... 3	Civil Engineering 132... 3	Geology 122	2
Geology 123	3	Electrical Eng. 101-102..	6
Mining 101	3	Geology 124	3
Metallurgy 101	5	Metallurgy 102	5
Mechanical Eng. 54..... 1	Metallurgy 153	Mining 106	2

‡Mining practice in summer vacations.

FOURTH YEAR

Mining 151	3	Mining 154	1	Mining 152	5
Mining 153	2	Mining 162	3	Mining 155	2
Metallurgy 155	3	Geology 127	5	Mining 182	3
Metallurgy 162	2	Mining 103	1		
Electives	5	Electives	5	Electives	5

GEOLOGY AND MINING (OPTION II)

FIRST YEAR

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Mathematics 51	4	Mathematics 52	4	Mathematics 53	4
Civil Engineering 1....	3	Civil Engineering 2....	3	Civil Engineering 13....	3
Civil Engineering 11....	3	Civil Engineering 12....	3	Civil Engineering 21....	3
Chemistry 1 or 21.....	5	Chemistry 2 or 22.....	5	Chemistry 3 or 23.....	5
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%	

SECOND YEAR

Mathematics 61	3	Mathematics 62	3	Geology 4	3
Physics 97	5	Physics 98	5	Physics 99	5
Geology 1	5	Geology 21	5	Geology 120	3
Mining 51	3	Civil Engineering 27....	3	Chemistry 111	5
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%	

THIRD YEAR

Civil Engineering 131... 3	Civil Engineering 132... 3	Geology 122	2
Geology 123	3	Geology 125	2
Mining 101	3	Metallurgy 102	5
Metallurgy 101	5	Mining 106	2
Mechanical Eng. 54..... 1	Electives	English 4	3

‡Mining Practice in Summer Vacations.

FOURTH YEAR

Mining 151	3	Mining 154	1	Mining 152	5
Mining 153	2	Mining 162	3	Mining 155	2
Metallurgy 162	2	Geology 127	5	Geology 131	5
Geology 126	3	Mining 103	1	Electives	4
Electives	5	Electives	5		

METALLURGY (OPTION III)

FIRST YEAR

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Mathematics 51	4	Mathematics 52	4	Mathematics 53	4
Civil Engineering 1....	3	Civil Engineering 2....	3	Civil Engineering 13....	3
Civil Engineering 11....	3	Civil Engineering 12....	3	Civil Engineering 21....	3
Chemistry 1 or 21.....	5	Chemistry 2 or 22.....	5	Chemistry 3 or 23.....	5
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%	

‡Practice in mining, metallurgy, geology or ceramics, accompanied by a report on the work performed is required of all students during a summer vacation following the sophomore or junior year.

SECOND YEAR

Mathematics 61	3	Mathematics 62	3	English 4	3
Physics 97	5	Physics 98	5	Physics 99	5
Geology 1	5	Geology 21	3	Geology 120	3
Mining 51	3	Civil Engineering 27	3	Chemistry 111	5
Mil. Sci. or Phys. Ed.	1%	Mil. Sci. or Phys. Ed.	1%	Mil. Sci. or Phys. Ed.	1%

THIRD YEAR

Civil Engineering 131	3	Civil Engineering 132	3	Electrical Eng. 121-122..	0
Mining 101	3	Electrical Eng. 101-102..	6	Metallurgy 102	5
Metallurgy 101	5	Metallurgy 103	3	Mining 106	2
Mechanical Eng. 54	1	Metallurgy 153	3	Electives	3
Electives	3				

‡Mining Practice in Summer Vacations.

FOURTH YEAR

Mining 151	3	Mining 154	1	Mining 152	5
Mining 153	2	Metallurgy 163	2	Mining 155	2
Metallurgy 104	5	Metallurgy 165	2	Metallurgy 166	3
Metallurgy 155	3	Geology 127	5	Electives	5
Metallurgy 162	2	Mining 103	1		
		Electives	4		

COAL MINING (OPTION IV)

FIRST YEAR

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Mathematics 61	4	Mathematics 52	4	Mathematics 53	4
Civil Engineering 1	3	Civil Engineering 2	3	Civil Engineering 13	3
Civil Engineering 11	3	Civil Engineering 12	3	Civil Engineering 21	3
Chemistry 1 or 21	5	Chemistry 2 or 22	5	Chemistry 3 or 23	5
Mil. Sci. or Phys. Ed.	1%	Mil. Sci. or Phys. Ed.	1%	Mil. Sci. or Phys. Ed.	1%

SECOND YEAR

Mathematics 61	3	Mathematics 62	3	Geology 4	3
Physics 97	5	Physics 98	5	Physics 99	5
Geology 1	5	Geology 21	3	Geology 120	3
Mining 51	3	Civil Engineering 27	3	Chemistry 111	5
Mil. Sci. or Phys. Ed.	1%	Mil. Sci. or Phys. Ed.	1%	Mil. Sci. or Phys. Ed.	1%

THIRD YEAR

Civil Engineering 131	3	Civil Engineering 132	3	Electrical Eng. 121-122..	6
Mining 101	3	Electrical Eng. 101-102..	6	Metallurgy 102	5
Mechanical Eng. 81	3	Mining 122	3	English 4	3
Mechanical Eng. 82	3	Metallurgy 103	3	Mining 106	2
Mechanical Eng. 83	3				

‡Mining Practice in Summer Vacations.

FOURTH YEAR

Mining 151	3	Mining 154	1	Mining 155	2
Mining 153	2	Mining 171	3	Mining 182	3
Metallurgy 155	3	Mining 176	5	Mining 178	2
Mining 170	3	Mining 103	1	Electives	8
Mechanical Eng. 54	1	Electives	5		
Electives	3				

CERAMICS (OPTION V)

FIRST YEAR

Autumn Quarter	Credits	Winter Quarter	Credits	Spring Quarter	Credits
Mathematics 61	4	Mathematics 52	4	Mathematics 53	4
Civil Engineering 1	3	Civil Engineering 2	3	Civil Engineering 13	3
Civil Engineering 11	3	Civil Engineering 12	3	Civil Engineering 21	3
Chemistry 1 or 21	5	Chemistry 2 or 22	5	Chemistry 3 or 23	5
Mil. Sci. or Phys. Ed.	1%	Mil. Sci. or Phys. Ed.	1%	Mil. Sci. or Phys. Ed.	1%

‡Practice in mining, metallurgy, geology or ceramics, accompanied by a report on the work performed is required of all students during a summer vacation following the sophomore or junior year.

SECOND YEAR

Mathematics 61	3	Mathematics 62	3	Ceramics 90	3
Physics 97	5	Physics 98	5	Physics 99	5
Geology 1	5	Geology 21	5	Geology 120	3
Mining 51	3	Civil Engineering 27....	3	Chemistry 111	5
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%	

THIRD YEAR

Civil Engineering 131....	3	Civil Engineering 132....	3	English 4	2
Mining 101	3	Metallurgy 153	3	Metallurgy 102	5
Chemistry 181	3	Chemistry 182	3	Ceramics 102	3
Ceramics 100	3	Ceramics 101	3	Ceramics 110	2
Ceramics 104	3	Ceramics 105	3	Mining 106	2
‡Mining Practice in Summer Vacations.					

FOURTH YEAR

Ceramics 121	5	Ceramics 122	5	Ceramics 123	5
Ceramics 131	3	Ceramics 132	3	Ceramics 133	2
Electives	7	Mining 108	1	Electives	8
		Electives	6		

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index).

WINTER SESSION FOR MINING MEN

The twenty-fifth annual short session for mining men will open on January 5, 1922, and continue until March 22. During this period each year twelve of the instructors in mining engineering offer a course for the benefit of persons who are interested in prospecting, mining, milling, assaying or smelting. Admission to the class is without examination. No previous preparation, training, or mining experience is necessary to enter the course, other than ability to read and write English. Many practical men with an interest in some branch of mining but without much education have obtained satisfactory results from the course; others with a college education and mining experience have gained much up-to-date training and information. The past experience and future aims of each student are taken into consideration, and the character of his work arranged accordingly. Prospectors and mining men may bring in their own ores and minerals for study, for assay, or for concentration tests, by ordinary wet methods or by flotation.

Instruction is given by lectures, laboratory exercises, and visits to mines and plants in operation. Each year a group of mining men is engaged to give special lectures during the period of the short session. These men represent the fields of coal, quartz and placer mining, dredging, milling and smelting.

Three general groups of studies are offered: (1) quartz mining; (2) placer mining; (3) coal mining.

‡Practice in mining, metallurgy, geology or ceramics, accompanied by a report on the work performed is required of all students during a summer vacation following the sophomore or junior year.

1. *Quartz Mining*.—For men interested in quartz or lode mining, the course outlined consists of geology, mineralogy, mining, milling, field trips, mining law, surveying, chemistry and fire assaying. Optional subjects are forge and foundry, mine timber framing, and mine rescue and first-aid training.

2. *Placer Mining*.—The placer mining group embraces surveying, hydraulic mining, placer mining, geology, mineralogy, mining, milling, mining law, and forge and foundry.

3. *Coal Mining*.—For coal miners the courses consist of coal analysis, coal washing, gas and lamp testing, mine rescue and first-aid training, chemistry, geology, mineralogy and surveying.

For more detailed information apply to the dean of the College of Mines.

COLLEGE OF PHARMACY

THE FACULTY

HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.

JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.

CHARLES WILLIS JOHNSON, PH. C., PH. D. (Michigan), Professor of Pharmaceutical Chemistry; DEAN AND STATE CHEMIST.

ARTHUR WILSON LINTON, B. S. (Michigan), M. S. (Washington), Associate Professor of Pharmacy.

ELDIN VERNÉ LYNN, PH. D. (Wisconsin), Assistant Professor of Pharmacy.

FOREST J. GOODRICH, PH. C., M. S. (Washington), Instructor in Pharmacy.

FRANK ARTHUR PATTY, B. S. (Kansas), Instructor in Pharmacy.

CORNELIUS OSSEWARD, PH. C. (Northwestern), Lecturer on Commercial Pharmacy.

JEAN ROBIN WILKES, PH. C., B. S. (Washington), Assistant State Chemist.

GEORGE HERBERT NEEDHAM, Assistant State Chemist.

JAMES THOMPSON, B. S. (Minnesota), In charge of garden of medicinal plants.

RUTH IRENE PATTY, A. B. (Kansas), Assistant in Pharmacy.

HENRY K. BENSON, PH. D. (Columbia), Professor of Chemistry.

FREDERICK MORGAN PADELFORD, PH. D. (Yale), Professor of English and Dean of the Graduate School.

FREDERICK ARTHUR OSBORN, PH. D. (Michigan), Professor of Physics.

PIERRE JOSEPH FREIN, PH. D. (Johns Hopkins), Professor of French.

THEODORE CHRISTIAN FRYE, PH. D. (Chicago), Professor of Botany.

ROBERT EDOUARD MORITZ, PH. D. (Strassburg), Professor of Mathematics.

LESLIE J. AYER, J. D. (Chicago), Professor of Law.

STEPHEN IVAN MILLER, JR., A. B. (Stanford), LL. B. (Michigan), Professor of Economics and Dean of the College of Business Administration.

GEORGE BURTON RIGG, PH. D. (Chicago), Associate Professor of Botany.

ERNST OTTO ECKELMAN, PH. D. (Heidelberg), Assistant Professor of German.

JOHN WEINZIRL, PH. D. (Wisconsin), Professor of Bacteriology.

ELI VICTOR SMITH, PH. D. (Northwestern), Assistant Professor of Zoology.

COLLEGE OF PHARMACY

The College of Pharmacy was organized in 1894 for the purpose of offering an opportunity to young men and women to become well trained practical pharmacists. The work of the two year course as first organized has been extended to three, four and five year courses. In the two and three year courses a complete training is offered in technical and commercial pharmacy; in the four year course an opportunity for training in more advanced scientific

pharmacy together with a liberal training in other sciences and in languages. The five year or graduate course offers an opportunity to do research work in one of the most fertile fields of modern science.

The students in pharmacy share the advantage and enjoy the spirit of one of the foremost educational institutions of the Pacific Coast.

REQUIREMENTS TO PRACTICE PHARMACY IN THE STATE OF WASHINGTON

The Administrative Code passed by the 1921 legislature abolished the Board of Pharmacy and placed the registration of pharmacists under a new department created by the Code and called the Department of Licenses.

It is expected that the Department of Licenses will continue to enforce the requirements for registration as pharmacists that have been enforced by the Board of Pharmacy since 1914.

These requirements are;—1. Graduation from an approved College of Pharmacy.

2. (a) Graduates of two-year courses are required to have two years of practical experience.
- (b) Graduates of three-year courses are required to have 18 months of practical experience.
- (c) Graduates of four-year courses are required to have 12 months of practical experience.

Graduates of the University of Washington College of Pharmacy are registered *without examination* upon payment of a fee of \$8. Graduates who have not had the required amount of practical experience are registered as assistant pharmacists and upon completing the required amount of practical experience obtain full registration as pharmacists.

Higher Standards in Pharmacy.—The minimum course of study in the College of Pharmacy is one of *three years*. The aim of this course is to give thorough scientific training for retail pharmacists and, if the student desires, he may elect certain studies in the College of Business Administration that will better prepare him for the business side of retail pharmacy.

It is recognized that retail pharmacy is both a profession and a business. The College of Pharmacy desires to meet as far as possible these two conditions. Special attention will be given, in the first place, to a thorough scientific training for the compounding and dispensing of drugs and medicines, and such business training will be included as time will permit in the three year course. Students desiring further business training can complete, in one more year, the four year combined scientific and business course. In

this four year course the student will get training in economics, psychology, business law, accounting, advertising, salesmanship and business management. All of this training is useful in the every day life of the business side of retail pharmacy.

Students desiring more extensive training in scientific pharmacy can complete the three year course by including advanced work in Prescriptions—,manufacturing pharmacy, toxicology, physiological chemistry and bacteriology. Graduates of this course are trained for positions in strictly prescription stores and for work in clinical diagnosis.

Graduates of the four year scientific course are trained for positions as expert laboratory workers in both State and Federal Laboratories, bacteriologists for physicians, City Boards of Health, and for State and Federal laboratories, manufacturing pharmacists and chemists for large pharmaceutical houses, and as teachers in the College of Pharmacy.

It should be noted therefore that the College sets a high standard for pharmaceutical training and that a number of opportunities are open to graduates who take the time to thoroughly prepare themselves for responsible positions.

Preparation for Medicine.—Students taking the four year scientific course have the opportunity of electing studies that will give them clear entrance to the best medical colleges. Pharmaceutical training is an excellent preparation for medicine. It gives the student a knowledge of drugs and medicines that can be obtained in no other way. In addition the graduate in pharmacy who finally completes medicine has the benefit of the two professions.

The American Conference of Pharmaceutical Faculties.—The College of Pharmacy is a member of the American Conference of Pharmaceutical Faculties. The objects of the conference are: to promote closer relations between the several colleges of pharmacy of the United States, to standardize pharmaceutical education and to encourage a higher standard of proficiency for members of the profession.

GENERAL INFORMATION

Garden of Medicinal Plants.—For several years the College of Pharmacy has maintained on the campus a garden in which plants of pharmaceutical importance have been cultivated. The area and scope of this garden have been gradually extended, until the college now has a very complete collection of medicinal plants which furnishes valuable material for classes in botany, materia medica and drug assay.

A specialist in medicinal plant cultivation, formerly associated with the U. S. Bureau of Plant Industry, is a member of the staff of the College of Pharmacy and is in charge of the garden of

medicinal plants. Persons interested in Medicinal Plant cultivation are urged to write Mr. James Thompson, College of Pharmacy, University of Washington, Seattle, for desired information.

Service to Pharmacists of the State.—It is the desire of the college to render every possible service to the pharmacists of the state. We therefore invite the pharmacists to write us in regard to their prescription difficulties. Many pharmacists are now availing themselves of this privilege, and it is our wish to extend this service to the entire profession. Send your prescriptions with a history of difficulties encountered to Professor A. W. Linton, who is in charge of prescription courses in the College of Pharmacy.

Food and Drug Analysis.—The enactment of the Food and Drug Act by Congress, and of similar legislation by most of the states (Washington included), has given great importance to pharmaceutical education. It is at once apparent that a knowledge of drugs is equally important with chemistry in the administration and enforcement of this legislation. The graduate in chemistry is not wholly qualified to act as a food and drug inspection chemist for the government, states, private individuals, and corporations, if he is not trained in those subjects included in the collective name of pharmacy. These allied subjects are: Theory and practice of pharmacy, manufacturing pharmacy, drug assaying, pharmaceutical botany, study of the United States Pharmacopœia and National Formulary, pharmacognosy, materia medica and therapeutics, etc. A great many pharmaceutical chemists are needed to carry out the analytical processes involved in the enforcement of this legislation, but the number of men adequately trained is very limited. Students with high school training are urged to consider these opportunities and to prepare themselves for such positions. The Dean of the College of Pharmacy is chemist for the Washington State Department of Agriculture and is also in close touch with the government food and drug work. Courses are offered that will fit students for this line of work.

Women in Pharmacy.—The opportunities for women in pharmacy are just as great as for men. Women are finding a place in retail pharmacy and are becoming noted for the satisfaction they give in both the scientific and business side of the average drug store. Women graduates of the four year course are also giving excellent satisfaction as food and drug chemists, bacteriologists and as teachers in colleges of pharmacy.

Library Facilities.—A branch of the university library containing books and current publications on pharmacy and chemistry is maintained in the pharmacy building. Practically all the domestic and some foreign journals on pharmacy are received by the college. The student is expected to make use of the library and to report from time to time on current topics of interest.

Fees.—For information on University fees and expenses applicable to all students see page 47.

The Arthur A. Denny Fellowship.—The College of Pharmacy is indebted to the Arthur A. Denny estate for a fellowship that will pay \$500 per year to the student selected for this honor. The fellowship will be granted each year to a graduate of the four-year course in pharmacy. The graduate will be selected on the basis of excellence in scholarship and promise of ability to do research work in some subject of pharmaceutical importance. The fellowship is granted for the first time for the year 1921-1922.

Observation Trips.—The observation visits made each year by the classes in pharmacy to the various large manufacturing and wholesale establishments of Seattle and to the large retail stores are an important feature of the work of the college. Among the places visited during the year 1920-1921 were Stewart & Holmes Drug Company, branch houses of Parke, Davis & Co., H. K. Mulford Company and some of the leading prescription and commercial pharmacies of the city. Also to the hydrastis and ginseng farm of Mr. C. E. Thorpe, situated near the University campus.

REQUIREMENTS FOR ADMISSION

1. ADMISSION TO THE THREE-YEAR COURSE LEADING TO THE DEGREE OF PHARMACEUTICAL CHEMIST.

For admission to the three-year course, no subjects are prescribed beyond the general requirements for freshman standing in the University. (See page 39).

2. ADMISSION TO THE FOUR-YEAR COURSE, LEADING TO THE DEGREE OF BACHELOR OF SCIENCE IN PHARMACY.

For admission to this course a candidate must present the following credits, in the fifteen units required for freshman standing in the University:

2 units in one foreign language.

1 unit in one of the following sciences: physics, chemistry, botany, zoology, physiology, general biology.

3. ADMISSION TO THE FIVE-YEAR COURSE LEADING TO THE DEGREE OF MASTER OF SCIENCE IN PHARMACY.

Candidates for the degree of master of science, must have received the bachelor's degree from this college or from some other college of equal rank maintaining a four-year course which is the equivalent of the course at this institution.

4. STUDENTS NOT CANDIDATES FOR DEGREES.

Persons over twenty-one years of age, who present evidence of adequate preparation, may be admitted as special students. In general a student from an accredited high school will not be admitted as a special if he has been in attendance at high school during the previous year.

Applicants for admission as specials should file their applications and credentials with the Registrar at least four weeks before the beginning of the quarter in which they wish to attend. Blanks for this purpose may be obtained from the Registrar at any time.

DEGREES

1. The degree of pharmaceutical chemist (Ph. C.) will be conferred upon any student who has complied with the entrance conditions and has completed the three-year course.

2. The degree of bachelor of science (B. S.) will be conferred upon any student who has fulfilled the entrance requirements and has completed either the four-year scientific course or the combined scientific and business course. This degree with honors may be conferred upon a student of the College of Pharmacy if recommended for this distinction by the pharmacy faculty.

3. The degree of master of science in pharmacy (M. S.) will be conferred upon any graduate of the four-year course who has completed at least one year of graduate work and has presented a satisfactory thesis.

NOTE—Students who have entered as candidates for the two-year degree of Graduate in Pharmacy (Ph. G.) have the right to complete the requirement for this degree.

CURRICULA REQUIRED FOR GRADUATION

1. A three-year course which prepares its graduates for responsible positions as practical pharmacists. Opportunity is given in this course for training in business law, advertising, accounting, advanced work in pharmacy, bacteriology and chemistry.

2. A four-year scientific course which offers a well-rounded scientific and liberal training. Graduates of this course are prepared for positions as, (a) practical and manufacturing pharmacists; (b) manufacturing and technical chemists; (c) bacteriologists; (d) teachers in colleges of pharmacy; (e) food and drug inspection chemists and bacteriologists in the United States Civil Service; (f) pharmaceutical journalism.

Graduates of the four-year course have clear entrance to the best medical colleges and are well equipped to carry on their medical studies.

3. A four-year combined scientific and business course which includes the regular pharmacy work of the three-year course together with advanced training in pharmacy, and courses in the College of Business Administration and Schools of Journalism and Law which will insure the student a thorough business training. Special attention will be given to courses in business law, advertising, accounting, salesmanship, insurance, money and banking and business organization. This course is designed to produce well trained men for either retail or wholesale pharmacy.

4. A five-year course offers opportunity to the four-year graduate to do graduate and research work in some line of scientific pharmacy and graduate work in some branch of allied science. Graduates of this course are prepared for responsible positions in many different lines of work.

1. WITH DEGREE OF PHARMACEUTICAL CHEMIST. (Three-Year Course).

FIRST YEAR					
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Pharmacy 1	5	Pharmacy 2	5	Pharmacy 3	5
Chemistry 8	5	Chemistry 9	5	Chemistry 10	5
Physiology 7	5	Botany 13	5	Botany 14	4
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Pharmacy 4	2
				Mil. Sci. or Phys. Ed... 1%	

SECOND YEAR					
Chemistry 37	5	Chemistry 38	5	Chemistry 39	5
Pharmacy 5	5	Pharmacy 6	5	Pharmacy 7	4
Pharmacy 9	2	Pharmacy 10	2	Pharmacy 11	2
English 1	3	Pharmacy 12	3	Pharmacy 13	3
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Pharmacy 15	1
				Mil. Sci. or Phys. Ed... 1%	

THIRD YEAR					
Pharmacy 101	2	Pharmacy 102	2	Pharmacy 103	2
Pharmacy 117	2	Pharmacy 118	2	Bacteriology 5	4
Pharmacy 109	2	Pharmacy 110	2		
Approved Elective 9-10		Approved Elective 9-10		Approved Elective 9-10	

Total Scholastic Hours for Graduation—185 plus 12 hours Military or Physical Training. Electives in Junior Year may be arranged to meet requirements of either four-year course.

2. WITH DEGREE OF BACHELOR OF SCIENCE. (Four-Year Scientific Course).

FIRST YEAR					
<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Pharmacy 1	5	Pharmacy 2	5	Pharmacy 3	5
Chemistry 8	5	Chemistry 9	5	Chemistry 10	5
Physiology 7	5	Botany 13	5	Botany 14	4
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Pharmacy 4	2
				Mil. Sci. or Phys. Ed... 1%	

SECOND YEAR					
Chemistry 37	5	Chemistry 38	5	Chemistry 39	5
Pharmacy 5	5	Pharmacy 6	5	Pharmacy 7	4
Pharmacy 9	2	Pharmacy 10	2	Pharmacy 11	2
English 1	3	Pharmacy 12	3	Pharmacy 13	3
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Pharmacy 15	1
				Mil. Sci. or Phys. Ed... 1%	

THIRD YEAR					
Pharmacy 101	2	Pharmacy 102	2	Pharmacy 103	2
Pharmacy 117	2	Pharmacy 118	2	Bacteriology 5	4
Pharmacy 109	2	Pharmacy 110	2		
Language (Mod. Foreign) 5		Language (Mod. Foreign) 5		Language (Mod. Foreign) 5	
Laboratory Science ... 4-5		Laboratory Science ... 4-5		Laboratory Science ... 4-5	

FOURTH YEAR					
Language (Mod. Foreign) 5		Language (Mod. Foreign) 5		Approved Elective	5
Physics	5	Physics	5	Approved Elective	5
Laboratory Science ... 4-5		Laboratory Science ... 4-5		Approved Elective	5

The student is required to take 25 hours of one modern foreign language or 30 hours (15 each) if two languages are taken.

The elective work in science may be varied so as to prepare students for : (a) Entrance to colleges of medicine; (b) manufacturing pharmacists and chemists; (c) food and drug chemists; (d) bacteriologists; or (e) physiological chemists.

A total of 180 hours plus two years of military training or physical education (12 credits) are required for graduation.

3. WITH DEGREE OF BACHELOR OF SCIENCE. (Four-Year Combined Scientific and Business Course.)

FIRST YEAR

<i>Autumn Quarter</i>	<i>Credits</i>	<i>Winter Quarter</i>	<i>Credits</i>	<i>Spring Quarter</i>	<i>Credits</i>
Pharmacy 1	5	Pharmacy 2	5	Pharmacy 3	5
Chemistry 8	5	Chemistry 9	5	Chemistry 10	5
Physiology 7	5	Botany 13	5	Botany 14	4
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Pharmacy 4	2
				Mil. Sci. or Phys. Ed... 1%	

SECOND YEAR

Chemistry 37	5	Chemistry 38	5	Chemistry 39	5
Pharmacy 5	5	Pharmacy 6	5	Pharmacy 7	4
Pharmacy 9	2	Pharmacy 10	2	Pharmacy 11	2
English 1	3	Pharmacy 12	3	Pharmacy 13	3
Mil. Sci. or Phys. Ed... 1%		Mil. Sci. or Phys. Ed... 1%		Pharmacy 15	1
				Mil. Sci. or Phys. Ed... 1%	

THIRD YEAR

Pharmacy 101	2	Pharmacy 102	2	Pharmacy 103	2
Pharmacy 117	2	Pharmacy 118	2	Bacteriology 5	4
Pharmacy 109	2	Pharmacy 110	2		
Psychology 1	5	Economics 1	5	Approved Elective	5
Business Admin. 54... 3		Business Admin. 55... 3		Business Admin. 56... 3	
Pharmacy 125	1	Pharmacy 126	1	Pharmacy 127	1

FOURTH YEAR

Bus. Admin. 11 (Acc'tg.) 5	Bus. Admin. 12 (Acc'tg.) 5	Approved Elective	5
Bus. Ad. 137 (Advertis'g) 3	Bus. Ad. 138 (Advertis'g) 3	Bus. Ad. 139 (Advertis'g) 3	
Bus. Administration 71.. 3	Bus. Administration 72.. 3	Bus. Administration 73.. 3	
Approved Elective	Approved Elective	Approved Elective	4
Total scholastic hours for Graduation 180 plus 12 hours in	Military or Physical Training.		

4. WITH DEGREE OF MASTER OF SCIENCE IN PHARMACY. (Five-Year Course).

Graduates of the four-year course may continue work for the master's degree as follows:

Not more than 22 credits allowed outside of the department of pharmacy. Election may be made in one or more of the following studies: Bacteriology, 8 to 22 credits; botany, 4 to 22 credits; physics, 10 to 22 credits; chemistry, 5 to 22 credits; zoology, 4 to 12 credits.

Not less than 23 credits shall be elected in the department of pharmacy. At least 12 credits of the major work must be a research problem and the preparation of a thesis. Examination and thesis must conform to the regulations of the Graduate School.

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index).

GRADUATE SCHOOL

THE FACULTY

- HENRY SUZZALLO, PH. D. (Columbia), LL. D. (California), PRESIDENT.
JOHN THOMAS CONDON, LL. M. (Northwestern), DEAN OF FACULTIES.
FREDERICK MORGAN PADELFORD, PH. D. (Yale), Professor of English; DEAN.
HENRY LANDES, A. M. (Harvard), Professor of Geology and Mineralogy; Dean of the College of Science.
EDMOND STEPHEN MEANY, M. L. (Wisconsin), Professor of History.
J. ALLEN SMITH, PH. D. (Michigan), Professor of Political Science.
CAROLINE HAVEN ORER, Professor of Spanish.
TREVOR KINCAID, A. M. (Washington), Professor of Zoology.
MILNOR ROBERTS, A. B. (Stanford), Professor of Mining Engineering and Metallurgy; Dean of the College of Mines.
FREDERICK ARTHUR OSBORN, PH. D. (Michigan), Professor of Physics; Director of Physical Laboratories.
WILLIAM SAVERY, PH. D. (Harvard), Professor of Philosophy.
DAVID THOMSON, B. A. (Toronto), Professor of Latin; Dean of the College of Liberal Arts.
CHARLES WILLIS JOHNSON, PH. D. (Michigan), Professor of Pharmaceutical Chemistry; Dean of the College of Pharmacy.
PIERRE JOSEPH FREIN, PH. D. (Johns Hopkins), Professor of French.
THEODORE CHRISTIAN FRYE, PH. D. (Chicago), Professor of Botany.
ROBERT EDOUARD MORITZ, PH. D. (Nebraska), PH. N. D. (Strassburg), Professor of Mathematics.
CARL EDWARD MAGNUSSON, E. E. (Minnesota), PH. D. (Wisconsin), Professor of Electrical Engineering; Dean of the College of Engineering.
EVERETT OWEN EASTWOOD, C. E., M. A. (Virginia), S. B. (Massachusetts Institute of Technology), Professor of Mechanical Engineering.
WILLIAM ELMER HENRY, A. M. (Indiana), Librarian and Director of the Library School.
HERBERT HENRY GOWEN, D. D. (Whitman), F. R. G. S., F. R. S. A., Professor of Oriental History, Literature and Institutions.
OLIVER HUNTINGTON RICHARDSON, PH. D. (Heidelberg), Professor of European History.
CHARLES CHURCH MORE, M. S., C. E. (Lafayette), M. C. E. (Cornell), Professor of Civil Engineering.
HENRY KRETZER BENSON, PH. D. (Columbia), Professor of Chemical Engineering.
JOHN WEINZIRL, PH. D. (Wisconsin), Professor of Bacteriology.
HUGO WINKENWERDER, M. F. (Yale), Professor of Forestry; Dean of the College of Forestry.
VERNON LOUIS PARRINGTON, A. B. (Harvard), A. M. (Emporia), Professor of English.
FREDERICK ELMER BOLTON, PH. D. (Clark), Professor of Education; Dean of the College of Education.
EDWIN JOHN VICKNER, PH. D. (Minnesota), Professor of Scandinavian Languages.
EFFIE ISABEL RAITT, B. S. (Columbia), Professor of Home Economics.
WILLIAM FRANKLIN ALLISON, B. S., C. E. (Cornell), Professor of Municipal and Highway Engineering.
STEVENSON SMITH, PH. D. (Pennsylvania), Professor of Psychology.
ALLEN ROGERS BENHAM, PH. D. (Yale), Professor of English.
STEPHEN IVAN MILLER, JR., A. B. (Stanford), LL. B. (Michigan), Professor of Economics; Dean of the College of Business Administration.
FRED CARLETON AYER, PH. D., (Chicago), Professor of Education.
WILLIAM MAURICE DEHN, PH. D. (Illinois), Professor of Chemistry.
HOWARD WOOLSTON, PH. D., (Columbia), Professor of Sociology.

MATTHEW LYLE SPENCER, PH. D. (Chicago), Professor of Journalism; Director of the School of Journalism.

GEORGE MCPHAIL SMITH, PH. D. (Freiburg), Professor of Inorganic Chemistry.

THOMAS LATIMER KIBLER, PH. D. (George Washington University), Professor of Transportation.

HOWARD THOMPSON LEWIS, A. M. (Wisconsin), Professor of Business Administration.

BURT PERSONS KIRKLAND, A. B. (Cornell), Professor of Forestry.

THOMAS KAY SIDBY, PH. D. (Chicago), Associate Professor of Latin and Greek.

EDWARD MCMAHON, A. M. (Wisconsin), Associate Professor of American History.

GEORGE SAMUEL WILSON, B. S. (Nebraska), Associate Professor of Mechanical Engineering.

GEORGE WALLACE UMPHREY, PH. D. (Harvard), Associate Professor of Spanish.

OTTO PATZER, PH. D., (Wisconsin), Associate Professor of French.

CHARLES WILLIAM HARRIS, C. E. (Cornell), Associate Professor of Civil Engineering.

VANDERVEER CUSTIS, PH. D. (Harvard), Associate Professor of Economics.

EDGAR ALLEN LOEW, B. S. (E. E.) (Wisconsin), Associate Professor of Electrical Engineering.

JOSEPH DANIELS, M. S. (Lehigh), Associate Professor of Mining Engineering and Metallurgy.

CHARLES EDWIN WEAVER, PH. D. (California), Associate Professor of Geology.

HENRY LOUIS BRAKEL, PH. D. (Cornell), Associate Professor of Engineering Physics.

GEORGE BURTON RIGG, PH. D., (Chicago), Associate Professor of Botany.

JOHN LOOKE WORCESTER, M. D. (Birmingham School of Medicine), Associate Professor of Anatomy.

ARTHUR MELVIN WINSLOW, PH. B. (Brown), B. S. (Massachusetts Institute of Technology), Associate Professor of Mechanical Engineering.

RODERICK DUNCAN MCKENZIE, PH. D. (Chicago), Associate Professor of Sociology.

ELIAS TREAT CLARK, M. F. (Yale), Associate Professor of Forestry.

ROBERT MAX GARRETT, PH. D. (Munich), Associate Professor of English.

FRIEDRICH KURT KIRSTEN, B. S. (E. E.) (Washington), Associate Professor of Electrical Engineering.

ERIC TEMPLE BELL, PH. D. (Columbia), Associate Professor of Mathematics.

ROY MARTIN WINGER, PH. D. (Johns Hopkins), Associate Professor of Mathematics.

EDWIN JAMES SAUNDERS, A. M. (Harvard), Assistant Professor of Geology.

ELI VICTOR SMITH, PH. D. (Northwestern), Assistant Professor of Zoology.

CLARENCE RAYMOND COREY, E. M. (Montana State School of Mines), A. M. (Columbia), Assistant Professor of Mining Engineering and Metallurgy.

ERNEST OTTO ECKELMAN, PH. D. (Heidelberg), Assistant Professor of German.

JOHN WILLIAM HOTSON, PH. D. (Harvard), Assistant Professor of Botany.

LEWIS IRVING NEIKIRK, PH. D. (Pennsylvania), Assistant Professor of Mathematics.

SAMUEL HERBERT ANDERSON, PH. D. (Illinois), Assistant Professor of Physics.

CURT JOHN DUCASSE, PH. D. (Harvard), Assistant Professor of Philosophy.

BROD LEONARD GRONDAL, M. S. F. (Washington), Assistant Professor of Forestry.

FRED H. HEATH, PH. D. (Yale), Assistant Professor of Chemistry.

LESLIE FOREST CURTIS, B. E. (Tufts), Assistant Professor of Electrical Engineering.

EDWIN RAY GUTHRIE, PH. D. (Pennsylvania), Assistant Professor of Psychology.

HEWITT WILSON, Cert. Eng'r. (Ohio State University), Assistant Professor of Ceramics.

CURTIS TALMAGE WILLIAMS, PH. D. (Clark), Assistant Professor of Education.

MARTHA KOEHNE, A. M. (Ohio), Assistant Professor of Home Economics.

RALPH MASON BLAKE, PH. D. (Harvard), Instructor in Philosophy.

LESLIE SPIER, PH. D. (Columbia), Assistant Professor of Anthropology.

GRADUATE COUNCIL: DEAN PADOLFORD, Chairman; DEANS CONDON, THOMSON, ROBERTS and MAGNUSSON; PROFESSORS MEANY, OSBORN, FRYE, MORITZ, DEHN, WOOLSTON, CUSTIS, WEAVER, and WILLIAMS.

GENERAL STATEMENT

SPECIAL NOTE.—For detailed information concerning special facilities for graduate work in the various departments, consult the bulletin issued by the Graduate School.

The Aims of Graduate Study.—The principal aims of graduate study are the development of intellectual independence through the cultivation of the scientific attitude of mind, and the promotion of the spirit of research. The graduate student is therefore thrown more largely upon his own resources than the undergraduate, and must measure up to a more severe standard. The University is consistently increasing the emphasis upon graduate work in order that it may be a strong center for advanced study.

Organization.—The Graduate School was formally organized in May, 1911. The graduate faculty includes:

1. All heads of departments which offer graduate work to major students and all full professors in such departments.
2. All associate professors, assistant professors and instructors offering graduate work for major students; provided no department shall have more than four representatives. If more than that number are eligible, the departmental representatives below the rank of full professor shall be elected by the members of the department.

Fees.—Graduate students pay a tuition fee of \$15 per quarter for the autumn, winter and spring quarters, if residents of the State of Washington or of Alaska, or \$50 per quarter for each of these quarters if non-residents. The regular fee for the summer quarter is \$20 for students working at the University; \$15, including a \$3 laboratory fee, for students working at the Biological Station.

Members of the staff on a full-time teaching schedule are relieved of all tuition. Teaching fellows, graduate scholars—formerly known as graduate assistants and graduate readers,—and non-instructional employees of the University pay a tuition fee of one dollar per quarter for each credit hour on the election blank.

The incidental fees, such as library and laboratory fees, are required from all who receive graduate instruction.

GRADUATE FELLOWSHIPS AND SCHOLARSHIPS

Loretta Denny Fellowships.—Three fellowships, of \$500 each, open to graduate students in any department of the University. Awarded by the faculty on the basis of scholastic excellence and general merit, but only to those who need financial assistance. Applications for these fellowships should be made on blanks supplied by the dean of the Graduate School, and must be in his hands on or before March 15 preceding the academic year for which the fellowships are to be granted.

Arthur A. Denny Fellowships.—Six fellowships of \$500 each, open to graduate students in the departments of civil engineering, education, English, history, mining engineering, and pharmacy respectively. Awarded by the departments concerned on the basis of scholastic excellence and general merit, but only to those who need financial assistance. Applicants must be residents of the state of Washington. Applications for these fellowships should be made to the heads of the departments concerned on blanks supplied by them, and must be in their hands on or before March 15 preceding the academic year for which the fellowships are to be granted.

National Research Fellowships.—Fellowships in physics and chemistry, offered by the National Research Council, are open to promising research students, preferably those who have already taken the doctor's degree. A successful candidate can pursue his research at this University. The salary will ordinarily be \$1500 for the first year. Fellows are eligible for successive reappointments, ordinarily with increase of salary.

University Honorary Fellowships.—Three honorary fellowships have been established by the University. These, like the Loretta Denny fellowships, are open to students in any department of the University. They carry no stipend, and are designed to furnish recognition of exceptional scholastic excellence in the case of graduate students who are not eligible for the Loretta Denny or the Arthur A. Denny fellowships, either because they do not need financial assistance or because they are not giving their entire time to their work in the University.

University Teaching Fellowships.—There are also a number of teaching fellowships yielding \$540 each. Teaching fellows are expected to give about half time to such work as the head of the department may assign. An applicant for a teaching fellowship should apply directly to the head of the department in which he is interested.

Research Fellowships in Mining and Metallurgy.—The College of Mines of the University in cooperation with the United States Bureau of Mines offers four fellowships in mining and metallurgical research. The fellowships are open to graduates of universities and technical schools who are properly qualified to undertake research work. The value of each fellowship is \$900 per year of twelve months. Fellowship holders are required to register as graduate students and to become candidates for the degree of master of science in mining engineering or metallurgy, unless an equivalent degree has previously been earned. Applications are due not later than May 15, and should be addressed to the Dean, College of Mines, University of Washington, Seattle, Washington.

Du Pont Fellowship.—Through its chemical department, Du Pont de Nemours & Co. offer a scholarship of \$700 in chemistry, known as the "Du Pont Scholarship," open to a senior student or graduate student in chemistry or chemical engineering.

The Bon Marche Industrial Fellowship.—The Bon Marche of Seattle offers an annual fellowship of \$600 to a graduate student in Home Economics for research work in textiles. The recipient of this fellowship is required to give one fourth of her time for eleven months to the testing of textiles for the Bon Marche.

Rosenberg Scholarship.—A scholarship of \$200, known as the "Samuel Rosenberg Scholarship, endowed in loving memory by Ella S. Rosenberg, his wife," is open to graduate students in French.

A number of graduate scholarships are open to students who perform service as laboratory assistants, assistants in charge of quiz sections, or readers. The remuneration is proportioned to the service.

ADMISSION

Three classes of students are recognized in the Graduate School:

1. Candidates for the master's degree.
2. Candidates for the doctor's degree.
3. Students not candidates for a degree.

Admission.—A graduate of the University or of any other institution of equal rank, will be given full graduate standing. Before being recognized as a candidate for a degree, however, a student must be approved by a committee appointed by the Dean of the Graduate School, which shall also constitute the advisory committee to oversee the student's subsequent work. Unless the committee are already sufficiently acquainted with the candidate's capacity and attainments, there shall be a conference of the committee and the candidate, the purpose of which is twofold:

(a) To determine whether the student has the quality of mind and the attitude toward advanced work which would justify his going on for an advanced degree.

(b) To satisfy the major and minor departments and the graduate council that the student has the necessary foundation in his proposed major and minor subjects. If he lacks this foundation, he will be required to establish it through undergraduate courses or supervised reading.

If the student is from a college or university which falls below a satisfactory standard in curriculum, efficiency of instruction, equipment, or requirements for graduation, he may be required to take other undergraduate courses in addition to those required as a foundation in the major and minor subjects.

After having been approved by his advisory committee, a candidate for a degree must file with the dean of the Graduate School an outline of his proposed work, on a blank provided for that purpose. When it has received the approval of the graduate council and the student has been notified, he will be regarded as a candidate for a degree.

Students on the Staff.—Assistants, associates, or others in the employ of the University are normally permitted to carry three hours of graduate work if full-time employees, and ten to eleven hours if half-time employees. Permission to exceed these hours must be secured from the dean of the Graduate School and the president.

Graduate Study in the Summer.—As the summer offers leisure for advanced study to a large number of teachers, the University lays special emphasis on graduate work during the summer quarter. Graduates of colleges or universities in attendance then are urged to enroll for the strictly graduate courses, as these courses give an opportunity to work with a select group of mature students toward the acquisition of an advanced degree.

Graduate students will enroll with the dean of the Graduate School.

Attendance during three summer quarters will satisfy the residence requirement for the master's degree. A fair amount of credit toward the doctor's degree may also be earned in the summer quarter.

DEGREES

The Doctor's Degree.—Graduate students will be received as candidates for the degree of doctor of philosophy in such departments as are adequately equipped to furnish requisite training. Each department introduces its program of courses with a specific statement of the graduate training that it is prepared to direct, and of the distinctive opportunities that it offers for graduate work. This degree is conferred only on those who have attained proficiency in a chosen field and who have demonstrated their mastery by preparing a thesis which is a positive contribution to knowledge.

The requirements for the degree of doctor of philosophy are as follows:

1. At least three years of graduate work, of which not less than one year must be spent in residence at the University of Washington. If a candidate is otherwise engaged in any regular employment, a correspondingly longer period of study will be required.
2. Completion of courses of study in a major and two minor subjects, the work in the minors to constitute approximately one-third of this work. The marks for graduate students shall be 'passed' or 'failed'. In courses open to undergraduates and graduates, the passing grade for a graduate student shall be "B" or

above if the course is his major subject, "C" or above, if the course is in his minor subject. Before being recognized as a candidate for the degree, a student must be approved by a committee as provided above.

These courses of study cover at least two years of work. The work of the first year is virtually identical with that for the master's degree, and normally the candidate will wish to take this degree incidentally; the work of the second year is of still more advanced character. Not earlier than the end of the second year and at least a year before the time when the candidate expects to take the degree, the major and minor departments, supplemented by a representative from the graduate council, shall submit the candidate to a careful oral and written examination, to determine whether he has the native equipment and the scholarship to warrant him in continuing.

3. The preparation of a thesis, as stated above, embodying the results of independent research. This thesis may properly be initiated in the second year, and should occupy the greater part of the third year. If the thesis is of such a character, or falls in such a department, that it requires library or laboratory facilities beyond the resources of the University, the student will be required to carry on his investigation at some other university, at some large library, or in some special laboratory. This thesis must be approved by a committee appointed by the major department, of which the instructor in charge of the thesis shall be a member, and also by a special committee from the graduate council.

4. Examinations as follows:

The Preliminary Examination.—An oral and written examination, covering the major and minor subjects. In so far as the examination is oral, it shall be before a committee appointed by the dean of not less than three representatives of the major department, not less than one representative of each of the minor departments, and a representative of the graduate council. The preliminary examination will normally be taken not less than two quarters before the final examination.

The Final Examination.—An oral, or oral and written examination, covering the work of the candidates, and especially that part of it in which the thesis falls. The examination shall be given by a committee appointed by the dean including, so far as feasible, all of the instructors with whom the student has worked and a representative of the graduate council. If there is division of opinion in the committee in charge of either examination, the case shall be decided by the graduate council, with right of appeal to the graduate faculty.

5. Evidence of a reading knowledge of scientific French and German and of such other languages as individual departments may

require. Such evidence must be filed with the dean and approved by him at least one academic year before the degree is granted. Only in rare cases shall the requirement of a reading knowledge of scientific French and German be waived and then only when, in the judgment of the council, substitutions for either or both of these languages will be to the advantage of the student's training.

6. One copy of the thesis in typewritten form (or library hand) shall be bound at the expense of the candidate and deposited with the librarian for permanent preservation in the University archives, at least four weeks before the date on which the candidate expects to take the degree.

The thesis, or such parts thereof, or such a digest as may be designated by the council, shall be printed. The candidate shall contribute \$100 to a fund for printing of theses, whether his thesis appears in the University series or elsewhere. From this fund the library is provided with 150 copies and the candidate with 50 copies.

7. A card certifying that all courses and examinations have been passed and that the thesis has been accepted and properly filed in the library, shall be presented to the dean at least one week before graduation. This card must bear the signatures of all major and minor instructors in charge of the student's work, of the committee appointed by the major department to pass on the thesis, and of the librarian or his appointed representative.

THE MASTER'S DEGREE

Master of Arts.—The degree of master of arts implies advanced liberal training in some humanistic field, gained through intensive study of one of the liberal arts supplemented by study in one or two supporting subjects. This detailed study culminates in a thesis which, if not an actual contribution to knowledge, is concerned with the organization and interpretation of the materials of learning. Creative work of a high quality may be offered in lieu of a thesis.

Master of Science.—The degree of master of science implies training similar to the above in some province of the physical or biological sciences. The thesis for this degree, however, must be an actual contribution to knowledge.

The requirements for the degrees and master of arts and master of science are as follows:

1. At least three full quarters or their equivalent spent in undivided pursuit of advanced study. If a candidate has done graduate work elsewhere, his program may be slightly less exacting, but this work must pass review in the the examination, and shall not reduce the residence requirement at this University.

2. Completion of courses of study in a major and one or two minor subjects, the whole to total not less than 36 hours, of which 24 are normally in the major.

The requirements of a minor or minors may be waived, but only on recommendation of the head of the major department and with the consent of the graduate council.

No work in the major subject may be counted toward the master's degree until the candidate has complied with the departmental requirements as to previous work in that subject, which in no case shall be less than eighteen hours.

Elementary or lower division courses may not count toward the minor requirement, and teachers' courses may not count toward either the major or minor requirement.

3. The preparation of a thesis, as defined above.

4. An oral, or written, or an oral and written examination, given by a committee appointed by the head of the major department, including so far as feasible, all the instructors with whom the student has worked. If division of opinion exists among the examiners, the case shall be decided by the graduate council, with right of appeal to the graduate faculty.

5. The candidate's thesis shall be in charge of the instructor in whose field the subject falls, and it must be approved by a committee of the major department, of which the instructor in charge shall be a member. If the committee is divided in opinion, the case shall be decided by the graduate council, with right of appeal to the graduate faculty. At least two weeks before the date on which the candidate expects to take the degree, one copy of the thesis in typewritten form or printed form (or library hand, in case the thesis is of such character that it cannot be typewritten) shall be deposited with the librarian for permanent preservation in the University archives. The thesis must meet the approval of the librarian as to form, and the cost of binding must be deposited with the thesis.

6. A card certifying that all courses and examinations have been passed, and that the thesis has been accepted and properly filed in the library, shall be presented to the dean at least one week before graduation. This card must bear the signatures of all instructors in charge of the student's work, of the instructor in charge of the thesis, and of the librarian or his appointed representative.

Master of Science in Technical Subjects.—The degree of master of science is given in technical subjects as follows:

- Master of Science in Chemical Engineering
- Master of Science in Civil Engineering
- Master of Science in Electrical Engineering
- Master of Science in Mechanical Engineering.
- Master of Science in Ceramics
- Master of Science in Coal Mining Engineering

Master of Science in Geology and Mining.
Master of Science in Metallurgical Engineering
Master of Science in Mining Engineering
Master of Science in Forestry
Master of Science in Fisheries
Master of Science in Pharmacy

The requirements for these degrees are essentially the same as those for the degrees of master of arts and master of science.

Master's Degrees in Technical Subjects.—master of forestry; master of business administration.

The requirements for these degrees are essentially the same as those for the degrees of master of arts and master of science, with the exception that all the work may be in the major.

PROFESSIONAL DEGREES

Professional Degrees.—The professional degrees of chemical engineer, civil engineer, electrical engineer, mechanical engineer, metallurgical engineer and engineer of mines may be conferred in three years on those who hold the bachelor of science degree in their respective lines from the University of Washington, who give evidence of having engaged continuously in acceptable engineering work and who present satisfactory theses.

COURSES

For description of courses, see Departments of Instruction, printed elsewhere in this catalogue. (See Index).

DEPARTMENTS OF INSTRUCTION

The University reserves the right to withdraw temporarily any course which has not an adequate enrollment at the end of the sixth day of any quarter. For changes in registration, due to the withdrawal of a course, no fee will be charged.

Courses bearing numbers 1 to 99 inclusive are normally offered to freshmen and sophomores; those from 100 to 199, to juniors and seniors, and those from 200 upward to graduate students.

Two or three numbers connected by hyphens indicate a course which ordinarily carries credit only when pursued for the full time; the instructor's permission must be obtained for credit for only a single quarter of such a course. No credit in a beginning foreign language is given for less than two quarters' work.

The credit indicated in connection with each course is the "quarter credit," being based on the class periods per week.

The descriptions of courses in each department include: (1) the number of the course as used in university records; (2) the title of the course; (3) a brief statement of its subject matter and method; (4) number of quarter credits given; (5) quarter in which it is given (autumn, winter, spring, summer); (6) name of instructor.

Courses preceded by a * are not given in 1921-1922.

AERONAUTICAL ENGINEERING

Engineering Hall

101. *Aerodynamics*.—Use of the wind tunnel in the determination of the characteristics of aerofoils; selection of aerofoils for a given purpose. Prerequisite, junior standing. Three credits.

111. *Aerial Propellers*.—A study of the theory and design of airscrews including a review of the methods of calculating thrust and efficiency. Prerequisite, junior standing. Three credits.

121. *Airplane Design*.—Selection of the type and construction of an airplane for a given purpose; computation and of performance from aerodynamic data; design of flying boats and seaplanes; the distribution of weights and the proportioning of parts. Prerequisite, A. E. 101. Three credits.

141. *Airships*.—Aerostatics, including a study of lighter-than-air machines. Prerequisite, A. E. 101, 121. Three credits.

161. *Aerial Transportation*.—The design and layout of landing fields and aircraft terminals. Aerial transportation as an industrial factor and as an instrument of warfare. Prerequisite, A. E. 111, 121, 141. Three credits.

ANATOMY

Science Hall and Anatomy Laboratory

ASSOCIATE PROFESSOR WORCESTER

GROSS ANATOMY

101-102-103. *General Human Anatomy*.—A thorough study of the human body. The dissecting material is prepared after the most modern methods. Osteological collections are loaned to the students. Especially intended for students taking the pre-medical, nurses' or physical education courses, but open to others. Prerequisite, Zool 3 and 4 or their equivalent. Six credits per quarter; autumn, winter, spring. Worcester

104. *Topographic Anatomy*.—Cross and saggittal sections for correlation. Prerequisites, courses 101-102-103. Four credits; autumn, winter, spring. Worcester

108. *Special Dissections*.—For physicians or students who have completed the above courses in gross anatomy. Hours and credits to be arranged; autumn, winter, spring. Worcester

MICROSCOPIC ANATOMY

105-106. *Histology and Embryology*.—The microscopic anatomy of developing and adult mammals studied both in their fresh

and fixed conditions. Especially for students in pre-medical and nurses' courses but open to others. Prerequisite, Zool 3 and 4 or their equivalent. Six credits per quarter; autumn, winter.

Worcester

107. *Neurology*.—The dissection of the human brain and cord and special organs of sense, also the comparative developmental history of the central nervous system, followed by a microscopic study of the nuclei and fiber tracts. Prerequisites, courses 105 and 106 or their equivalents. Especially for pre-medical students but open to others. Six credits per quarter; spring.

Worcester

200. *Research*.—Graduate and research work in anatomy for those qualified. Credits and time arranged; autumn, winter, spring.

Worcester

ARCHITECTURE

Architecture Building

ASSOCIATE PROFESSOR GOULD; INSTRUCTORS, MCCLELLAND, SEXSMITH

A student should have some previous training in free hand drawing and he will be required to confer with the head of the department as to his special qualifications for taking the subject. It is desirable that a student have credits in plane geometry, algebra through quadratics, trigonometry, physics, and at least two years of modern language. Forty hours of modern language will be required before graduation. Twenty hours are provided for in the curriculum.

1-2. *History and Elements of Architecture*.—Illustrated lectures giving an historic survey of domestic architecture. Exercises given in drawing the simpler elements of buildings. Excursions to buildings and building supply companies. Two credits per quarter; autumn, winter.

Gould

3. *History and Elements of Architecture*.—General survey of the important periods of architectural history studied, wherever possible, in terms of present-day conditions. Two credits; spring.

Gould

4-5-6. *Architectural Drawing*.—Presentation of problems in architectural drawing based on the Greek and Roman Orders. Studies in plan, elevation, and section. Three credits per quarter; autumn, winter; spring.

Sexsmith

7. *Descriptive Geometry*.—Theoretical and practical problems. Orthographic projection. Emphasis on draftsmanship. Two credits per quarter; autumn.

Sexsmith

8. *Shades and Shadows*.—Construction by descriptive geometry of shades and shadows found in architectural renderings. Pre-

requisite, Arch. 7. Two three-hour laboratory periods per week. Two credits; winter. Sexsmith

9. *Perspective Drawing*.—The theory of architectural perspective from simple problems in single point perspective up to and including the more complicated problems. Office methods and short-cut methods will be studied and compared with the theory. Two three-hour laboratory periods. Prerequisite, Arch. 7. Two credits; spring.

10-11-12. *Free-hand Drawing*.—The fundamentals of free-hand drawing and free-hand perspective. Drawing in charcoal or crayon from cast or architectural ornament and from still life. One credit per quarter; autumn, winter, spring. McClelland

13-14-15. *Dimension Drawing*.—Fundamentals of draftsmanship; orthographic projection, shades and shadows, perspective, brief study of the classic orders and mouldings. Majors in Painting, Sculpture and Design. Two credits per quarter; autumn, winter, spring. Sexsmith

47-48. *Statics*.—Analysis of fundamental structural problems by application of the laws of equilibrium. Five credits per quarter; autumn and winter. Sexsmith

51. *History and Elements of Architecture*.—Egyptian—Greek—Roman. Two credits per quarter; autumn. Gould

52. *History and Elements of Architecture*.—Byzantine—Romanesque—Gothic. Two credits per quarter; winter, spring. Gould

53. *History and Elements of Architecture*.—Principals of design in terms of structural elements. Study and theory of planning. Two credits; spring. Gould and staff

54-55-56. *Architectural Design*.—Problems in design and planning. Society of Beaux Arts Architects program will be used and work sent to New York City for judgment in competition with work from leading architectural schools. Laboratory fee, \$2. Five credits per quarter; autumn, winter, spring. Gould

60-61-62. *Building Construction and Inspection*.—Lectures on building construction methods. Full size and large scale studies of detail. Inspection trips. Two credits per quarter; autumn, winter, spring. McClelland

72. *Modeling*.—Studies in clay of architectural ornament. One credit; autumn. Wehn

73-74. *Free-hand Drawing*.—Studies of architectural ornament and cast of the human figure. One credit per quarter; winter, spring. McClelland

101-102-103. *History of Architecture*.—The Renaissance. A comparative study of the period in Italy, France and England. Two credits per quarter; autumn, winter, spring. McClelland

104-105-106. *Architectural Design*.—Advanced problems in ornamental design and planning as applied to different materials. Laboratory fee, \$2. Five credits per quarter; autumn, winter spring. McClelland

112. *Modeling*.—Design of simple architectural forms. One credit; autumn. Wehn

113-114. *Water Color*.—Still life studies, out-door subjects and architectural rendering. One credit per quarter; autumn, spring. McClelland

115. *Sanitation and Plumbing*.—Methods of sewage disposal and water supply in modern buildings; modern appliances and office practice; specifications. Two credits; autumn. Sexsmith

117. *Specifications and Office Practice*.—Two credits per quarter; winter. Sexsmith

151-152-153. *History of Architecture*.—Modern architecture; city and industrial planning. Prerequisite Arch. 103. Two credits per quarter; autumn, winter, spring. Gould

154-155-156. *Architectural Design*.—Beaux Arts Class A projects first two quarters; third quarter, thesis. Laboratory fee \$2. Five credits per quarter; autumn, winter, spring. McClelland

157-158-159. *Free-hand Drawing*.—Studies from life. Not offered 1921-1922, substitute Painting, Sculpture and Design 5-6-7, Section A. Three credits per quarter; autumn, winter, spring.

166-167-168. *Art Appreciation*.—A survey of the history of art, principles of composition and arrangement. Not offered 1921-1922, substitute Painting, Sculpture and Design 16-17-18. One credit per quarter; autumn, winter, spring.

ASTRONOMY

The Observatory

Owing to Professor Boothroyd's resignation and the necessity on the part of the University to curtail expenses wherever possible, only courses 1 and 2 will be offered for the year, all other courses being temporarily suspended.

The work in astronomy is planned for two classes of students:

(a) Those who desire some knowledge of astronomy as a part of a liberal education; (b) engineers and navigators who need some knowledge of the science as a part of their technical training.

In the College of Science, courses 11 and 12 satisfy the science requirements.

In the College of Liberal Arts, courses 11 and 131 are recommended for those electing astronomy for the science requirement. Those who want only five hours may take courses 11 or 1, 2 and 31.

1. Introduction to Astronomy.—Lectures illustrated by planetarium lantern slides and by views of the more interesting of the heavenly bodies with the equatorial telescope. Use of charts in the study of the sky with the unaided eye. Open to all students of the University. Laboratory deposit, \$1. One credit; autumn, winter, spring.

2. Elements of Astronomy.—A brief descriptive course designed to give clear ideas regarding our place in the universe, the succession of the seasons, tidal phenomena, phases of the moon, etc., as well as some conception of the scope of astronomy and a clear idea of the scientific method. Two credits; autumn, winter, spring.

**11. The Solar System.*—Observation and study of the real and apparent motions of the various bodies which make up the Solar System. Study of the fundamental principles of mechanics which are revealed through the science of astronomy. Five recitations and laboratory periods per week and three laboratory periods to be arranged. Laboratory deposit, \$1. Five credits; autumn, winter.

**112. The Sun and Stars.*—Prerequisite, course 11 and at least high school physics. Five recitations periods per weeks. Five credits; spring.

**123. Nautical Astronomy.*—Actual determination of time, latitude and azimuth from observations made by the student with the sextant. Prerequisites, Math. 52 and course 1 or the equivalents. Laboratory deposit, \$2. Two laboratory periods per week. Two credits; autumn.

**131. History of Astronomy.*—An exposition of the scientific method as illustrated by the progress of astronomy. Prerequisites, course 11 or 2, Physics 47, 48, 49 or equivalent. Two lecture and recitation periods per week. Two credits; spring.

**171. Engineering Astronomy.*—Actual determination of time, latitude and azimuth from observations made on the sun and stars by the student with the surveyor's transit. Prerequisite. Math. 52, C. E. 21, and must be preceded or accompanied by course 1 or its equivalent. Two laboratory hours per week. Two credits; autumn. Laboratory fee, \$2.

*Not offered in 1921-1922.

*172. *Geodetic Astronomy*.—The precise determination of time, latitude and azimuth. Prerequisites, course 171, Math. 62. Ten hours laboratory work per week. Five credits; winter. Laboratory deposit, \$5.

BACTERIOLOGY AND PATHOLOGY

Science Hall

PROFESSOR WEINZIRL; ASSISTANT PROFESSOR NICKSON;
ASSISTANT MISS STARR

With the exception of general bacteriology all the courses offered are applied in one of the following fields: (a) medicine; (b) sanitation; (c) industry. Laboratory work forms an important part of all courses.

SUGGESTED ELECTIONS

For majors in bacteriology:

Sophomore year	101, 102, 103
Junior year	201, 202, 203
Senior year	210, 211, 212
	213, 214, 215

For pre-medical students and nurses: 103, 104, 105
110 111, 112

For home economics students 101, 102, 103

For fisheries students 101, 102, 103

For pharmacists and engineers 5 or 101

For graduates: All courses above 100

4. *S. C. Fisheries*.—A brief study is made of the technique of handling bacteria. Most of the time is given to the bacteriology of fermentation, putrefaction, sterilization, sanitation, and canning. Laboratory deposit, \$3. winter. Weinzirl

5. *Pharmacy Bacteriology*.—A general course with emphasis upon pharmaceutical problems such as sterilization, disinfectants, and biological products. Prerequisite, sophomore standing and general chemistry. Laboratory deposit, \$3. Four credits; spring.

Weinzirl and Assistant

101. *General Bacteriology*.—Technique in growing and examining bacteria, their structure, functions and distribution; identification of species; study of common disease bacteria. Prerequisite, junior standing except for bacteriology majors. A knowledge of biology and general chemistry is desirable. Laboratory deposit, \$3. Five credits; autumn, summer. Weinzirl and Assistant

102. *Sanitary Bacteriology*.—Consideration of water supplies and sewage disposal; milk, meat and other foods; certain industrial applications; inspection trips. Prerequisite, Bact. 101. Laboratory deposit, \$3. Five credits; winter, summer. Weinzirl and Assistant

103. *Public Hygiene*.—The conservation of health; prevention of diseases; school hygiene; industrial hygiene, etc. Prerequisite, junior standing except for bacteriology majors. Two or four credits, lectures only, spring quarter. Weinzirl

104. *Medical Bacteriology*.—The technique and principles of general bacteriology; identification of species; theories of infectious disease and immunity. Prerequisites, general chemistry, histology, and junior standing. Laboratory deposit, \$3. Four credits; autumn. Weinzirl and Assistant

105. *Infectious Diseases*.—A detailed study of the pathogenic bacteria, and methods for the diagnosis of infectious diseases. Prerequisite, course 104. Laboratory deposit, \$3. Four credits; winter. Weinzirl and Assistant

110. *Pathology*.—A gross and microscopic study of tumors. Class limited to ten students. Prerequisites, course 101, Anatomy 105. Laboratory deposit, \$4. Three credits; autumn. Nickson

111. *Pathology*.—A gross and microscopic study of inflammation and degeneration. Prerequisite, course 110. Laboratory deposit, \$4. Three credits; winter. Nickson

112. *Pathology*.—Pathology applied to the systems of the body. Prerequisite, course 111. Laboratory deposit, \$4. Three credits; spring. Nickson

GRADUATE COURSES

201. *Serology*.—A consideration of the types of immunity; immunization of animals and man; study of immune products. Prerequisite, courses 5, 102 or 105, and senior or graduate standing. Laboratory deposit, \$4. Four credits; autumn. Weinzirl

202. *Bacteriological Diagnosis*.—The diagnosis of infectious diseases. Intended for those specializing in bacteriology. Prerequisite course 102. Laboratory deposit, \$4. Four credits; winter quarter. Weinzirl

203. *Clinical Diagnosis*.—The examination of sputum, urine, blood, gastric and intestinal contents, parasites, etc. Prerequisite, 105, or 102 and 103. Laboratory deposit, \$4. Four credits; spring. Weinzirl

204-205-206. *Advanced Bacteriology*.—The student may pursue work along the following lines: 1. technique; 2. physiology; 3. enzymes; 4. special groups of bacteria; 5. analysis; 6. diagnosis; 7. serology; 8. other topics on consultation. Not more than two topics may be taken during any one quarter. Laboratory work, written reports and conferences. Prerequisite, graduate standing. Laboratory deposit, \$4. Five credits; autumn, winter, spring.

Weinzirl and Assistants

207-208-209. *Applied Bacteriology*.—By special arrangement the student may spend not less than 18 hours per week in the State and City laboratories. The student may do analysis one term, bacterial diagnosis a second term, and complement fixation a third term. Credit will depend upon a satisfactory statement from the director in charge of the laboratory. Prerequisite, graduate standing. Five credits; autumn, winter, spring.

210-211-212. *Seminar*.—A consideration of topics not included in the regular courses; also reports on recent investigations and of research work done by the members. Prerequisite, senior or graduate standing, and course 102 or 105. Two credits per quarter; autumn, winter, spring. Weinzirol

213-214-215. *Research*.—Investigation of assigned problems. Open to qualified students after consultation. Credits and time to be arranged; autumn, winter, spring, summer quarters. Weinzirol

BOTANY

Science Hall

PROFESSOR FRYE; ASSOCIATE PROFESSOR RIGG; ASSISTANT PROFESSOR HOTSON

SUGGESTED SELECTIONS

For the required biological science in the Colleges of Liberal Arts and Science, only courses 1, 2, 3, 11, 12, 105, 106, 107 will be accepted.

For a major: Courses 105, 106, 107, 140, 141, 142, 143, 144, 145 of which 105 and 106 are required unless 11 and 12 were taken in the freshman year.

For teaching botany: 105, 106, 107, 140, 141, 142, 143, 144, 145.

For pharmacy students: 13, 14.

For forestry students: 11, 12, 111, 140, 141, 142.

For fisheries students: 53, 130.

1. *Elementary Botany*.—The structure and functions of roots, stems, leaves and seeds. Only to those who have had no botany in the high school. Five credits; autumn. Riggs and Assistants

2. *Elementary Botany*.—Types of the great groups of plants from the highest to the lowest. Open to students entering the second quarter without any previous botany. Five credits; winter.

Frye and Assistants

3. *Elementary Botany*.—Plant analysis; field work with local flora. Open to students entering the third quarter without any previous botany. Five credits; spring. Frye, Rigg and Assistants

8, 9, 10. *Ecology and Taxonomy*.—For city teachers. Field trips every other Saturday, with noon campfire talks. Laboratory fee, \$. Two or three credits per quarter; autumn, winter and spring quarters. Frye

11-12. *Foresters' Botany*.—A study of types of plants to illustrate the advance in complexity. For forestry students. Prerequisite course 7. Five credits per quarter; winter and spring.

Hotson and Assistant

13-14. *Pharmacy Botany*.—Gross structure of vegetative and reproductive parts of seeds; brief study of spore plants; microscopy of powdered drugs. Five credits, winter; four credits, spring.

Rigg and Assistant

26. *School Garden*.—Prerequisite courses 1, 2, or 10. Five credits; spring quarter.

Hotson

53. *Aquatic Botany*.—A course on the plants of fresh water habitats especially those involved in the study of fishes and their culture. Five credits; spring.

105-106. *Morphology and Evolution*.—A morphological study of types to show advances in complexity. Required for all majors unless courses 11 and 12 were taken in the freshman year. Prerequisite, courses 2 or 10, or Zool. 1 and 2. Sophomore standing, or senior standing without prerequisites. Five credits per quarter; autumn and winter.

Frye and Assistant

107. *Taxonomy*.—The flowering plants. Prerequisite one year high school botany or 10 credits in the University. Five credits; spring.

Frye and Assistant

111. *Forest Pathology*.—The recognition and treatment of common wood-destroying fungi. Prerequisite, courses 10 or 105. Five credits; spring.

Hotson and Assistant

119. *Plant Histology*.—Preparation of slides for the compound microscope. Prerequisite, courses 12 or 106. Three credits; any quarter.

Frye

130. *Economic and Marine Botany*.—Economic marine plants, their condition, the products derived therefrom and the process of manufacture. Prerequisite one year of chemistry and junior standing. Four credits; autumn.

Frye

140-141-142. *General Fungi*.—Morphology and classification of fungi as a basis for plant pathology. Prerequisite, course 11 or 105, junior standing. Five credits per quarter; autumn, winter and spring.

Hotson

143, 144, 145. *Plant Physiology*.—Prerequisite, two quarters of botany and Chem. 21, junior standing. Five credits per quarter; autumn, winter and spring.

Rigg

187. *Journal Club*.—Reviews of articles in current journals, suggested for seniors, graduates and instructors in the department. Prerequisite, junior standing; two years of botany. No credit; each quarter.

Frye

GRADUATE COURSES

200. *Proseminar*.—Semi-independent work by students. Open only on consultation with the head of the department. Credit to be Frye, Rigg, Hotson
233. *Research*.—Credit to be arranged; any quarter. Frye, Rigg, Hotson
250. *Algae*.—Prerequisite, course 11 or 105. Five credits; any quarter. Frye
251. *Bryophytes*.—Prerequisite, course 12 or 106. Five credits; any quarter. Frye
252. *Pteridophytes*.—Prerequisite, course 12 or 106. Five credits; any quarter. Frye
253. *Gymnosperms*.—Prerequisite, course 12 or 107. Five credits; any quarter. Frye
254. *Angiosperms*.—Prerequisite, course 12 or 107. Five credits; any quarter. Frye
- 261, 262, 263. *Plant Pathology*.—A study of the diseases of plants and the fungi which produce them. Prerequisite, course 142. Five credits per quarter; autumn, winter, spring. Hotson
- 271, 272, 273. *Experimental Morphology*.—Prerequisite is course 12 or 106, one year chemistry, graduate standing. Two credits per quarter. Frye
279. *Colloidal Biology*.—Prerequisite, course 143, Chem. 32, senior standing. Five credits; any quarter. Rigg
280. *Micrometabolism*.—Prerequisite, courses 12 or 107, 148 senior standing. Five credits; any quarter. --

CERAMICS

Mines Hall

ASSISTANT PROFESSOR WILSON

90. *Ceramic Materials*.—Origin, occurrence, physical properties and preparation of clays, feldspar, limestone, magnesite, silica, and other materials used in the ceramic industry. Prerequisite, sophomore engineering or mining standing. Three lectures and recitations. Three credits; spring. Wilson
100. *Ceramic Products*.—Principles governing the shaping of structural, refractory and fine ceramic wares. Prerequisite, Ceramics 90. Three lectures. Three credits; autumn. Wilson
101. *Drying and Burning*.—The principles of drying and burning; the operation and control of commercial dryers and kilns. Prerequisite, Ceramics 100. Three lectures and recitations. Three credits; winter. Wilson

102. Ceramic Decoration.—The preparation and characteristics of vapor, natural clay slip, raw lead, bristol, terra cotta, porcelain and fritted glazes, bright and mat, with methods of coloring. Prerequisite, Ceramics 101. Three lectures and recitations. Three credits; spring. Wilson

104, 105. Ceramic Calculations.—The chemistry and physics of preparing, drying and firing ceramic materials. Problems involved in standard methods of testing clays. The blending of raw materials for ceramic bodies and glazes. Prerequisite, Ceramics 90. Three recitations. Three credits; autumn and winter. Wilson

110. Ceramic Physical-Chemical Measurements.—Laboratory testing of clays and other ceramic materials. Determination of fineness of grain, shrinkage, porosity and specific gravity; the study of plasticity, bonding power, vitrification and fusion, chemical purification and action of colloids. Prerequisite, Ceramics 105. Laboratory deposit, \$10 per quarter. Two laboratory periods. Two credits; spring. Wilson

121, 122, 123. Ceramic Products Laboratory.—Laboratory production of structural wares, stoneware, yellow ware, porcelain and refractories. Practice in blending of ceramic materials, molding, drying, firing and glazing ceramic products. Prerequisite, Ceramics 101. Laboratory deposit, \$12 per quarter. Three laboratory periods and two recitations. Five credits per quarter; autumn, winter, and spring. Wilson

125, 126, 127. Ceramic Plant Design.—Design of ceramic plants. Arrangement of machinery and construction of storage bins, dryers and kilns. Prerequisite, Ceramics 101. Two laboratory periods and one recitation. Three credits; autumn, winter, and spring. Wilson

131, 132, 133. Ceramic Thesis.—An original investigation, bearing principally on the ceramic problems of the Pacific Northwest. Laboratory deposit, \$5 to \$10 per quarter. Laboratory and conference. Three credits, autumn and winter; two credits, spring. Wilson

140. Pottery.—Occurrence, winning and preparation of materials used in pottery manufacture. Processes used in molding, drying, firing, glazing, and decorating of pottery. Two lectures and recitations. Two credits; autumn. Wilson

150. Lime, Plasters and Cements.—The raw materials, manufacture and testing of lime, calcined gypsum, sand-lime brick, and Portland cement. Prerequisite, Chem. 3. Three lectures and recitations. Three credits; winter. Wilson

160. *Glass Technology*.—Theory and factory practice of glass manufacture. Prerequisite, Ceramics 105. Two lectures and recitations. Two credits; autumn. Wilson

170. *Metal Enamels*.—Theory and practice of metal enameling. Prerequisite, Ceramics 105. Two lectures and recitations. Two credits; autumn. Wilson

180. *Refractories*.—Origin, occurrence and physical properties of fireclays and other refractory materials. The manufacturing problems of fireclay, silica, magnesite, chromite brick, electric furnace products and special refractories. Prerequisite, junior standing. Two recitations and one laboratory period. Laboratory deposit, \$5. Three credits per quarter; autumn, winter or spring.

191, 192, 193. *General Ceramics*.—Occurrence, winning and preparation of materials used in ceramics. Processes used in preparation of raw materials, shaping, drying and firing of ceramic products. One recitation and two laboratory periods. Laboratory deposit, \$10. Three credits; autumn, winter and spring.

GRADUATE COURSES

221, 222, 223. *Ceramic Resources*.—A study of the ceramic resources of Washington and the Pacific Northwest, or of some particular area in this region. Prerequisite, graduate standing. Hours and credits to be arranged. Wilson

231, 232, 233. *Ceramics Manufacture*.—Studies in the manufacture of clay products, especially the utilization of raw materials found in the Pacific Northwest. Prerequisite, graduate standing. Hours and credits to be arranged. Wilson

CHEMISTRY

Bagley Hall

PROFESSORS BENSON, JOHNSON, DEHN, SMITH, TARTAR; ASSISTANT PROFESSORS HEATH, THOMPSON, LYNN, BARTON; INSTRUCTORS McMILLIN, WHITWELL AND POWELL; ASSOCIATES, RADFORD, WHIPPLE, WOOD, SEMON, DRAVES

The instruction in this department is designed to satisfy, as far as possible, the requirements of those students who desire to study chemistry as a means of culture and as a necessary complement of a liberal education. It is realized that the subject is eminently practical; hence it is the desire of those in charge so to guide the student that he may fit himself for work in those lines in which chemistry has become an applied science.

REQUIREMENTS OF THE DEPARTMENT

Students desiring to specialize in chemistry may select one of the three courses: (1) the elective curriculum designed for those who wish to take a general course in chemistry and leading to the degree of B. S. in the College of Science (see page 74); (2) the suggested curriculum designed for those who intend to make use of

chemistry as a vocation and leading to the degree of B. S. in Chemistry (see page 76); (3) the prescribed curriculum in chemical engineering designed for those who plan to engage in the manufacturing industries and leading to the degree of B. S. in Chemical Engineering (see page 124).

The fee for each laboratory course is \$7.50 per quarter. This deposit covers the general expenses of the laboratories such as gas, water, depreciation, etc. For the purchase of chemicals and apparatus, each student is required to buy a breakage ticket when he obtains his locker key. The cost of this ticket is \$5, of which \$1 is charged for acids and chemicals placed in the laboratory for the convenience of the student. Any unused portion of the breakage ticket will be refunded.

1-2. General Inorganic Chemistry.—Fundamental chemical theory and the chemistry of the non-metallic elements. Open only to students not having had an accredited high school course in chemistry. Three lectures and two laboratory periods per week. Five credits per quarter; any quarter. Smith, Tartar, Thompson

4. General Chemistry.—For short course miners. Three lectures and one four-hour laboratory period per week. No credit; winter. Benson

5-6. General Chemistry.—Open only to women in the departments of home economics and physical education. Three lectures and two laboratory periods per week. Five credits per quarter; winter, spring. Tartar

8-9-10. General Chemistry and Quantitative Analysis.—Open only to students in the College of Pharmacy. The work in the spring quarter is qualitative analysis. Three lectures and two laboratory periods per week. Five credits per quarter; autumn, winter, spring. Lynn

21-22. General Inorganic Chemistry.—Fundamental chemical theory and the chemistry of the non-metallic elements. Open only to students having had an accredited high school course in chemistry. Three lectures and two laboratory periods per week. Five credits per quarter; any quarter. Smith, Tartar, Thompson

23. Elementary Qualitative Analysis.—Two lectures per week deal with the chemistry of the metallic elements. One lecture per week and the entire laboratory time is devoted to qualitative analysis. Prerequisite courses 2, 22 or equivalent. Three lectures and two laboratory periods per week. Five credits; any quarter. credits per quarter; any quarter. Smith, Tarter, Thompson

37-38-39. Organic Pharmaceutical Chemistry.—A study of the organic chemicals of the U. S. Pharmacopoeia. Open only to students in the College of Pharmacy. Prerequisite, course 10 or its equivalent. Three lectures and two laboratory periods per week. Five credits per quarter; autumn, winter, spring. Johnson

51. *Engineering Chemistry*.—An elective for engineering students. The course deals with the chemistry of fuels and construction materials. Two lectures and one laboratory period per week. Prerequisite, course 23. Three credits; autumn. Benson, Whitwell

52. *Chemical Technology*.—A lecture course for chemists and engineers designed to make application of the preceding courses to chemical manufacturing practice. Prerequisites, course 23, physics 97, math. 62. Three lectures. Three credits; spring. Whitwell

53. *Sanitary Chemistry*.—Materials and processes used in the purification of water, sewage, and in sanitation. Two lectures, one laboratory period per week. Prerequisite, course 23. Three credits; autumn. Benson

55. *Forest Products*.—Wood distillation, tanning, wood pulp, alcohol, viscose, vulcanized fibre and wood oils. An elective for students in forestry and chemical engineering. Two lectures and one laboratory period per week. Prerequisite, course 23. Three credits; winter. Benson

56. *Road Materials*.—Bitumens and methods of testing. An elective for students in civil and chemical engineering. One lecture and one laboratory period per week. Prerequisite, course 23. Two credits; spring. Benson

101. *Qualitative Analysis*.—For students of chemistry and chemical engineering. Two lectures and three laboratory periods per week. Prerequisite, course 23 or its equivalent. Five credits; autumn, winter, spring. Thompson

104. *Food Chemistry*.—For students in the department of home economics. Methods of analysis of various foods and federal and state laws studied. Two lectures and two laboratory periods per week. Four credits; spring. Lynn

105-106-107. *Food Chemistry*.—Laboratory and class work in analysis of food products and the study of federal and state laws regulating the sale of food products and drug products. Five credits per quarter; autumn, winter, spring. Lynn

111. *Quantitative Analysis*.—A brief course which deals with both gravimetric and volumetric methods. This course is intended for students in general science. Prerequisite, Chem. 23 or its equivalent. Two lectures and three laboratory periods per week. Five credits; autumn, winter, spring. Heath

112. *Quantitative Analysis*.—A course in gravimetric analysis. Prerequisite, course 23 or its equivalent. Two lectures and three laboratory periods per week. Five credits; autumn, winter, spring. Heath

113. *Quantitative Analysis*.—A course in volumetric analysis. Prerequisite, course 23 or its equivalent. Two lectures and three laboratory periods per week. Five credits; autumn, winter, spring. Heath

114. *Quantitative Analysis*.—An advanced course in quantitative methods. Prerequisite, course 23, and either 112 or 113. Two lectures and three laboratory periods per week. Five credits; spring. Heath

121-122-123. *Industrial Chemistry*.—The first quarter deals with fuels, gases, cements, refractories, iron and steel, and alloys with special reference to technical testing. The second quarter deals with the machinery and processes for the manufacture of acids and alkalis. The third quarter deals with organic industrial chemistry, particularly with the technology of oils, fats, paints, rubber and cellulose products. The work of each quarter may be undertaken independently. Three lectures and two laboratory periods per week. Prerequisite, course 111 or equivalent. Five credits per quarter; autumn, winter, spring. Benson, Whitwell

128-129. *Organic Chemistry*.—Designed for medical, chemical engineering and technical students desiring a briefer course. Prerequisite, course 23 or its equivalent. Three lectures and two laboratory periods per week. Five credits per quarter; winter, spring. Dehn

131-132-133. *Organic Chemistry*.—Designed especially for major students in chemistry and for students in the College of Science. Prerequisite, course 23 or its equivalent. Three lectures and two laboratory periods per week. Five credits; autumn, winter, spring. Dehn

134. *Manufacture of Industrial Organic Chemicals*.—A laboratory course in the preparation of organic chemicals on a semi-commercial scale which may be taken independently or in lieu of the regular laboratory work in course 129 or 133. Two laboratory periods per week. Two credits; spring. Dehn

135-136. *Organic Chemistry*.—For students in the department of home economics. Only women are admitted. Three lectures and two laboratory periods per week. Prerequisite, course 6 or its equivalent. Five credits per quarter; autumn, winter. Powell

141-142. *Physiological Chemistry*.—A general course for students of medicine, biology and bacteriology. Chemical composition of foods, tissues, secretions and excretions, their physiological and pathological changes. Prerequisite, courses 111 or 113 and 233. Three lectures and two laboratory periods. Five credits; autumn, winter. Barton

144. *Physiological Chemistry*.—A brief course for fisheries and other technical students. Prerequisite, course 129 or its equiv-

alent. Two lectures and two laboratory periods per week. Four credits; spring. Barton

146. *Urinary Analysis*.—A study of normal and pathological urine. A course intended for pre-medical students, nurses and clinical technicians. Prerequisite, courses 111 or 113 and 129. One lecture and two laboratory periods. Three credits Barton

150. *Industrial Seminar*.—A special course for advanced students will be given each year by members of the staff especially qualified for some particular subject. During 1921-22 the subject will be Synthetic Dye-stuffs. Lectures and laboratory periods will be arranged. Two credits; winter. Dehn

181-182. *Physical and Theoretical Chemistry*.—A course dealing with the fundamental theories of chemistry based upon physical week. Prerequisite, Physics 2 and courses 113, 133. Five credits per quarter; autumn, winter. Tartar

183. *Electro Chemistry*.—Theories and laws of voltaic currents and laboratory work with electro-chemical processes and measurements. Three lectures and two laboratory periods per week. Prerequisite, course 182. Five credits; spring. Tartar

184. *Chemistry of Colloids*.—This course is designed to acquaint the student with the fundamental properties of substances in the colloidal state. It will also include a consideration of surface phenomena in general, such as surface tension, adsorption, etc. Two lectures and one laboratory period per week. Three credits; autumn. Tartar

192. *Chemistry of Plants and Animal Tissues*.—The application of physiological chemistry to the study of biology. Prerequisite, courses 111 or 113 and 133. One lecture and two laboratory periods. Three credits, autumn. Barton

193. *Chemistry of Nutrition*.—A study of enzyme and chemical reactions involved in digestion and metabolism. Prerequisite, courses 111 or 113 and 133. Two lectures and one laboratory period per week. Autumn. Barton

200. *Journal Seminar*.—Advanced students may register for assigned readings and reports on the chemical literature. Different members of the staff will have charge of the course during the various quarters. One credit per quarter; autumn, winter, spring.

GRADUATE COURSES

*203. *Advanced Physical Chemistry*.

211. *Inorganic Preparations*.—The preparation of special substances involving representative laboratory methods. Two laboratory periods per week. Two credits per quarter; autumn, winter, spring. Thompson

*Not offered in 1921-1922.

212. *Organic Preparations*.—This course and 211 are required of all candidates for the degree of doctor of philosophy. Two laboratory periods per week. Two credits per quarter; autumn, winter, spring. Dehn

213. *Organic Analysis*.—The special methods used in the analysis of organic substances. Two laboratory periods per week. Prerequisite, courses 133 and 113. Two credits; autumn. Dehn

215-216-217. *Chemical Engineering*.—For seniors and graduates in chemical engineering. In the autumn quarter the course consists of selected chemical processes with special emphasis on the factors of control and inspection. The winter quarter deals with the preparation of drawings and specifications of fundamental apparatus such as driers, coolers, grinders, conveyors, evaporators, and stills, together with computations of heat interchange, etc. The spring quarter deals with the evolution of a chemical process from assigned raw materials quantitatively and experimentally tested. This quarter's work may be reported in the form of a thesis for the bachelor's degree. Prerequisite, courses 123, C. E. 2 and M. E. 90. Five credits per quarter; autumn, winter, spring. Benson, Whitwell

219. *Chemical Engineering*.—The design, construction, equipment and operation of a plant for semi-commercially testing the results of laboratory experiments. The results may be reported as a thesis for an advanced degree. Prerequisite, course 217. Credit to be arranged; autumn, winter, spring. Benson, Whitwell

221-222-223. *Advanced Inorganic Chemistry*.—A comprehensive course based on the periodic system of the elements, with illustrative applications of various laws and theories. Two quarters are devoted to the study of the elements and their ordinary compounds, and one quarter to the chemistry of the higher order compounds. Recommended for all majors and graduate students. Two credits per quarter; autumn, winter, spring. Smith

224-225. *History of Chemistry*.—Lectures and assigned reading. Prerequisite, course 133, 182. Two credits; autumn, winter. Smith

231-232-233. *Advanced Organic*.—A detailed study of special fields of organic chemistry. Prerequisite, courses 133, 182. Five credits per quarter; autumn, winter, spring. Dehn

250. *Research*.—The work in research offered by the department is of three types: (1) Special investigations by advanced students may be carried on under the direction of members of the staff. (2) Research for the master's degree. The maximum credit is nine hours. (3) Research for the doctor's degree. Work for this degree may be carried on under the direction of any member of the regular staff of the department. The maximum credit is forty-five hours.

CIVIL ENGINEERING

Engineering Hall

PROFESSORS MORE, ALLISON; ASSOCIATE PROFESSORS HARRIS, RUBET;
ASSISTANT PROFESSORS HEYDEN, MAY, RATHBUN, COLLIER; INSTRUCTORS, WHITE, HAMILTON,
MILLER, BROWN, DOBSON, DANA, WILCOX; ASSOCIATES, WELD, STRANBERG, WERNECKE

1 *Engineering Drawing*.—Lettering; engineering sketching, fundamental principles of working drawings; mapping, map conventions. Laboratory fee, \$1. Three credits; autumn, winter, spring. White

2. *Engineering Drawing*.—Detail and assembly drawings; readings of drawings; use of instruments; tracing; standards and conventions. Prerequisite, C.E. 1. Three credits; autumn, winter, spring. White

4. *Topographic Surveys*.—Field and office collection of information and platting of field notes for topographic surveys. For geology students. Three credits per quarter; spring. Heyden

11. *Engineering Problems*.—Training in methods of attacking, analyzing and solving engineering problems. Coaching in proper methods of work and study, including training in systematic arrangement and clear workmanship. Some acquaintance with practical situations through the solution of problems chosen from different fields of engineering activities. The work in this course deals mainly with the dynamic side of the problems. Three credits; autumn, winter, spring. Dana

12. *Engineering Problems*.—A continuation of the work in C. E. 11 but devoting most of the time to statics. Prerequisites, C.E. 1, C.E. 11 and Math. 51. Must be preceded or accompanied by Math. 52. Three credits; autumn, winter, spring. Dana

13. *Engineering Problems*.—Detailed analysis and solution of numerous engineering problems dealing with space and dimensions by the use of graphic methods. Prerequisites, C. E. 1 and C. E. 2. Three credits; autumn, winter, spring. Dana

21. *Plane Surveying*.—Surveying methods, instruments, computations, mapping. U. S. public land surveys. Prerequisites, C. E. 1 and Math. 51. All freshmen engineers. Laboratory fee, \$1.50. Three credits; autumn, winter, spring. Rubey

22. *Railroad Surveying*.—Plane curves, grades and earthwork. Elementary railroad engineering. Prerequisite, C. E. 21. Laboratory fee, \$1.50. Four credits; autumn. Hayden

23. *Higher Surveying*.—Meridian observations; triangulation and base line measurements; computations and adjustment of measurements; plane table surveying. Prerequisite, C. E. 21. Laboratory fee, \$1.50. Four credits; winter. Hayden

24. *Field Engineering*.—Field practice in the survey and construction of highways, railroads, canals, etc. Prerequisites, C. E. 21 and C. E. 22. Laboratory fee, \$1.50. Four credits; spring.

Hayden

27. *Mine Surveying*.—Surface and underground practice; observation for meridian; topography; mining claim survey; tunnels, and vertical shaft work and connections; mapping. Prerequisite, C. E. 21. Sophomore mining engineers. Laboratory fee, \$1.50. Three credits; winter.

Hayden

30. *Surveying*.—(Short session in Forestry). Laboratory fee, \$2.00. Five credits; winter.

Hayden

38. *Surveying*.—(Short session in Mining). Laboratory fee, \$2.00. Five credits; winter.

Hayden

55. *Forest Surveying*.—For students in Forestry. Laboratory fee, \$1.50. Two credits; winter.

Hayden

56. *Forest Surveying*.—Chain, compass, transit and level surveying, with reference to work in forestry. Laboratory fee, \$1.50. Five credits; spring.

Hayden

112. *Railway Construction*.—Railway construction methods, machinery and tools; details of track, and terminal structures. Prerequisite, C. E. 24. Three credits winter.

Hayden

115. *Railway Economics*.—The economic theory of railway location, operation and maintenance. Prerequisite, C. E. 24. Three credits; spring.

Hayden

122. *Highways*.—Location and construction of standard types, with application to local conditions. Prerequisite, C. E. 22. Three credits; spring.

Allison

126. *Roads and Pavements*.—Materials, construction and maintenance. Laboratory study of materials used in pavements. Prerequisite, C. E. 122. Laboratory fee, \$1.50. Five credits; autumn.

Allison

131. *Mechanics*.—Algebraic and graphic application of elementary principles of statics. Prerequisites, C. E. 12 and Math. 62. Three credits; autumn, winter, or spring.

More

132. *Mechanics*.—Application of elementary principles of dynamics. Prerequisite, C. E. 131. Three credits; autumn, winter or spring.

More

133. *Mechanics*.—Continuation of C. E. 131 and C. E. 132; and mechanics of materials. Prerequisite, C. E. 132. Three credits; autumn, winter, spring.

More

134. *Framed Structures*.—Application of mechanics to analysis of structural details and simple framed structures. Prerequisite, C. E. 133. Three credits; autumn. Rathbun

135. *Advanced Mechanics*.—General theories of flexure. Problems in indeterminate structures. Senior and graduate engineers. Prerequisite, C. E. 133. Five credits; spring. More

137. *Mechanics*.—Analytical study of problems in mechanics. Prerequisite, C. E. 133 and Math. 62. Three credits; spring. Rathbun

139. *Reinforced Concrete*.—Fundamental principles of reinforced concrete. Prerequisite, C. E. 133. Three credits spring. More

142. *Hydraulics*.—Flow of water through pipes, orifices, over weirs, and in open channels; energy and reaction of jets with application to impulse wheels; review of hydrostatics. Prerequisite, C. E. 131. Laboratory fee, \$1.50. Five credits; autumn, winter, spring. Harris

143. *Hydraulic Engineering*.—Complete problems presenting hydraulic engineering. Prerequisite, C. E. 142. Three credits; winter. Harris

144. *Hydraulic Mining*.—A course of two recitation periods per week on the theory and practice of hydraulic mining. For short course students in mining. Two credits; winter. Allison

145. *Hydraulic Machinery*.—Development and theory of water wheels and turbine pumps; design of a reaction turbine; reference to hydrostatic machinery and dredging equipment. Prerequisite, C. E. 142. Senior and graduate E. E. and M. E. Three credits; winter. Harris

147. *Hydraulic Power*.—Generation of power; penstock and turbines; types of installations. Prerequisite, C. E. 142. Senior and graduate C. E. Five credits; autumn. Harris

153. *Water Supply*.—The principal engineering operations necessary to secure suitable water supplies for cities, towns and industrial plants. Senior and graduate C. E. Prerequisite, C. E. 142. Three credits; autumn. Allison

154. *Sewerage and Drainage*.—The design and construction of sewerage and drainage systems for cities and towns. Senior and graduate C. E. Prerequisite, C. E. 142. Three credits; winter. Allison

155. *Water Supply Problems*.—Methods used in overcoming difficulties in obtaining a suitable supply; purification of water used for domestic and industrial purposes. Senior and graduate C. E. and Ch. E. Prerequisite, C. E. 142. Three credits; winter. Allison

157. *Irrigation Engineering*.—Investigation regarding duty of water and methods of obtaining it for irrigation purposes. Design and construction of irrigation works. Prerequisite, C. E. 142. Three credits; autumn. Allison

158. *Sewage Treatment*.—Supplementary to C. E. 154, with special problems relating to public health; sewage disposal; garbage collection and destruction. Senior and graduate C. E. and Ch. E. Three credits; spring. Allison

160. *Building Construction*.—A study of construction problems from the standpoint of the builder. Three credits; spring. Weld

161. *Structural Design*.—Relation of theory of structures to engineering practice. Special application to roof and bridge trusses. Prerequisite, C. E. 134. Five credits; winter. Rathbun

164. *Advanced Structural Design*.—Arches, swing bridges, statically indeterminate stresses. Prerequisite, C. E. 161. Five credits; spring. Rathbun

167. *Materials of Construction*.—The properties of materials used in engineering construction, such as timber, concrete, steel, etc. Recitations and laboratory. Prerequisite, C. E. 133. Laboratory fee, \$1.50. Five credits; autumn. Collier

169. *Engineering Relations*.—Consideration of the construction and operation of projects, and of the involved business relations. Prerequisite, senior standing. Five credits; autumn.

171. *Engineering Astronomy*.—(See Astronomy 171).

172. *Geodetic Astronomy*.—(See Astronomy 172).

173. *Geodesy*.—(See Astronomy 173).

198. *Thesis*.—Five credits.

GRADUATE COURSE

211. *Research*.—Time to be arranged. Two to five credits.

CLASSICAL LANGUAGES AND LITERATURE

Denny Hall

PROFESSOR THOMSON; ASSOCIATE PROFESSOR SIDNEY; ASSISTANT
PROFESSORS DENSMORE, CLARK

Requirements for a major; at least 36 hours in the department, chosen from the courses other than Greek 11 and 13-14; Latin, 1, 2, 3, 11; 14-15-16. A student specializing in Greek must take at least nine hours of Latin; one specializing in Latin must take at least ten hours of Greek.

I. GREEK

1-2-3. *Elementary Greek*.—Exercises and translations in a wide range of authors from Homer to the New Testament. The method of supervised study is followed to insure proper adaptation to the ability of the student. Five credits a maximum per quarter; any quarter. Densmore

4-5. *The Times of Socrates*.—Extracts from the *Memorabilia* of Xenophon and the most noted Socratic dialogues of Plato. Three credits; autumn, winter. Densmore

*6. *The Persian War Period*. Densmore

7. *New Testament Greek*.—St. Luke translated in the light of secular Greek usage in the early Christian era. Three credits; spring. Densmore

8-9-10. *Greek Art*.—Autumn, architecture; winter, sculpture; spring, painting, numismatics, and the minor arts. This course alternates with that in Roman art. Primarily for students of fine arts but open to all students. One credit per quarter. Sidey

11. *Greek Civilization*.—An institutional and cultural survey of the Greek world from the earliest times to the Roman conquest. Illustrated lectures, conferences and discussions. Knowledge of Greek not required. Five credits; autumn. Densmore

12. *Greek Civilization*.—A continuation of course 11 for a limited number of students; admission by consultation with the instructor. Five credits; winter, spring. Densmore

13. *Greek Literature*.—The masterpieces in English translations. Knowledge of Greek not required. Five credits; autumn, winter, spring. Sidey

14. *Greek and Roman Literature*.—A continuation of course 13 but may be elected by those who have not had course 13. Five credits; autumn, winter, spring. Sidey

15-16. *Greek Civilization and Literature*.—A duplication of course 11, but including the literature in translation as a fundamental expression of the Greek genius. Five credits per quarter; winter, spring. Densmore

101-102-103. *The Periclean Age*.—An intensive study of Greek civilization from the founding of the Delian confederacy to the death of Socrates. Readings, conferences, and reports. Prerequisites, courses 4-5 or their equivalents. Three credits per quarter; autumn, winter, spring. Densmore

104-105-106. *Greek Poetry*.—Epic, lyric, dramatic, pastoral. Prerequisite, courses 4-5. Two credits per quarter; autumn, winter, spring. Densmore

*107-108-109. *Greek Prose Writers.* Densmore

*151-152-153. *Plato* Densmore

II. LATIN

1-2-3. *Elementary Latin.*—This course covers the first and second years of high school Latin. It is designed to help those who have previously had little or no Latin to an appreciation of the sources of the English and Romanic languages, as well as to enable those who desire to study Latin more thoroughly to bring their preparation up to the college requirements. It will be given if any considerable number of students desire it. Five credits per quarter; autumn, winter, spring. Sidey

4. *Cicero De Senectute.*—A comparison of Cicero's work with similar essays. Exercises in grammar and composition. Prerequisite, three and one-half years of high school Latin. Five credits; autumn. Clark

5. *Ovid.*—Selections, chiefly from the *Metamorphoses*, with some study of the same myths as they appear in English literature. Grammar and composition. Prerequisite, three and one-half years of high school Latin. Three or five credits; winter. Clark

6. *Catullus.*—The Latin lyric. Emphasis upon finished translation and comparison of the best English versions; grammar and compositions. Prerequisite, three and one half years of high school Latin. Three or five credits; spring. Clark

11. *Roman Civilization.*—The part played in history by the Romans and their contributions to modern civilization. Lectures, illustrated, when possible; collateral reading and reports. Five credits; autumn, winter, spring. Clark

13. *Roman Literature.*—(See Greek 13-14.)

*14-15-16. *Roman Art.* Sidey

50. *Livy.*—One book and selections from the other books. Prerequisite, courses 4, 5, 6, or special permission. Three credits; autumn. Thomson

60. *Horace: Odes; Vergil: Eclogues.*—Prerequisite, courses 4, 5, 6, or special permission. Five credits; winter. Thomson

70. *Tacitus; Agricola; Martial: Epigrams.*—(Selections). Prerequisite, courses 4, 5, 6, or special permission. Five credits; spring. Thomson

*100. *Cicero's Letters.*

*101. *Pliny's Letters.* Clark

*102. *Tacitus' Annals.* Clark

103-104-105. *Teachers' Course.*—Caesar, Cicero, and Vergil; methods, practice teaching, and observation. Prerequisite, courses 50, 60, or 70. Three credits per quarter; autumn, winter, spring. Clark

110. *Lucretius.*—A reading of selected portions of the *De Rerum Natura*, with a discussion of Lucretius' philosophical system. Prerequisite, courses 50, 60 or 70. Two credits; autumn. Clark

111. *The Roman Epic.*—The development of the Roman Epic will be traced, with readings of selections from the principal poets, especially the last six books of the *Aeneid*. Prerequisite, courses 50, 60, or 70. Two credits; winter. Clark

112. *Short Stories from Apuleius.*—Readings from the *Golden Ass* of Apuleius with a study of the development of this literary form among the Greeks and Romans, and some attention to the Latinity of the period. Prerequisite, courses 50, 60 or 70. Two credits; spring. Clark

151. *Medieval Latin.*—Einhard's *Life of Charlemagne* and Bede's *Ecclesiastical History of England*. Two credits; autumn. Sidey

152. *Seneca.*—Moral Essays. Two credits; winter. Sidey

153. *Latin of the Empire.* Gudeman's *Selections*. Two credits; spring. Sidey

NOTE: For courses in Comparative Philology, see the department of Scandinavian Languages and Literature.

DRAMATIC ART

Denny Hall

PROFESSOR GORSUCH; INSTRUCTOR HUGHES

The work in this department is planned for three classes of students: (a) those who desire some knowledge of dramatic art as part of a liberal education; (b) those who need some knowledge of dramatic art as part of their technical training; and (c) those who wish to pursue the subject more intensively than either of the former groups, except courses 101-102-103.

For a major the department requires 38 to 60 credits, of which 24 must be in the department, including courses 1-2-3 and 21-22-23.

Courses 1-113 (inclusive) may be entered at the beginning of the first, second or third quarters.

1-2-3. *Dramatic Literature.*—Introductory course. Selected plays of the great dramatists are studied with the purpose of in-

*Not offered in 1921-1922.

creasing the student's power of analysis and appreciation. Three credits per quarter; autumn, winter, spring. Gorsuch

21-22-23. *Shakespeare*.—Dramatic reading and interpretation of selected plays. Courses 21-22-23 have as their general purpose the interpretation of the drama. Selected plays are used as exercises in dramatic delivery and for the study of effectiveness in the reading of lines. The special aims are to correct personal mannerisms of vocal expression and to encourage habits of speech that are right and natural; to cultivate proper instinctive expression, and the use of imagination in conceiving the situation, relation and characterization as these are manifested in utterance. Three credits per quarter; autumn, winter, spring. Gorsuch

27-28-29. *Contemporary Drama*.—Dramatic reading and interpretation of selected plays. For further information see courses 21-22-23. Gorsuch

31. *Practical Public Speaking*.—An introductory course. Principles of public speaking are studied and short, original talks are prepared and delivered. Prerequisite, English 1. Three credits per quarter; autumn, winter, spring. Gorsuch

32-33-34. *Practical Public Speaking*.—Prerequisite, course 31, or junior standing. Three credits per quarter; autumn, winter, spring. Gorsuch

101-102-103. *Play-acting and Play-producing*.—A practical course in the art of acting, with some time given to the problems of producing. Includes work in interpretation of both standard and original plays. Four credits; autumn, winter only. Hughes

111-112-113. *Play-writing*.—A study of the principles of dramatic composition, together with experimental creative work. Five credits per quarter; autumn, winter, spring. Hughes

Work to be announced later will include courses in producing, general stagecraft.

ECONOMICS AND BUSINESS ADMINISTRATION

Commerce Hall

PROFESSORS MILLER, KIBLER, LEWIS, GOULD; ASSOCIATE PROFESSORS CURTIS, SMITH, MORIARTY, COX, PRESTON; ASSISTANT PROFESSORS McMAHON, SKINNER, DAKAN; LECTURER, McCONAHEY; INSTRUCTORS, GREGORY, DRAPER, DRISCOLL, TARBILL; ASSISTANTS, TURPIN, MCGIBB, WOODBRIDGE, ELLSWORTH, WERNER, TROW, HALVERSON.

(Required and Elective)

1. *General Economics*.—Introductory course covering the general principles of economics. This course is a prerequisite to all sophomore, junior and senior courses in business administration. Syllabus fee, \$1.50. Five credits; autumn, winter, spring, summer. Miller and staff

2. *General Economics*.—Open only to majors in engineering, chemistry, pharmacy, forestry and fisheries. Syllabus fee, \$1.50. Three credits; spring. Miller and staff

6. *Business Correspondence*.—Principles of business writing; theory and practice of various types of letters; sales, adjustments, credit, collection, etc.; installation of correspondence supervision. Laboratory fee, \$1.50. Five credits; autumn, winter, spring, summer. Leib

7. *Economic Resources of the World*.—A study of the principal agricultural and mineral resources of the world; their geographical distribution and development; governmental policies of conservation; world commerce, trade routes. Syllabus fee, \$1.50. Five credits; autumn, winter, spring, summer. Skinner and Lewis

11. *Elementary Accounting*.—The principles of debit and credit; various books of original entry; different forms of ledgers; balance sheets; profit and loss statements; and a detailed study of business papers. Three lectures and two laboratory periods per week. Laboratory fee, \$5.50. Five credits beginning autumn, winter, spring, summer. Dakan, Gregory, Draper, Tarbill

12. *Elementary Accounting*.—(Continued) The classification of ledger accounts; controlling accounts and subsidiary ledgers; accounting problems of partnerships and corporations, etc., from the point of view of the business manager as well as the accountant. Three lectures and two laboratory periods per week. Laboratory fee, \$5.50. Five credits, beginning autumn, winter, spring, summer. Dakan, Gregory, Draper, Tarbill

19. *Ship Operation*.—Planning construction, measurement, and documenting of vessels. Five credits; autumn. Gould

20. *Ship Operation*.—Entries and clearances coastwise and foreign. Customs procedure, shipping practice. Five credits; winter. Gould

COURSES 50-59. PREREQUISITE, SOPHOMORE STANDING

52. *Ship Operation*.—Coast navigation, positions at sea, trade routes, ship's papers, status of officers. Five credits; spring. Gould

54. *Business Law*.—This course covers the fundamental principles of law. The more general and practical principles are developed from problems and selected cases, particularly as related to the law of contracts, property, agency, negotiable papers, insurance, partnership and corporations, with special lectures on the statutory regulations pertaining thereto. Three credits; autumn. Consultation fee \$1.50. Ayer

55. *Business Law*.—Continuation of B. A. 54. Three credits; winter. Consultation fee, \$1.50. Ayer

56. *Business Law*.—Continuation of B. A. 55. Three credits; Consultation fee \$1.50.

57. *Money and Banking*.—An introductory course outlining the nature and functions of money; the history of money; monetary standards; principles of coinage; government paper issue and legal tender; the value of money; principles of banking and functions of the various types of financial institutions; the banking system of the United States with special emphasis on the Federal Reserve system, foreign and domestic exchange. Prerequisite, B. A. 1. Syllabus fee, \$1.50. Five credits; autumn, winter, spring, summer.

Preston

61. *Social and Economic Standards of Living*.—An historical study of standards of living; racial differences in habits and ideals of consumption; economic and social influence in industry; conflict of standards and racial survival. An analysis of class standards of consumption in the United States; their economic and social background; new standards in their evolutionary development. Syllabus fee, \$1.50. Prerequisite, B. A. 1. Five credits; autumn, winter, spring. McMahon

64. *Second Year Accounting*.—General principles of valuation; depreciation; different types of assets and liabilities; capital and revenue charges; prerequisite, B. A. 11-12 or their equivalent. Three lectures and two laboratory periods per week. Laboratory fee, \$3.50. Five credits; autumn, winter, spring, summer.

Cox, Dakan, Gregory, Draper, McConahey

65. *Second Year Accounting*.—(Continued) Surplus and reserves; sinking funds; combinations and consolidations; liquidations and reorganizations; bankruptcy accounts and reports; branch house and agency accounting. Prerequisite, B. A. 11-12 and 64. Three lectures and two laboratory periods per week. Laboratory fee, \$3.50. Five credits; autumn, winter, spring, summer.

Cox, Dakan, Gregory, Draper, McConahey

COURSES 100-199. PREREQUISITE, JUNIOR AND SENIOR STANDING

101. *Secretarial Training*.—The purpose of this course is to give useful information concerning the duties of the secretary, and the systematizing of ordinary office routine. It includes a study of the use of office appliances, indexing, filing, reference work, interviewing, and general practical details of office work, and indicates the principles of business ethics as they concern the secretary. Shorthand and typewriting not prerequisites but desirable. Laboratory fee, \$1.50. Five credits; autumn. Draper

72 Marketing Mtd. Products 3

102.—*Office Management*.—A general survey, from the point of view of the office manager, of the problems of office administration. It deals with the principles of office layout and equipment, and attacks the problem of office control by first segregating the various activities and then studying each in its relation to all the others. Laboratory fee, \$1.50. Five credits; winter. Draper

103. *Risk and Social Insurance*.—Study of the risk factor in its economic and social consequences; ways of meeting risk. General discussion of life and property insurance. Detailed consideration of social insurance, covering employers' liability, workman's compensation, unemployment, and old age insurance. Prerequisite, B. A. 1. Syllabus fee, \$1.50. Five credits; autumn. Smith

104. *Economics of Transportation, Railroad, Water and Ports*.—Economic basis for study of transportation; relation to industry and society; development and present status of the American transportation system; the organization of the service; traffic associations; routes, ports and terminals and terminal facilities; traffic agreements; rates and services and their regulation; international arrangements; navigation laws. Prerequisite, B. A. 1. Syllabus fee, \$1.50. Five credits; autumn. Kibler

105. *Business Organizations*.—A study of business corporations, associations, combinations and the like, with special reference to their formation, operation, advantages and disadvantages, and their relation to the anti-trust laws. Prerequisite, 10 hours of economics and business administration, including B. A. 1. Syllabus fee, \$1.50. Five credits; autumn. Custis

106. *Economics of Markets*.—An application of the principles of economic theory to the problems of marketing, and a general survey of modern marketing methods in both raw and manufactured products. Prerequisite, B. A. 1. Syllabus fee, \$1.50. Five credits; autumn. Lewis

111. *Advanced Accounting*.—Detailed study of accounting theory and practice; analysis of balance sheets and profit and loss statements; preparation of reports indicating financial and operating conditions; solution of accounting problems with a special emphasis on correct form and speed. Prerequisites, B. A. 11-12, 64-65. Five credits; autumn, winter, spring. Laboratory fee, \$3.50. Cox, Gregory, Draper

112. *Advanced Accounting*.—(Continued) Accountancy of investment; preparation of credit statements; special partnership and corporation problems. Prerequisite, B. A. 11-12, 64-65, 111. Laboratory fee, \$3.50. Five credits; autumn, winter, spring, summer. Cox, Gregory, Draper

118. *Business Statistics*.—The collection, presentation, and interpretation of statistical data of value in business operations, in-

cluding a consideration of business barometers, market analysis, sales and advertising. Prerequisite, mathematics 13. Laboratory fee, \$1.50. Five credits; spring. Lewis

121. *Corporation Finance*.—The financial problems connected with the promotion of corporations, the underwriting and sale of their securities, their management under ordinary conditions, their expansion through growth of consolidation of business, and the reorganization of those that are unsuccessful. Prerequisites, B. A. 1, 11-12. Syllabus fee, \$1.50. Five credits; winter. Custis

122. *Railroad Finance and Administration*.—A study of the administration of American railroads with comparative study of administration in foreign countries; consideration of the organization and administration of typical systems; comparison of divisional and departmental systems; problems in administrative efficiency; statistical control; critical study of federal supervision; lessons from the experience of federal control; railway finances, capitalization, earnings, receiverships, federal control of securities; valuations. Problems assigned. Prerequisite, B. A. 104. Syllabus fee, \$1.50. Five credits; winter. Kibler

123. *Investments and Speculation*.—The distinction between investment and speculation, the principles governing the selection of sound investments, the way in which investments are made, the character of the investment market with some of the pitfalls it contains, the character of speculation, the work of the stock exchange, the relation to it of the money market. Prerequisite, B. A. 121. Syllabus fee, \$1.50. Five credits; spring. Custis

125. *Banking Practice and Accounting*.—A practical survey of the methods and machinery of bank operations. The internal organization of the bank; the relation of the different functions; the bank as an accounting machine; the general ledger; finding costs for the bank and other problems of bank administration. Prerequisites, B. A. 11-12, 57. Laboratory fee, \$1.50. Five credits; winter. Dakan

126. *Commercial Credits*.—This course includes a practical study of the essential factors to be considered in the extension of of credit; the organization and operation of a credit department; the important sources of information; the analysis of credit statement; credit associations and bureaus; credit insurance; the exchange of ledger information and other practical problems form a part of the course. Prerequisite, B. A. 57. Syllabus fee, \$1.50. Five credits; spring. Dakan

127. *Foreign Exchange and International Banking*.—The theory of international exchange; rates of exchange; financing imports and exports; specie movements; exchange with silver and paper standard countries; foreign money market factors; the monetary

and banking systems of the leading nations; foreign banking by American institutions; financing foreign trade under the provisions of the Edge Act; the present status of the foreign exchange situation. Prerequisite, B. A. 57. Syllabus fee, \$1.50. Five credits; autumn. Preston.

138. *Sales Management*.—Selling methods and the organization of the sales force. The personal side of the technique of marketing and merchandising. Required investigation in the different fields. Prerequisite, B. A. 106. Syllabus fee, \$1.50. Five credits; autumn. Moriarty

141. *Fire Insurance*.—Theory and practice of fire insurance; study of clauses in standard fire policies; apportionment of losses; rate making; fire prevention. Prerequisite B. A. 103. Syllabus fee, \$1.50. Five credits; autumn. Smith

142. *Life Insurance*.—Functions of life insurance; premiums, reserves; kind of companies and policies; dividends; lapses. Disability, group and industrial insurance. State regulations of life insurance business. Prerequisites, B. A. 103. Syllabus fee, \$1.50. Five credits; spring. Smith

143. *General Insurance*
149. *Marine Insurance*.—History, principles, and practice of marine insurance as applied to ships, freight and cargo. Prerequisite, B. A. 103. Syllabus fee, \$1.50. Five credits; winter. Smith

151. *Rail and Marine Rates*.—Principles governing the making of rates; influence of competitive forces; comparison of conditions affecting land and water rates; jurisdiction of the Interstate Commerce Commission and of the United States Shipping Board; rate structures; local and joint tariffs; class and commodity rates; state vs. federal control of railway rates; cases dealing with authority, jurisdiction, and conditions determining, or affecting, rate adjustments. Prerequisites B. A. 104. Syllabus fee, \$1.50. Five credits; spring. Kibler

154. *Corporation and Railroad Accounting*.—Detailed analysis of a dozen selected industrial and railroad corporation reports with special emphasis on accounting practices involved and financial conditions indicated. Prerequisites, B. A. 11-12, 64-65, 111-112. Laboratory fee, \$1.50. Five credits; autumn. Cox

155. *Cost Accounting and Installation of Accounting Systems*.—Elements of cost, general methods of cost finding, factory routine, distribution of overhead, compiling and summarizing of cost records, and ledger control of factory accounts. Methods of business analysis and installation of appropriate accounting systems, including departmental and branch office budgets. Prerequisites, B. A. 11-12, 64-65, 111-112. Laboratory fee, \$3.50. Five credits; autumn. Gregory

156. *Auditing Practice and Professional Ethics*.—Auditing procedure, balance sheet and detailed audits, analysis of asset and liability values, profit and loss statements, certificates and reports. Special lectures on professional ethics by certified public accountants engaged in private practice. Prerequisite, B. A. 11-12, 64-65, 111-112. Laboratory fee, \$3.50. Five credits; winter. Cox

157. *Income Tax Accounting and C. P. A. Problems*.—Detailed study of income tax law, decisions affecting practical determination of taxable income, persons and corporations subject to tax, preparation and analysis of returns. Selected problems from State C. P. A. examinations. Prerequisites, B. A. 11-12, 64-65, 111-112. Laboratory fee, \$3.50. Five credits; spring. Cox

159. *Advanced Money and Banking*.—A critical study of selected topics in monetary science and business finance. The value of money and suggested remedies for changing purchasing power. The effect of the European War upon monetary standards and financial relationship. The Federal Reserve System; business cycles, their history and theory; analysis of the various business barometers for forecasting the probable trend of business conditions. Agricultural credit in America; the Federal Farm Loan System; rural credit in the various states. Prerequisite, B. A. 57. Syllabus fee, \$1.50. Five credits; spring. Preston

160. *Advanced Economics*.—This course is especially intended to give seniors and graduate students a more thorough training in economic theory and its applications to concrete problems. Prerequisite, B. A. 1 and senior standing. Syllabus fee, \$1.50. Five credits; autumn, winter, spring, summer. Moriarty

161. *American Labor Problems*.—This course aims to show the relation between the development of the American Labor Movement and free lands, immigration, economic organization, prices and industrial crises. Prerequisite, B. A. 1. Syllabus fee, \$1.50. Five credits; autumn. McMahon

162. *European Labor Problems*.—A comparative study of the labor movements of modern Europe; their economic and political backgrounds; in relation to types of labor organizations. Prerequisite, B. A. 1. Syllabus fee, \$1.50. Five credits; winter. McMahon

166. *Women in Industry*.—A study of the evolution of women's work; the relative importance of women in industry; social reaction in labor legislation. Prerequisite, B. A. 1. Syllabus fee, \$1.50. Five credits; spring. McMahon

167. *Industrial and Employment Management*.—Organization and administration of industrial enterprises. Factors in plant location types of factory building; the equipment of the plant; the organization of the various departments; executive control; labor

policy from the standpoint of management service and welfare features; wage systems; scientific management and labor, employee representation. Study of the practice in representative business establishments. This course should be preceded by B. A. 105 and 161. Students without these courses will be required to do some extra reading. Syllabus fee, \$1.50. Five credits; winter.

Preston and Leib

168. *History of Economic Thought*.—A study of the chief contributors to economic theory from Adam Smith to Bohm-Bawerk as a basis for a more adequate understanding of present economic problems. Prerequisite, B. A. 160. Syllabus fee, \$1.50. Five credits; winter.

Moriarty

*169. *Plant Construction*.

Gould

170. *Miscellaneous Property Insurance and Real Estate*.—Credit, title, fidelity, automobile, steam boiler, plate glass, tornado insurance. Factory determining urban and rural land values; methods of operation and administration of the real estate business. Prerequisite, B. A. 103. Syllabus fee, \$1.50. Five credits spring.

Smith

171. *Exporting and Importing*.—The technique of exporting and importing; the administration and operation and administration of exporting and importing departments; analysis of markets; preparation of documents and calculation of values of staples and of manufactured products and the financing of shipments. Prerequisite, B. A. 1, 7. Five credits; autumn. Syllabus fee, \$1.50. Lewis

*172. *Terminal Construction and Management*.

Gould

173. *Commercial Policies*.—The commercial policies of the nations of the world in connection with the development of American foreign trade. Syllabus fee, \$1.50. Five credits; autumn.

Skinner

174. *International Commercial Relations*.—A study of the rules and regulations of states applying to foreign commerce; conflicts of commercial interests; peaceful settlement of international controversies; commercial treaties; effect of war upon commerce, with neutrals; and belligerents. Syllabus fee, \$1.50. Five credits; winter.

Driscoll

177. *Trade of Far and Near East*.—An intensive study of the resources and trade of China, Japan, Siberia, the Philippines, French-Indo China, Siam, India, the Malay-Peninsula, the Dutch East Indies, Australasia, Persia, Mesopotamia, Syria, Arabia, Turkey and the Balkan States. Prerequisite, B. A. 7. Syllabus fee, \$1.50. Five credits winter.

Skinner

178. *Trade of Europe*.—An intensive study of the resources of Europe and Africa, and of the trade relations of these sections with the rest of the world, especially the United States. Prerequisite, B. A. 7. Syllabus fee, \$1.50. Five credits; winter. Lewis

180. *Trade of the Americas*.—An intensive study of the resources and trade of Mexico and the Central American and South American countries. Prerequisite, B. A. 7. Syllabus fee, \$1.50. Five credits; spring. Skinner

182. *Commercial Teachers' Course*.—A course dealing with the high-school commercial curriculum, involving a study of the development of commercial education. Typical business courses are examined, and made the basis for discussion in relation to the needs of local business conditions. The course presupposes a thorough knowledge of the subjects which the student expects to teach. Laboratory fee, \$1.50. Five credits; winter. Draper

183. *Commercial Teachers' Course*.—(Continued.) A study of the content of high-school commercial courses, and of texts. Field work in the form of practice teaching done under the direction of the department or the dean of the College of Education. Prerequisite, a senior standing. Laboratory fee, \$1.50. Five credits; spring. Draper

184. *Economic Problems*.—A more intensive and concrete study of special economic problems than is possible in B. A. 160. Intended not only to provide a more intensive study of economic theory as such but to give seniors and graduate students a more adequate basis for discussing fundamental economic problems with men of wider experience in business and political life. Prerequisite, B. A. 160. Laboratory fee, \$1.50. Five credits; spring. Moriarty

187 *ABC. Research in Secretarial Training*.—Autumn, winter, spring. Two-five credits. Hours to be arranged. Draper

191. *ABC. Research in Accounting*.—Autumn, winter, spring. Two-five credits. Hours to be arranged. Cox

192. *ABC. Research in Insurance*.—Autumn, winter, spring. Two-five credits. Hours to be arranged. Smith

193. *ABC. Research in Transportation*.—Autumn, winter, spring. Two-five credits. Hours to be arranged. Kibler

194. *ABC. Seminar in Labor*.—Autumn, winter, spring. Two-five credits. Thursday 4-6. McMahon

195. *ABC. Research in Foreign Trade*.—Autumn, winter, spring. Two-five credits. Hours to be arranged. Lewis

196. *ABC. Research in Business Administration and Industrial Management*.—Autumn, winter, spring. Two-five credits. Hours to be arranged. Preston

197. *ABC. Research in Business Finance.*—Autumn, winter, spring. Two-five credits. Hours to be arranged. Custis

198. *ABCD. Research in Marketing and Advertising.*—Autumn, winter, spring, summer. Two-five credits. Hours to be arranged. Moriarty

199. *ABC. Industrial Research.*—Autumn, winter, spring. Two-five credits. Hours to be arranged. Tarbill

COURSES 200, PREREQUISITE, GRADUATE STANDING

201. *ABC. Seminar in Economics and Business Administration.*—Autumn, winter, spring. Two-five credits. Hours to be arranged. Miller and Custis

Typewriting.—Autumn, winter, spring, summer. Laboratory fee, \$10. No credits. Hours to be arranged. Draper and staff

Shorthand.—Autumn, winter, spring, summer. Laboratory fee, \$10. No credit. Hours to be arranged. Draper and staff

NOTE No University credit will be given for courses (typewriting, shorthand). They will be scheduled according to arrangement at hours between 4 and 10 p. m.

EDUCATION

Home Economics Hall

PROFESSORS BOLTON, AYER, WOODY; ASSOCIATE PROFESSOR FREELAND; ASSISTANT PROFESSORS JENSEN, WILLIAMS, TERRY, HINES, TEACHING FELLOW, TROTH

Courses 75, 85, 119, 140, 145 are specifically required for the normal diploma. Graduates of state normal schools must take courses 75, 85, 119. Any variation must be approved by the head of the department of education.

The department of Education is now authorized by the graduate faculty to offer work leading to the degree of doctor of philosophy as well as the master's degree. Courses listed below in groups III and IV may be offered toward higher degrees by graduate students complying with the regulations specified.

I. COURSES FOR UNDERGRADUATES

1. *How to study.*—Following a consideration of how to study effectively, an attempt is made to help students to apply this knowledge in their work. Required of all freshmen in the College of Education. Elective for students of other colleges. Counted toward a major in education but ordinarily not toward the normal diploma. Five credits; autumn or winter. Freeland, Williams

Courses 3, 4, 5, 6 (See Smith-Hughes Courses, Page 217.)

75. *Principles of Education.*—A consideration of the fundamental principles of education, based upon biology, psychology, neurology, and ethics. Special consideration of such topics as the

study and evaluation of the educational theories and methods of meaning of education; educational bearings of the development of the nervous system, instinct, heredity, habit, individual differences, memory, imagination, sensory training, motor training, apperception, the emotional life, interest, will, formal discipline. Practical applications to everyday schoolroom procedure. Five credits; autumn, winter, spring or summer. Bolton

85. *Educational Sociology I: Social Foundations*.—Introductory course treating social factors in the development of the individual and in school administration, and educational functions of appropriate education, imitation, play, imagination, language. A typical social groups. Three credits; autumn, winter, spring, or summer. Ayer

95. *Child Study*.—Development of humanitarian and scientific interest in children; scope, methods, problems relating to education in the home, school and society. Illustrative topics: Physical, intellectual, emotional, moral and religious growth-periods and great leaders in child study including Froebel, Pestalozzi, Hall, Dewey, Montessori. Five credits; autumn, winter or summer. Williams

II. INTERMEDIATE COURSES

To be admitted to courses in this group (II) students must have upper division classification or the equivalent and have earned at least eight credits or the equivalent in education.

119. *High School Curriculum*.—Secondary school curricula and closely related problems. Three credits; autumn, winter, spring or summer. Terry

130. *Individual Differences*.—A consideration of the significance, amount and methods of determining individual differences in school children together with their pedagogical applications. Five credits; spring. Williams

140. *Methods of Teaching*.—Designed primarily to meet requirements for the normal diploma. Problems of beginning teachers especially emphasized. The following topics will be taken up: The high school situation in the state of Washington, classroom economics, discipline, study lesson, drill lesson, inductive and deductive lesson, lesson for appreciation, reviews, examinations, lesson plans and assignments, teacher's questions, grading and measuring the results of high school teaching. Illustrations from the high school field. Three credits; autumn, winter, spring or summer. Freeland

145. *Practice Teaching*.—One lecture each week, conferences with the instructor, assigned readings, and one period each day

during the quarter devoted to observation and practice teaching under supervision in the Seattle city schools. As far as possible the details of the course are arranged to meet individual needs. Five credits; autumn, winter or spring. Freeland

146. *Practice Teaching II*.—A second quarter of practice teachings may be elected. Five credits; autumn, winter or spring. Freeland

III. COURSES FOR ADVANCED UNDERGRADUATES AND GRADUATES

To be admitted to courses in this group (III) students must have upper division standing or the equivalent and have earned at least ten credits or the equivalent in education. Credits may be counted toward a master's degree by college graduates who have earned eighteen credits in education.

151. *Educational Sociology II: Cooperative Agencies*.—Evolution of the school curriculum with reference to social organization; the social and school survey; relation of the school to other educational agencies. Prerequisite, course 85. Five credits; winter. Ayer

154. *The Junior High School*.—History of the movement for reorganization; functions and relations of this new organization. Prerequisite, course 119. Two credits; autumn, spring or summer. Terry

156. *High School Administration*.—Organization and administration of the modern public high school; legal basis, financial support, student organization and government, classification of students, publicity, etc. Two credits; winter. Terry

161. *History of Education; Ancient and Medieval*.—Social interpretation of the historic beginnings of education, the contributions of the Greeks and Romans, the development of Christianity, medievalism, and the beginning of modern education. Five credits; autumn. Terry

162. *History of Education; Modern*.—Development of educational practices since the Renaissance. The growth of democracy in and through education will be traced. Five credits; winter. Terry

163. *Development of Education in the United States*.—Beginnings of American education, rise and extension of the public school system; modern movements for reorganization and expansion. Five credits; spring. Terry

167. *Improvement of Teaching*.—This course is offered as a substitute for practice teaching for experienced teachers. (Also offered as a five-hour course in the summer.) Supervised teaching and self-supervision will be emphasized. Credits to be arranged; autumn, winter, or spring. Freeland

171. *Experimental Education*.—Designed to show the possibility and value of experimental work in education to give first hand knowledge in the technique of properly conducting experiments in connection with school work. Three double periods per week. Required of all majors in College of Education. Laboratory fee, \$2. Three credits; autumn or winter. Hines

172. *Psychology of Common School Subjects*.—Survey of experimental studies which furnish the basis for current methods in reading, spelling, arithmetic, penmanship, language, etc., and their bearing. Three credits; spring. Hines

173. *Psychology and Measurement of High School Subjects*.—Relation of psychology of the different subjects and measurement, desirable outcomes to be derived from each subject; psychological foundations for special school room practices such as direct teaching of languages, oral composition, projects in science, etc.; measurement of results of high school teaching involving the giving, scoring, and evaluation of such standardized tests as the Rugg Algebra Tests, Minnick Geometry Tests, Henmon Latin Tests, etc., Laboratory fee, \$1. Five credits; spring. Hines

176-177-178. *Vocational Guidance*.—A critical study of vocational and educational guidance in the public schools. Two credits per quarter; autumn, winter and spring. Ayer

181. *Educational Problems of Adolescence*.—A critical consideration of the physical, intellectual, emotional, moral and social characteristics of adolescence, and the educative activities suited to the period of secondary school education. Five credits per quarter; spring, summer. Williams

*185. *Educational Statistics*.—Statistics needed by the graduate student in conducting research or by the teacher, principal, or superintendent in meeting the every day problems of the school room. An introduction to the course in educational measurements and other courses in which statistics are needed. Laboratory fee, \$2. Two credits; autumn. Hines

186. *Educational Measurements*.—Lectures, discussions, reading, class experiments, and projects. Primarily for experienced teachers, principals or those preparing for such positions. Pre-requisite, course 185. Laboratory deposit, \$2. Five credits; autumn, winter or summer. Hines

191. *State and County School Administration*.—A study of state and county educational problems including a study of rural life and its educational needs and supervision. Five credits; autumn. Ayer

192. *Educational Administration; City Schools*.—For those preparing for superintendencies, principalships, and other supervisory positions, as well as those desiring an acquaintance with the large problems of city school administration. Five credits; spring or summer. Ayer

195-196-197. *Applied Principles of Education*.—An analysis of the various principles of education involved in particular educational processes. Especial emphasis upon the psychological principles and growth stages that should be recognized and followed in teaching school subjects. Two credits per quarter; autumn, winter, spring. Bolton

IV. COURSES FOR GRADUATES ONLY

To be admitted to courses in this group (IV) students must be college graduates, and must have earned at least 18 credits or the equivalent in education. The following courses may be counted toward the master's and doctor's degrees:

201-202-203. *Child Accounting and School Adjustment*.—A consideration of individual differences and school progress. Methods of determining various ability-levels and demonstration of application and interpretation of experimental procedure and results with special reference to differential teaching in normal and special classes. Laboratory fee \$2. Two credits per quarter; autumn, winter, and spring. Williams

*211-212-213. *Comparative Education*.—The critical study of modern educational organization and practice in foreign countries, especially in Germany, France, England, Norway, Sweden and Canada. Brief consideration of their development. Relations between social ideals of nations and their educational systems. Particular emphasis regarding their influence upon the development of the educational theories and practices in America. Two credits per quarter; autumn, winter, spring. Bolton

231-232-233. *Advanced Educational Psychology*.—A survey of the latest contributions to educational psychology, with especial emphasis upon the experimental contributions. Two credits per quarter; autumn, winter, spring. Hines

*261-262-263. *Seminar in Educational Sociology*.—A survey of recent contributions to educational sociology and study of special problems. Two credits per quarter; autumn, winter, spring. Ayer

*271-272-273. *Seminar in Educational Surveys*.—The course will include a consideration of the purpose and method of the school survey and a study of the principles of educational practice exhibited in the reports of typical school surveys. Two credits per quarter; autumn, winter, and spring. Ayer

* Not offered in 1921-1922.

275-276-277. *Seminar in Secondary Education*.—A research course in the problems of high-school administration. Two credits per quarter; autumn, winter, spring. Terry

285-286-287. *Seminar in Educational Statistics and Measurements*.—Arranged especially for teachers of Seattle and vicinity. Laboratory fee, \$2. Two credits per quarter; autumn, winter, and spring. Hines

298-299-300. *Individual Research or Thesis Work*.—Intensive study and original investigation of special problems. Results are usually reported in one of the seminars and when especially meritorious may be published. The special problems are directed by the members of the department representing the fields of work chosen by the students. Credits to be arranged.

SMITH-HUGHES COURSES IN TRADES AND INDUSTRIES

The following courses conforming to the methods of teaching trades and industries will be credited toward the bachelor's degree in education if all other requirements for admission and graduation are fulfilled:

3. *Industrial Education*.—The purpose, history, organization, and the promotion of industrial education and its articulation with the traditional school system, with industry and with the Smith-Hughes Law. The continuation school, prevocational school and vocational guidance. Three credits; autumn. Jensen

4. *Methods of Teaching Trades and Class Management*.—General principles of education that apply particularly to trade education and methods in teaching trade subjects. Development of lesson plans as an outgrowth of the study of methods of trade teaching. (Thirty-six hours in class room.) Three credits; winter. Jensen

5. *Trade Analysis and Teaching Program*.—Each member of the class will develop a teaching program or detailed course of study following the analysis of the trade that he expects to teach. (Thirty-six hours in class room.) Three credits; spring. Jensen

6. *Practice Teaching in Trades and Industries*.—Practice teaching under conditions as nearly as possible like those in their respective trades. (Thirty-six hours in class room.) Not a substitute for the regular required practice teaching, Education 145. Three credits; autumn, winter, or spring. Jensen

ELECTRICAL ENGINEERING

Engineering Hall

PROFESSOR MAGNUSSON; ASSOCIATE PROFESSORS LOEW, KIRSTEN;
ASSISTANT PROFESSOR CURTIS; INSTRUCTORS, SHUCK, KALIN, HOARD, TOLMIE.

101. *Direct Currents*.—A short course in continuous current machinery for non-electrical students, to be taken in connection

with E. E. 102. Prerequisite, Physics 98. Four credits; autumn, winter, spring. Shuck, Hoard, Tolmie

102. *Direct Currents Laboratory*.—A short laboratory course in continuous current machinery for non-electrical students. Prerequisite, Physics 98. Laboratory deposit, \$4. Two credits; autumn, winter, spring. Shuck, Hoard, Tolmie

109. *Direct Currents*.—Theory of the electric and magnetic circuits; construction, operation and characteristics of direct current generators and motors. Prerequisite, Physics 98. Four credits; autumn, winter, spring. Loew, Curtis, Tolmie

110. *Direct Currents Laboratory*.—Laboratory work on direct current machinery. Prerequisite, Physics 98. Laboratory deposit, \$4. Two credits; autumn, winter, spring.

Lowe, Shuck, Tolmie

111. *Direct Currents*.—Continuation of E. E. 109 in direct current machinery. Storage batteries. Regulation and control of direct current systems. To be taken in connection with E. E. 102. Prerequisite, E. E. 109. Five credits; autumn, winter, spring.

Kirsten, Kalin, Shuck

112. *Direct Currents Laboratory*.—Experimental work on direct current dynamo machinery and on storage batteries. Prerequisite, E. E. 110. Laboratory deposit, \$4. Four credits; autumn, winter, spring.

Kirsten, Shuck

15. *Elementary Direct Currents*.—(Night Class). The laws of the electric and magnetic circuits with application to direct current machinery without the aid of advanced mathematics. For electricians having at least two years of practical experience with electrical machinery. Laboratory deposit, \$6.

20. *Elementary Alternating Currents*.—(Night Class). An introduction to alternating current theory with experimental work on alternating current machinery. Prerequisite, E. E. 15. Laboratory deposit, \$6.

121. *Alternating Currents*.—A short course in alternating currents for non-electrical students. To be taken in connection with course 122. Prerequisite, E. E. 101. Four credits; autumn, winter, spring.

Curtis, Hoard

122. *Alternating Currents Laboratory*.—Experimental work on alternating current machinery. Prerequisite, E. E. 102. Laboratory deposit, \$4. Two credits; autumn, winter, spring.

Curtis, Shuck

131. *Electric Communication*.—Wire and radio telephone and telegraph. Theory, construction and operation of electric com-

munication systems. Central telephone station practice. Junior or senior elective. Prerequisite, E. E. 109, 110. Four credits; autumn, spring. Kalin

132. *Telephones and Telegraphs*.—Details of automatic and manual switchboards; testing and locating faults; multiplex telegraphy; railway signal systems. Junior or senior elective. Prerequisite, E. E. 131. Laboratory deposit, \$2. Three credits. Tolmie

141. *Illumination*.—Electric lamps; commercial photometry; adaptation of electric lighting to commercial requirements. Junior or senior elective. Prerequisite, E. E. 109, 110. Laboratory deposit, \$2. Four credits; spring. Hoard

152. *Electrical Machine Design*.—Complete design of one direct current generator or motor. Prerequisite, E. E. 111, 112. Five credits; autumn, winter, spring. Kirsten

154. *Design of Electrical Apparatus*.—Switchboards, transformers, alternators or alternating current motors. Prerequisite, E. E. 152. Four credits. Kirsten

161. *Alternating Currents*.—The theory of singlephase and polyphase system; energy storage in magnetic and dielectric fields; vector diagrams and the symbolic methods of analysis; power factor and power measurements; hysteresis and eddy currents; theory of the transformer, singlephase and polyphase induction motors. Prerequisite, E. E. 111. Five credits; autumn, winter, spring. Loew, Kalin

162. *Alternating Currents Laboratory*.—Experimental work with alternating current machinery. Prerequisite, E. E. 112. To be taken in connection with E. E. 161. Laboratory deposit, \$4. Four credits; autumn, winter, spring. Curtis, Loew, Kalin

163. *Alternating Currents*.—The theory of alternators, rotary converters, synchronous and commutator motors and transmission lines; high tension phenomena; corona; commercial wave forms; unbalanced and inter-linked systems. Prerequisite, E. E. 161. Five credits; autumn, winter, spring. Loew, Curtis

164. *Alternating Current Laboratory*.—Prerequisite, E. E. 162. Laboratory deposit, \$4. Autumn, winter, spring. Curtis, Loew, Hoard

171. *Electric Railways*.—Equipment, roadbed, construction and operation. Prerequisite, E. E. 109, 110. Four credits; autumn, spring. Curtis

173. *Central Stations*.—Location, design and operation of electric central stations. Prerequisite, E. E. 161, 162. Three credits; spring. Kirsten

175. *Power Transmission*.—Theory, design and operation of electric power transmission lines. Prerequisite, E. E. 163, 164. Four credits; winter. Kirsten

181, 182. *Radio*.—Radio systems; lineal, open and complex oscillations; coupled circuits; resonance; transmitters; receivers; vacuum tubes in radio work; quenched and undamped oscillations. Prerequisites, E. E. 161, 162. Laboratory deposit, \$2. Five credits per quarter; winter. Kalin

186, 188. *Thesis*.—After consultation with the head of the department the student selects a suitable topic for investigation. Reports of progress are made weekly to the instructor in charge of the work selected. A complete report of the work is typewritten and bound and a copy deposited in the University library. Two to five credits per quarter; autumn, winter, spring.

Magnusson, Loew, Kirsten, Curtis

191. *Engineering Equations*.—A mathematical investigation of electrical phenomena with quantitative solutions of typical engineering problems. Prerequisite, E. E. 161, 162. Three credits; winter. Loew

195. *Electric Transients*.—The exponential law of simple transients; single and double energy transients; current oscillations and traveling waves; natural period of transmission lines; short circuit transients; surges; corona; lightning phenomena. Prerequisite, E. E. 161, 162. Two credits; autumn, winter, spring. Magnusson

196. *Electric Transients Laboratory*.—To be taken in connection with E. E. 195. Prerequisite, E. E. 162. Laboratory deposit, \$2. Two credits; autumn, winter, spring. Kalin

198. *Electric Transient Laboratory*.—A continuation of E. E. 196. Laboratory deposit, \$2. Two credits; autumn, winter spring. Kalin

GRADUATE COURSE

210, 212, 214. *Research*.—Two to five credits per quarter; autumn, winter, spring. Magnusson, Loew, Kirsten, Curtis

ENGLISH

Denny Hall

PROFESSORS PADELFORD, PARRINGTON, BENHAM; ASSOCIATE PROFESSORS MILLIMAN, COX, GARRETT; ASSISTANT PROFESSORS CHITTICK, HARRISON, ERNST; ASSOCIATES, HACKETT, STURBLE, JONES, BROWNING, ELLIS, MRS. ERNST, VICKNER, WRIGHT, KERRIGAN, THOMAS; ASSISTANTS, SICKELS, BURNHAM, HADLEY, McCausland.

REQUIREMENTS FOR MAJOR STUDENTS

The plan of work for major students consists of normally of, (1) a minimum of 27 hours work in lecture and recitation courses, and (2) a course of individual reading in English and American literature under departmental tutors, extending throughout the senior year.

At the conclusion of the senior year all major students are required to take an examination in the history of English literature and the plan of work should be designed to that end.

Candidates for the teacher's diploma are required to take courses 188, 189 and 190.

1-2-3. *Freshman Composition*.—A course in the principles and practice of composition, with conferences for personal criticism. The work done in this course is regarded as belonging rather to the high school than to the University. Those whose preliminary training has been superior are excused from the course on examination. A grade of "A" in course 1 excuses a student from course 2. Five credits for two quarters. For students in Fine Arts, three credits; autumn, winter, spring. Padelford in charge

4. *Freshman Composition*.—For students in Engineering, Forestry and Fisheries. Students are required to repeat the course if their work is not of high quality. Three credits for one quarter. Padelford in charge

5. *Freshman Composition*.—A second quarter's work for students in Fisheries. Three credits per quarter. Padelford in charge

7, 8, 9. *Freshman Composition and Literature*.—A course combining practice in writing with the study of modern authors. Primarily for students intending to major in English. Five credits; autumn, winter, spring.

*21. *An Introduction to Poetry*.—Three credits; autumn.

Parrington

24, 25, 26. *Victorian Essayists*.—A study of the Victorian background of contemporary thought as found in the prose work of Macauley, Herbert Spencer, J. S. Mill, Newman, Carlyle, Ruskin, Arnold, Huxley, Morris, Pater, Stevenson. Two credits per quarter; autumn, winter, spring.

37. *Argumentation*.—Prerequisite, course 1. Five credits; autumn.

38. *Debating*.—Prerequisite, course 37. Three credits; winter.

39. *Debating*.—Prerequisite, course 38. Three credits; spring.

40-41. *Development of the Oration*.—A study of the oration as a distinct type of literature. Analysis of modern orations, and the development of original orations. Two credits per quarter; winter, spring.

51, 52, 53. *Advanced Composition*.—Composition based upon model English and American essays. Prerequisite, courses 1-2. Three credits per quarter; autumn, winter, spring. Two sections.

Millman

54, 55, 56. *Advanced Composition*.—A practical course in criticism and style designed to give a critical and philosophical basis to one's judgments on men, affairs, literature and art. Prerequisite, courses 1-2. Three credits per quarter; autumn, winter, spring. Cox

57-58-59. *Dramatic Composition*.—(Dramatic Art 111-112-113. See Dramatic Art for description.) Three credits per quarter; autumn, winter, spring.

Hughes

*61-62-63. *Versification*.—A study of the principles of English versification, with practice in verse writing. Prerequisite, courses 1-2-3 or 7-8-9. Two credits per quarter; autumn, winter, spring.

Parrington

64, 65. *Great English Writers*.—A study of important works in English Literature. Open to all. Required in the freshman year of pre-journalism majors. Five credits; autumn, winter. Garrett

—67, 68, 69. *Great American Writers*.—Studies in the works of Emerson, Hawthorne, Longfellow, Lowell, Whitman, Poe, Bryant, Whittier, Mark Twain, and others. Two credits per quarter; autumn, winter, spring.

Milliman

70-71. *Shakespeare*.—A detailed study of a few plays, with rapid reading of the remainder. Open any quarter. Three credits per quarter; autumn, winter.

73, 74, 75. *Lower Division Contemporary Literature*.—Essay studies of European and American thought during the nineteenth century and later; followed by readings in poetry, novel and drama involving similar ideas. Open any quarter. Three or five credits; autumn, winter, spring.

Milliman, Harrison, Ernst, —

81, 82, 83. *Literature of the English Colonies*.—The autumn quarter will be devoted to the study of the literature of Canada, the winter quarter to the literature of Australasia and of South Africa, and the spring quarter to the English literature of India. Two credits per quarter; autumn, winter, spring.

Garrett

98. *The Bible as Literature*.—A study of the literature of the Old Testament. Open any quarter and to all students. Three credits per quarter; spring.

Padelford

104-105-106. *Contemporary Literature*.—Special studies in contemporary literature for advanced students. Three credits for quarter; autumn, winter, spring.

Cox, Ernst

*123. *Philosophy in English Literature of the Nineteenth Century*.—(Philosophy 123. See Philosophy for description.) Savery

124. *Chaucer*.—A study of the poetical works of Chaucer. Three credits; autumn quarter. Garrett

125. *Mediaeval Literature*.—The life and the ideals of the Middle Ages studied through the literature. Some of the texts read are Piers Plowman, Aucassin and Nicolette, Little Flowers of St. Francis, The Pearl, Everyman, Malory's Morte D'Arthur. Three credits; winter quarter. Garrett

126. *The Mediaeval Revival in English Literature*.—The revival of interest in mediaeval life and literature will be traced through Walpole, Scott, Carlyle, Ruskin, the Pre-Raphaelites, William Morris, to the present day. Three credits; spring quarter. Garrett

127, 128, 129. *Milton and His Contemporaries*.—A study of English literature from Bacon to Locke, the works of Milton forming the central theme. Three credits per quarter; autumn, winter, spring. Benham

130-131-132. *The English Drama*.—A study of plays representative of the origin and development of English drama. Three credits per quarter; autumn, winter, spring. Benham

133, 134, 135. *Main Tendencies in English Literature I*.—A study in English national ideals, from the beginning to 1642, with consideration of significant literary figures and works. Open to sophomores who are expecting to major in English. Three credits per quarter; autumn, winter, spring. Benham

136, 137, 138. *Main Tendencies in English Literature, II*.—A study in English national ideals from 1642 to the present. Open to sophomores who are expecting to major in English. Three credits per quarter; autumn, winter, spring. Parrington

*141-142-143. *Growth of the Democratic Ideal in English Literature*.

144, 145, 146. *Romantic Revolt*.—The conflict of classical and romantic tendencies in English and Continental literature. Three credits per quarter; autumn, winter, spring. Ernst

*147-148-149. *The English Novel*.

150, 152, 153. *Old and Middle English Language and Literature*.—The grammar of the early English. Readings in Old and Middle English authors. Three credits per quarter; autumn, winter, spring. Benham

161, 162, 163. *American Literature from the Beginnings to the Year 1870*.—The autumn quarter deals with the period before 1800; the winter quarter, with Irving, Brown, Cooper, Bryant, Poe, and the slavery controversy; the spring quarter, with the New England group. Any quarter may be taken separately. Three credits per quarter; autumn, winter, spring.

164-165-166. *American Literature from the Year 1870 to the Year 1914*.—The autumn quarter deals with Whitman, Mark Twain and the Post New England group; the winter quarter, with Howells and the rise of realism; the spring quarter, with late tendencies in fiction and poetry. Three credits per quarter; autumn, winter, spring. Parrington

*167, 168, 169. *Present Day Tendencies in American Literature*.

174-175-176. *Nineteenth Century English Poetry*.—Wordsworth, Shelley, Keats, Tennyson, Browning; Swinburne, Morris, Arnold, Rossetti. Three credits per quarter; autumn, winter, spring. Padelford

183, 184, 185. *General Literature*.—Readings in European literature, with conferences and reports. Three credits per quarter; autumn, winter, spring. Harrison, Cox

*187. *Philosophy in Contemporary Drama*.—(Philosophy 126.) Social and philosophical ideas in the contemporary drama. Five credits; spring. Benham

188, 189, 190. *Teachers' Course*.—Methods and problems in the teaching of English in the high school. Two credits per quarter; autumn, winter, spring. Garrett

191-192-193. *Major Conference*.—For senior students. Individual conferences for the purpose of effecting a correlation of studies and for guidance in individual reading. Each student is expected to meet his instructor once a week in conference. Three credits per quarter; autumn, winter, spring. Harrison, Cox, Ernst

194-195-196. *Studies in Romance*.—A study of transmission and diffusion of stories. A certain number of literary motifs which are popular today are traced through various lands and ages and their manifestations are observed. Consent of the instructor must be obtained for enrollment in this course. Two credits per quarter; autumn, winter, spring. Garrett

COURSES FOR GRADUATES ONLY

*204, 205, 206. *Chaucer*.

207, 208, 209. *English Literature from Chaucer to Dryden*.—Studies in English Renaissance and Reformation and in the Puritan

*Not offered in 1921-1922.

Revolution. Methods of historical research and criticism. Editing. Two to eight credits per quarter; autumn, winter, spring. Benham

211-212-213. *English Literature of the Tudor Period*.—For the coming year the class will study the poetry of Edmund Spenser as a fusion of classical, mediaeval and Renaissance impulses and traditions. This course may be taken to advantage by students who have already studied Spenser during a summer session. Two to eight credits per quarter; autumn, winter, spring. Padelford

221, 222, 223. *Modern English Literature*.—Studies in modern English and American literature from the mid-nineteenth century period to the present day. Two to eight credits per quarter; autumn, winter, spring. Parrington

*224, 225, 226. *American Literature*. Parrington

*227, 228, 229. *Literary Criticism*. Cox

COURSES IN FOREIGN LITERATURES TAUGHT IN ENGLISH

(For details see foreign language departments.)

German, 70-71; Greek, 13-14; Italian, 181-182, 184; Oriental Languages, 50-5-52; Scandinavian, 180-181-182.

NOTE: For courses in Comparative Philology, see the department of Scandinavian Languages and Literature.

For courses in The Short Story, see department of Journalism.

FISHERIES

Fisheries Hall

PROFESSORS COBB, KINCAID; INSTRUCTOR, ANDERSON

1-2. *Introduction to Fisheries*.—A general review and history of the world's fisheries. Two credits per quarter; autumn, winter. Cobb

3, 4, 5. *Ichthyology*.—The structure, classification and habits of economic fishes. Course 5 will also include other economic marine animals particularly oysters and clams. Prerequisite, Zoology 1, 2. Laboratory deposit, \$3. Five credits per quarter; autumn, winter, spring. Kincaid, Anderson

6. *Pacific Fisheries*.—A general review and history of the fisheries of the Pacific. Winter quarter is open to short course students. Two credits; winter, spring. Cobb

50. *Elements of Fisheries*.—A general review of fishery science, stressing the economic and cultural aspects of the subject.

*Not offered in 1921-1922.

Lectures and demonstrations. For students in Business Administration and other colleges of the University. Five credits; autumn. Cobb, Kincaid, Anderson

101-102-103. Fish Culture.—The developmental history and artificial propagation of economic fishes, lobsters, etc. Prerequisite, Fisheries 3, and Zoology 5. Laboratory deposit, \$3. Five credits per quarter; autumn, winter, spring.

104-105. Fishery Methods.—The construction and uses of apparatus; handling and transportation of products, etc. Three lectures and two laboratory periods. Laboratory deposit, \$3. Five credits per quarter; winter, spring. Cobb

106-107. Preparation of Fishery Products.—The curing and preservation of fishery products. Prerequisite, Fisheries 3 and 5. Three lectures and two laboratory periods. Laboratory deposit, \$4. Five credits per quarter; autumn, spring. Cobb, Anderson

112. Oyster and Clam Culture.—The development and propagation of oysters and clams. Prerequisite, course 5. Laboratory fee, \$3. Five credits per quarter; autumn. Kincaid

115. The Economic Fishery Resources of North America.—A study of the fishery resources of the North American continent and adjacent seas, their development and commerce, and government policies of conservation. Three credits; spring. Cobb

117. Diseases of Fish.—A study of the nature and causes of disease in fishes. Prerequisite, Fisheries 3-4-5. Laboratory deposit, \$3. Five credits; autumn.

150, 151, 152. Problems in Fish or Shellfish Culture.—Students with the proper preparation, which should include at least 15 hours' work in fish culture or 15 hours' work in shellfish culture and course 5, will be assigned special topics to be worked upon under the direction of one of the instructors. Five credits per quarter; autumn, winter, spring. Kincaid

155, 156, 157. Problems in Fisheries.—Students with the proper preparation, which should include at least 15 hours' work in fishery methods and preparation of fishery products, will be assigned special topics to be worked upon under the direction of the instructor. Five credits per quarter; autumn, winter, spring. Cobb

FORESTRY AND LUMBERING

Forest Products Laboratory

PROFESSORS WINKENWERDER, KIRKLAND; ASSOCIATE PROFESSOR CLARK;
ASSISTANT PROFESSOR GRONDAL; MR. ZIMMERMAN

1. *Elementary Dendrology*.—Nomenclature, classification and identification of trees. A detailed study of all northwest species and of one type species of each genus of the important timber trees of North America. Prerequisite, high school botany. Required of freshmen. Two recitations, one quiz and two 3-hour laboratory periods per week, field trips additional. Laboratory deposit \$2.50. Five credits; autumn or spring. Winkenwerder and assistant

1s. *S. C. Dendrology*.—Identification, distribution and use of northwest tree species. Two recitations; one-half day field trip. Three credits. Winkenwerder

2. *General Forestry*.—A general survey to familiarize the student with the field of work he is about to enter. Required of freshmen. Three credits per quarter; autumn, winter. Winkenwerder

3. *General Forestry*.—A continuation of Forestry 2 but need not be preceded by it. Winkenwerder

4. *Forest Protection*.—Its economic importance; forest fires, their prevention and control. Required of freshmen. Three credits; spring. Winkenwerder

4s. *S. C. Protection*.—Forest fire, insect, fungi, and other destructive agents of the forest; nature, damage, prevention and control. Winkenwerder

5. *Woodcraft*.—Food and clothing, camp equipment and sanitation, packing a horse, and general woodcraft. A section will be arranged for students not enrolled in forestry if not less than six apply. Two lectures per week; demonstrations and practice work additional. Laboratory deposit, \$3. Two credits; autumn. Clark

51-52. *Forest Mensuration*.—Principles and methods of computing, scaling, cruising, mapping; volume, growth and yield tables. Required of sophomores. For 51 open to short course students. Three recitations, two 3-hour laboratory periods. Laboratory deposit \$3. Five credits per quarter; winter and spring. Winkenwerder, Clark

51s. *Short Course Mensuration*.—Same as Forestry 51. Students take this with regular long course class. Clark

53. *Construction*.—Trails, roads, logging railroads, telephone lines, wooden bridges, cabins, barns, and fences; clearing from the standpoint of United States Forest Service improvement work, and logging construction. Required of sophomores. Laboratory deposit \$3. Three credits; autumn. Clark

57a. *Silvics*.—Lectures and Quiz. The climate, soil and life factors which determine character of forest vegetation. Form and character of the individual tree. Life history of the forest. Silvical characteristics of the tree species. Required of sophomores. Prerequisite 10 hours botany, Forestry 1 and 52. Three credits. Autumn. Kirkland

57b. *Field Methods in Silviculture*.—To accompany 57a. One 3-hour laboratory period. Elective. Laboratory deposit \$3. One credit. Kirkland

58. *Silviculture*.—Regeneration of forests by natural reproduction, seeding or planting. Care of young, middle-aged and older stands. Required of sophomores. Prerequisite 57a. Laboratory deposit \$3. Five credits; spring. Kirkland

101. *Wood Technology*.—Prerequisite to all courses in Forest Products. Wood structure, leading to identification of the commercial timbers of the United States; physical properties of woods. Each student is required to prepare permanent microscopic mounts of fifty species. Required of juniors. Prerequisite college botany, Forestry 1, 10 hours chemistry and general physics. Laboratory deposit, \$3. Five credits, autumn. Grondal

102. *Wood Identification*.—This course includes the laboratory work only of Forestry 101. Open to students in other departments. Prerequisite, college botany, 8 hours. Laboratory deposit \$3. Two credits; autumn. Grondal

103. *Wood Analysis*.—Identification, physical properties and characteristics of woods used in building construction. Open only to students in architecture. Two credits; spring. Grondal

104. *Timber Testing*.—Stresses, tests, theory of flexure, moisture and strength; mechanical properties of wood. Required of juniors. Prerequisite, Mathematics 54, 55, 56 and Forestry 101, General Physics. Laboratory deposit \$3. Five credits; spring. Zimmerman

105. *Wood Preservation*.—Nature of decay of timber and methods and economics of preservation. Laboratory work with the college treating plant and reports on local creosoting plants. Required of juniors and graduates. Prerequisites, Forestry 101 and one year of chemistry. Laboratory deposit \$3. Five credits; spring. Grondal

109. *General Forestry*.—A general survey, lectures, assigned readings, and reports. Occasional field trips. Offered only to students not enrolled in the College of Forestry, and may be taken at the University or as an extension course by correspondence. Two credits; autumn. Winkenwerder

110. *Characteristics of Trees.*—The identification, distribution, life habits, and uses of trees of the Pacific Northwest. Offered only to students not enrolled in the College of Forestry, and may be taken at the University or as an extension course by correspondence. Two lectures weekly and occasional field trips. Two credits; spring.

Winkenwerder

112. *Properties and Uses of Woods.*—Offered only as a correspondence course.

Grondal

119. *Forest Administration.*—Objects, principles and methods of administering private and public forests and forest industries. Prerequisite, Forestry 126 or may be taken concurrently. Three credits; winter.

Kirkland

126. *Forest Economics.*—The forests of the United States, their uses, their relation to industries and resources. Required of juniors or seniors in forestry and open to students in other departments. Prerequisite B. A. 1. Two credits; winter.

Kirkland

151. *Forest Finance and Valuation.*—Mathematics of forest finance; compound interest calculations applied to forest operations; application of financial tests to silvicultural and other forest measures; cost of growing timber; valuation of land for forest production; valuation of mature or immature timber and of damage to forests. Required of students in senior or graduate year. Prerequisites, Forestry 52 and 58. Five credits; autumn.

Kirkland

152. *Forest Organization.*—Principles of forest organization and regulation of the cut; advantages of foresight and planning in forest operations for a term of years in advance; sustained yield management of forests; forest working plans. Required of students in senior or graduate year. Prerequisite, Forestry 151. Five credits; winter.

Kirkland.

153. *General Lumbering.*—Prerequisite to all courses in logging and milling. Comparative methods of logging on the Pacific Coast and in other lumbering regions of the United States. Required of juniors. Prerequisites, Forestry 51-52. Five credits; autumn.

Clark

158. *Forest Utilization.*—Pulp and paper manufacture, tannic acid, naval stores and other secondary forest products; lumber and its economic uses in construction. Required of juniors and graduates. Prerequisite, Forestry 101, and one year in chemistry. Five credits; winter.

Grondal

158s. *The Manufacture and Uses of Lumber.*—Kiln drying and the manufacturing of lumber. Open only to short course students. Four credits; winter.

Grondal

159. *Scientific Management*.—Fundamental principles of scientific management, with special reference to the lumber industry. Given in alternate years, not in 1921-22. Two credits; autumn.

Kirkland

183. *Milling*.—The sawmill; yard arrangements; practical operation. For seniors and graduates. Prerequisites, M. E. 82, Forestry 153, 158, 104. Five credits; autumn.

Grondal

184. *Marketing*.—Territorial consideration, technical trade requirements, problems of wholesaler and retailer, line yards, rail and cargo problems, financing, accounting, advertising. Prerequisites B. A. 1 and 56. Three credits; winter.

Grondal

185-186-187. *Logging Engineering*.—Logging machinery and equipment, organization of logging companies, construction of railroads, camps, etc. Lectures, demonstrations at plants manufacturing logging machinery, and field work in nearby logging camps. During the third quarter the work is transferred to the field, where extensive work in logging engineering is carried on. No credit is given for 186 unless followed by 187. Primarily for seniors and graduates. Prerequisites, Forestry 52, 53, 58, 104, 153, M. E. 82, C. E. 22. Laboratory deposit for 187, \$3. Four credits per quarter, autumn and winter; sixteen credits; spring.

Clark

186s. S. C. *Logging*.—Logging machinery, methods of logging by high lead, sky-lines, etc., planning operations, topographic mapping. Open only to short course men presenting a certificate showing at least six months employment in a logging operation. Five credits.

Clark

188, 189. *Advanced Forest Products*.—Advanced studies in wood technology and utilization, with individual problems. A laboratory course. Prerequisite, Forestry 101, 158. Laboratory deposit \$3. Five credits. Any quarter.

Grondal

GRADUATE COURSES

201. *Forest Geography*.—Advanced dendrology. Silvicultural regions, their relation to regional industrial development and the general problems of lumbering and management. Prerequisite, senior or graduate standing. Three credits; autumn.

Winkenwerder

208, 209. *Seminar*.—Reviews, assigned readings, reports, and discussions on current periodical literature and the more recent Forest Service publications. Prerequisite, senior or graduate standing. Two credits per quarter; autumn, winter.

Winkenwerder, Kirkland, Grondal

213, 214, 215. *Senior or Graduate Research*.—Credits to be arranged, any quarter. Laboratory deposit, \$3. Instructors assigned according to nature of work. Not open to students below senior standing.

221. *Forest History and Policy*.—Forest policy of the United States; forestry in the states and island possessions; the rise of forestry abroad. Three credits; autumn. Kirkland

223. *Advanced Forest Management*.—About one week of field work on a tract of 50,000 to 100,000 acres on which data concerning different soil classes, forest types, etc., and the volume of timber is already available. This work will be followed by the actual formation of a working plan providing for regulation of the yield and organization of all forest work on the area, with estimates of outlay and income. Prerequisite, Forestry 151-152. Eight credits; spring. Kirkland

224. *Advanced Milling and Marketing*.—Sawmill design and a detailed study of special problems in sawmill operation and management. Prerequisites, senior or graduate standing, Forestry 183, 184. Five credits, spring quarter. Grondal

GEOLOGY

Science Hall

PROFESSOR LANDES; ASSOCIATE PROFESSOR WEAVER; ASSISTANT
PROFESSORS SAUNDERS, GOODSPEED

Courses in the department are grouped to lead into the different fields of geological work, as follows:

General Geology: Courses 1-9, 100-109, 200-209.

Geography, Climatology, and Physiography: Courses 10-19, 110-119, 210-219.

Mineralogy, Petrography and Economic Geology: Courses 20-29, 120-129, 220-239.

Paleontology and Stratigraphy: Courses 30-39, 130-139, 230-239.

1. *General Geology*.—Physical. Geological agencies and processes affecting the earth. Lectures and laboratory work, with occasional half-day field trips. Laboratory fee, \$2.50. Five credits; autumn or winter. Goodspeed

2. *General Geology*.—Historical. Continuation of course 1, dealing with the origin and evolution of the earth. Lectures and laboratory work, with some field excursions. Prerequisite, 1, 5, or 12. Laboratory fee, \$2.50. Five credits; winter or spring. Saunders or Weaver

3. *Principles of Geology*.—Physical. The fundamental facts and principles of geology. Lectures, assigned readings and field trips but no laboratory work. Three credits; autumn. Saunders

4. *Principles of Geology*.—Historical. The earth's origin and the general history of the continent. Lectures, recitations and field trips, without laboratory work. Three credits; winter. Saunders

5. *Engineering Geology*.—A survey of the field of general geology, for the special needs of students in civil and chemical engineering and forestry. Laboratory deposit, \$2.50. Five credits; autumn or spring. Goodspeed

10. *Modern Geography*.—An introductory study of the problems of modern geography; the scientific investigation of geographic environment and its influence use of maps and charts; geographic control of production and trade; study of the major geographic features of the continents. Five credits; autumn. Saunders

11. *Meteorology and Elementary Climatology*.—Weather elements and controls; causes and effects of atmospheric conditions; principles and methods of weather forecasting and use of instruments. With or without laboratory work. Laboratory fee, \$1. Three or five credits; winter. Saunders

12. *Physiography*.—Land forms or earth's features with reference to origin and characteristic changes under different agencies during the geographic cycles. Occasional field trips. With or without laboratory work. Laboratory fee, \$1. Three or five credits; spring. Saunders

21. *Mineralogy*.—A brief study of crystallography followed by descriptive mineralogy and blowpipe methods. At least a high school course in chemistry is essential as a prerequisite, and a quarter in general geology is desirable. Laboratory fee, \$3. Five credits; winter. Goodspeed

31. *General Paleontology*.—A consideration of the broad principles of paleontology. An elementary course open to all students. Prerequisite, course 1 or 5. Laboratory fee, \$2.50. Five or three credits; spring. Weaver

107. *Geology of Washington*.—Lectures with assigned readings and laboratory study. Prerequisite, one quarter of general geology or physiography. Two credits; spring. Landes

110. *Teachers' Course in Geography*.—The teaching of geography, physical geography, and commercial geography in the schools. Prerequisites, one term of geology, physiography and geography. Two credits; winter. Saunders

111. *Climatology*.—The broader aspects of climate controls and characteristics of different climates and climatic provinces, with special references to United States and the Pacific Coast. Prerequisite, courses 10 or 11. Three credits; spring. Saunders

112. *Physiography of the United States*.—The physiographic regions of the United States and their effects on development and history of the country. Lectures and map study. Prerequisite, courses 10 or 12, or 1, 3, or 5. Laboratory fee, \$1. Three credits; autumn. Saunders

113. *Physiography of Europe*.—The physiographic regions of Europe and effects of topography and climate on development and relations of different countries. Lectures and map study. Prerequisite, courses 10 or 12 or 1, 3, or 5. Laboratory fee, \$1. Three credits; winter. Saunders

114. *Oceanography*.—Study of the ocean, oceanic circulation and temperatures in their geographic relations and influence. Prerequisite, course 11 or equivalent work. Two credits; spring. Saunders

116. *Economic Geography of Washington*.—The economic and industrial development of the state, based on the geological, physiographic and climatic conditions. Three credits; autumn. Landes

117. *Geography of Asia*.—A study of the continent by natural regions based on topography and climate. Prerequisite desirable, course 10 or 12. Three credits; spring. Saunders

118. *Geography of South America*.—Physiographic features, climate and resources of the continent and their effects on development and relations of different countries. Prerequisite desirable, course 10 or 12. Three credits; winter. Saunders

120. *Petrology*.—A study of rocks, their components, occurrence and structural relations. Occasional field trips. Laboratory deposit, \$2.50. Prerequisite, courses 21 and either 1, 5, or 12. Three credits; spring. Goodspeed

121. *Advanced Mineralogy*.—A study of opaque, metalliferous minerals with the use of the reflecting microscope, or "mineralography"; the relation of the latter to geologic, mining and metallurgical problems. Prerequisite, course 21. Three credits; spring. Goodspeed

122. *Field Methods*.—Principles and methods of geologic surveying and mapping. Detailed field work in small areas, with field trips. Prerequisite, courses 1 and 2, or 5 with 21 and 120. Two credits; spring. Goodspeed

123. *Optical Mineralogy*.—The use of the polarizing microscope in the examination of minerals and rocks in thin sections. Prerequisite, courses 1 or 5, and 21. Laboratory fee, \$2.50. Three credits; autumn. Goodspeed

124. *Petrography*.—The principles of petrography and petrographic methods in the systematic study of igneous, sedimentary and metamorphic rocks. Prerequisite, course 123. Laboratory fee, \$2.50. Four credits; winter. Goodspeed

125. *Advanced Petrography*.—A continuation of the work in petrography for majors in mining and geology. Prerequisite, course 124. Two credits with additional credits optional; spring.

Goodspeed

126. *Economic Geology*.—Economic deposits of non-metallic minerals, their production and use. Lectures and discussions of papers. Prerequisites, courses 1 or 5, and 21. Three credits; autumn.

Landes

127. *Economic Geology*.—Economic deposits of metallic minerals, their production and use. Lectures and discussion of papers. Prerequisite, course 1 or 5, and 21, 124. Five credits; winter.

Landes

128. *Economic Geology*.—An intensive study of certain economic minerals or of particular areas of great importance. Prerequisite, course 126 or 127. Two or more credits; spring.

Landes

131-132. *Invertebrate Paleontology*.—A detailed and systematic biologic study of fossil and living representatives of the Mollusca. Autumn quarter, Pelecypoda; winter quarter, Gastropoda. Prerequisite, course 31. Laboratory fee, \$2.50. Three credits; autumn, winter.

Weaver

133. *Stratigraphic Paleontology*.—A study of the fundamental principles of stratigraphy and the characteristic fossils by means of which the geologic formations of the continent may be determined. Prerequisites, courses 1 or 2, 12 or 31. Laboratory deposit, \$2.50. Five credits; spring.

Weaver

134. *Vertebrate Paleontology*.—A study of the anatomy and structures of the more important groups of extinct vertebrates and their relationships to living vertebrates. Laboratory fee, \$2.50. Prerequisite, course 31. Five credits; winter.

Weaver

135. *Paleobotany*.—A systematic biologic study of the structure and classification of the plant life which formerly inhabited the earth, and the application of paleobotany to correlation problems in historical geology. Laboratory fee, \$2.50. Prerequisite, Botany 11-12 or 106-107 and Geology 2 or 3. Five credits; autumn.

Weaver

GRADUATE COURSES

200.—Field studies or advanced work in general geology. Credits and hours to be arranged.

210.—Advanced or research work in geography, climatology or physiography. Credits and hours to be arranged. Each quarter.

220.—Advanced or research work in mineralogy, petrography and metamorphism. Credits and hours to be arranged. Each quarter.

225.—Advanced or research work in economic geology. Credits and hours to be arranged. Each quarter.

SPECIAL SHORT COURSES

S. C. 1. *Geology*.—Two lectures per week. Laboratory fee, \$1. Winter. Landes

S. C. 2. *Mineralogy*.—A laboratory course in physical determination of minerals and the use of blowpipe methods. Three laboratory periods per week. Laboratory fee, \$2.50, winter. Landes

GERMANIC LANGUAGES AND LITERATURE

Denny Hall

ASSISTANT PROFESSOR ECKELMAN; TEACHING FELLOW, KRAFFT

REQUIREMENTS OF THE DEPARTMENT

For a major: 35 to 60 credits, including at least 30 credits in courses above 100.

For the normal diploma: The same as for a major, including courses 160-161-162.

Credit is allowed for any quarter in any course except 1-2.

All courses are conducted in German unless otherwise specified.

1-2. *First Year*.—Stage pronunciation, grammar, reading of easy prose and verse, conversation. Five credits per quarter; autumn and winter, winter and spring, spring and summer.

Eckelman and Krafft

3. *First Year Reading*.—Reading of modern prose, conversation, composition, continuation of grammar. Prerequisite, course 1-2 or one year in high school. Five credits per quarter; autumn, spring.

Eckelman, Krafft

5. *Second Year Reading*.—Pronunciation, review of grammar with emphasis on syntax, reading of modern prose, simple conversation. Prerequisite, course 3 or two years high school. Three credits, autumn; five credits, winter.

Eckelman, Krafft

6. *Second Year Rapid Reading*.—Special sections with suitable prose for students in colleges of Science, Engineering and Forestry. Prerequisite, course 5 or two and one-half years high school. Three credits; spring.

Krafft

10. *Second Year Supplementary Reading*.—Modern prose, simple conversation. Prerequisite as for course 5. Two credits; autumn.

Eckelman

*60-61-62. *Lower Division Scientific German*.

70-71. *Modern German Literature in Translation*.—The reading and discussion of significant works illustrating the social and industrial development in the nineteenth century. No knowledge of German required. Two credits; winter and spring. Eckelman

*100-102. *Schiller and Goethe*.

103-104-105. *Recent Writers*.—Social problems as represented in the works of Hauptmann, Sudermann, Fulda, Schnitzler, Paul Ernst. Prerequisite, courses 5 or 6, or three years high school. Three credits; winter, spring. Eckelman and Krafft

*110-111. *Advanced Grammar and Composition*.

112-113-114. *Upper Division Scientific German*.—Scientific essays, monographs and technical periodicals. Each student does private reading in his own field under the guidance of the instructor and major professor. Conference work. Prerequisite, courses 6, 10, 60 or 61, or three years in high school. Two or three credits per quarter; autumn, winter, spring. Eckelman

*116-117-118. *German Prose Reading*.

*120. *Phonetics*.

*130-131-132. *German Institutions*.

*133-134-135. *Modern Novels*.

*136-137-138. *Modern Drama*.

140. *Studies in German Literature*.—A general survey. Thomas Anthology. Assigned reading from the best historical fiction to illustrate periods. For advanced students. Three credits, graduate students may exceed this credit; winter. Eckelman

142. *Lyrics and Ballads*.—The Romanticists, Uhland, Heine, Moerike, Storm and others. Prerequisite, course 105. Three credits, graduate students may exceed this credit; autumn. Eckelman

*151. *Lessing*.

*152. *Goethe's Faust*.

*160-161. *Teachers' Course*.

180. *Nineteenth Century Literature*.—Study of the drama and novel to 1880. Kleist, Grillparzer, Hebbel, Ludwig, Raabe, Keller, Storm, C. F. Meyer. For advanced students. Three credits, graduate students may exceed this credit; spring. Eckelman

*200-201-202. *Goethe's Lyrics and Letters*.

*203-204-205. *Storm and Stress Period*.

- *206-207-208. *Romantic School.*
- *220-221-222. *Inter-relations of German and English Literature.*
- *250-251-252. *History of the German Language.*
- *253-254-255. *Middle High German.*
- *256-257-258. *Gothic.*
- *259. *Old Saxon.*

NOTE: For courses in Comparative Philology, see the department of Scandinavian Languages and Literature.

HISTORY

Denny Hall and Philosophy Hall

PROFESSORS MEANY, RICHARDSON; ASSOCIATE PROFESSOR McMAHON;
ASSISTANT PROFESSORS LUCAS, LARSEN; INSTRUCTORS, EDDY, FARRAR; ASSOCIATE, DAHLIN
PROFESSOR GOWEN OF THE DEPARTMENT OF ORIENTAL LANGUAGES AND LITERATURE

REQUIREMENTS OF THE DEPARTMENT

The University requirements in history may be satisfied by one of the following courses:

Medieval and Modern European History (1-2). It is desirable that this course be selected in fulfillment of the history requirements and that it be taken in the freshman year. This course is repeated beginning with each quarter.

History of the United States (57-58). Primarily for sophomores.

English Political and Social History (5-6). Open without prerequisites to freshmen, sophomores and upperclassmen.

Ancient History (71-72-73). Open without prerequisites to sophomores and upperclassmen.

For a major at least eighteen credits shall be obtained in the most advanced undergraduate courses. Course 1-2 is required of all history majors.

It is recommended that all history majors shall take, in excess of departmental requirements, additional work in history, political and social science, philosophy, modern languages, and English literature. Medieval Latin is desirable for those who intend to study history for advanced professional purposes.

Prospective teachers of history as a major subject in high schools who desire the recommendation of the department of history must become acquainted with the elementary facts requisite for the teaching of all courses in history and in civil government taught in the high schools of the state, and have specialized knowledge in their chosen fields. Courses in history, government and economics should be elected with this aim in view.

*Not offered in 1921-1922.

The work in undergraduate courses consists of lectures, papers, assigned and collateral readings, with quiz sections organized for the larger classes. Graduate courses are devoted to research work and reports thereon.

1-2. *Medieval and Modern European History*.—A general survey from the Roman world empire of Augustus to our own times. Five credits per quarter; autumn, winter. Lucas, Larsen, Eddy

The above course is repeated beginning with the winter quarter.

5-6. *English Political and Social History*.—A survey of the political, social, economic and intellectual development of the English people from the Saxon conquest to the present time. Five credits per quarter. (By performance of special work under direction of the instructor upper division students may receive upper division credit.) Autumn, winter. Richardson

21-22. *History of China*.—From the earliest time to the present. Three credits per quarter; autumn, winter. Gowen

23. *History of Japan*.—Three credits per quarter; spring. Gowen

57-58. *History of the United States*.—A general survey with emphasis upon political and economic history. Not open to freshmen. Five credits per quarter; autumn, winter. McMahon

60-61-62. *Makers of the Nations*.—American history through the biographies of prominent characters. Not open to freshmen. Two credits per quarter; autumn, winter, spring. Meany

71-72-73. *Ancient History*.—A survey of the history of the ancient world to the times of Justinian. Not open to freshmen. Three credits per quarter; autumn, winter, spring. Larsen

81-82. *England Since the Accession of George I*.—The course deals with the construction of the British commonwealth of nations and with Imperial problems. It emphasizes also internal economic and institutional developments, especially those related to the growth of democracy. Prerequisite, course 1-2 or 5-6. Three credits per quarter; winter, spring. Eddy

85-86-87. *History of the Middle Ages. Advanced*.—The course emphasizes the economic, institutional and cultural phases of the period. (By performance of special work under direction of the instructor upper division students may receive upper division credit), Prerequisite, course 1-2. Three credits per quarter; autumn, winter, spring. Lucas

90. *History of Alaska: Russian Period, 1720-1820*.—Two credits; autumn. Farrar

91. *History of Alaska: Diplomatic Complications, 1820-1867.*—Two credits; winter. Farrar

92. *History of Alaska: American Period, 1867-1917.*—Two credits; spring. Farrar

105-106-107. *English Constitutional History.*—The development of the legal and governmental institutions of the English people to the present time. A course valuable for students of political science and law as well as history. Prerequisite, 5-6, except for upper division students who are majoring in economics, sociology and political science, or who are taking course 5-6. Open also to pre-law sophomores who have taken 5-6 in freshman year. Pre-law sophomores who elect this course and have not taken course 5-6 are *required* to take course 108-109-110. Three credits per quarter; autumn, winter, spring. Richardson

108-109-110. *English Political History, Pre-law.*—Open only to those pre-law sophomores and majors in political science who are taking course 105-106-107. All pre-law sophomores who are taking course 105-106-107 and who have not taken course 5-6 are *required* to take this course. Two credits per quarter; autumn, winter, spring. Richardson

*114-115-116. *Renaissance and Reformation.*

*117-118-119. *France from the Reformation to the French Revolution.*

*121-122-123. *Prussia and Northern Europe.*

125. *Turkey and the Near East, 1453-1921.*—This course deals with the Near Eastern question: the rise, expansion and decline of the Ottoman Empire and the awakening and modern development of the Balkan nations. Prerequisite, course 1-2, or 131. Five credits; spring. Eddy

129. *The French Revolution and Napoleonic Era.*—Prerequisite, course 1-2. Three credits; autumn. Eddy

130. *Europe, 1814-1870.*—European development from the Congress of Vienna to the foundation of the German Empire at the close of the Franco-German war. Prerequisite, course 1-2. Three credits; winter. Eddy

131. *Europe since 1870: The War and Its Background.*—The historical background, fundamental causes and progressive development of events and issues in the world war. Prerequisite, course 1-2, or upper division standing. Not open to freshmen. Five credits; spring. Richardson

*Not offered in 1921-1922.

139. *The Southern Colonies*.—Open only to juniors, seniors and graduates. Three credits; autumn. McMahon

140. *The New England Colonies*.—Open only to juniors, seniors and graduates. Three credits; winter. McMahon

141. *American Revolution*.—Open only to juniors, seniors and graduates. Three credits; spring. McMahon

*143-144-145. *History of the United States*.—Three credits. McMahon

147. *History of the Civil War Period*.—Open only to juniors, seniors and graduates. Three credits per quarter; autumn. McMahon

148. *History of the Reconstruction Period*.—Open only to juniors, seniors and graduates. Three credits per quarter; winter. McMahon

149. *History of National Development*.—The development of the American nation from the close of the reconstruction period to the present time. Open to juniors, seniors, graduates and to such sophomores as have completed course 57-58. Five credits per quarter; spring. McMahon

153. *The Pacific Rim*.—History of the countries bordering upon the Pacific Ocean with especial reference to recent changes. Open to juniors, seniors and graduates. Three credits per quarter; autumn. Meany

154. *Spain in America*.—The rise and fall of Spanish power in America, and an outline of the history of the Spanish-American republics. Three credits per quarter; winter. Open to juniors, seniors and graduates. Meany

155. *History of Canada*.—Canadian development to the present time. Open to juniors, seniors and graduates. Three credits per quarter; spring. Meany

157-158-159. *History of American Diplomacy*.—American relations with foreign powers from colonial times to the present. Open to juniors, seniors and graduates. Two credits per quarter; autumn, winter and spring. Meany

163-164-165. *Northwestern History*.—From the earliest voyages to the Pacific Northwest to the organization of the present form of government. Open to juniors, seniors and graduates. Two credits per quarter; autumn, winter and spring. Meany

*171-172-173. *Hellenism*.

*Not offered in 1921-1922.

*175. *Ancient Imperialism.*

*176. *History of Ancient Law.*

196. *Methods of Teaching History.*—Required of advanced students who expect to teach history. Five credits per quarter; spring. (See requirements of department.) McMahon

GRADUATE COURSES

*201-202-203. *Historical Criticism and Historiography.*—Two credits per quarter; autumn, winter and spring.

*215-216-217. *Seminar in English History.* Richardson

218-219-220. *Seminar in Historical Background of World War.*—Prerequisite, ability to read German or French. Open to graduate students, and to seniors who obtain consent of the instructor. Two to four credits per quarter; autumn, winter, spring. Richardson

221-222-223. *Seminar in American History.*—Two credits per quarter; autumn, winter and spring. McMahon

227-228-229. *Seminar in State History.*—Two credits per quarter autumn, winter and spring. Meany

HOME ECONOMICS

Home Economics Hall

PROFESSOR RAITT; ASSISTANT PROFESSORS DENNY, PATTY, AMERY, KOEHNE;
INSTRUCTORS, DRESSLAR, LUSBY

(For curricula in Home Economics see page 81)

1. *Cookery.*—General elective for students who do not major in this department. It includes study of marketing, cookery, meal planning and service. Laboratory work to accompany Home Economics 54, 55, and 56. Laboratory fee, \$6. Three credits; autumn or winter. Dresslar

2. *Elements of Nutrition.*—General elective for students who do not major in this department. It includes studies of choice of food for the individual, the family group, children, and diet for the sick and convalescent. Family food budgets. Laboratory work to accompany H. E. 54, 55, 56. Laboratory fee, \$6. Three credits; spring. Dresslar

3. *Elements of Home Management.*—General elective for students who do not major in this department. A study of household textiles, clothing budgets, home furnishing, household accounts and budgets. Laboratory fee, \$2. Three credits; winter. Denny

*Not offered in 1921-1922.

4. *Foods: Principles and Practice of Food Preparation.*—Students who have credit for cookery in high school are exempt from this course. Laboratory fee, \$6. Three credits; autumn.

Dresslar

5-6. *Foods: Selection and Preparation.*—Prerequisite, course 4 or one year high school cookery or equivalent, Chem. 5-6, Physiology 8. Laboratory fee, \$6. Five credits per quarter; autumn, winter, spring.

Dresslar

7. *Home Economics Survey.*—Analysis of the subject. Relation to supporting courses. Budgets and accounts. Required of all freshmen majoring in home economics. Two credits; autumn, winter or spring.

Raitt

8. *Clothing.*—Elements of hand and machine sewing. Study of materials, design and construction. Comparison with factory made garments. Problems of garment making. Students who have credit for high school clothing are exempt from this course. Laboratory fee, \$2. Three credits; spring.

Denny

25. *Textiles and Clothing.*—Identification and testing of fabrics. Economics of the textile industry. Comparative values in all types of clothing including fur and leather. Hygiene of clothing. Care and renovation. Clothing budgets. Laboratory fee, \$4. Five credits.

Denny

27. *Non-Textiles.*—A study of merchandise from non-textile sources, such as leather, rubber, paper and metals. Raw materials, sources of supply, manufacture, methods of judging. A classification of retail stores' departmental stock. Laboratory fee, \$4. Three credits; winter.

Denny

32. *Clothing.*—General elective for students who take no other work in this subject. Designing and making of simple dresses, study of accessories, clothing budgets. Laboratory fee, \$4. Three credits; autumn.

Patty

35. *Clothing.*—General elective for students who take no other work in this subject. Designing and making of simple dresses. Study of clothing accessories. Clothing budgets. Laboratory fee, \$4. Two credits; winter.

Patty

43. *Housewifery.*—Selection, sanitation and care of the equipment and material of the household. Laboratory deposit, \$2. Three credits; autumn or winter.

Dresslar

54-55-56. *Food and Nutrition.*—A study of food in relation to health. Required of all second year women. One lecture per week. Course 1 and 2 are laboratory courses to parallel or follow these lectures. One credit; autumn, winter, spring.

Amery

101-102. Needlework:—History of lace and needlecraft. Application of principles of design to modern needlework. Prerequisite, course 8 and P. S. & D. 3. Laboratory fee, \$2. Two credits per quarter; winter, spring. Denny

103. Foods:—Comparative studies of Food Materials and Cooking Processes. Prerequisite, course 5-6. Laboratory fee, \$4. Three credits per quarter; spring. Dresslar

105-106. Nutrition: Elementary Dietetics.—*Function and nutritive value of foods.* An elementary course for nurses, social service students and for those wishing to obtain a practical knowledge of nutrition as a part of a liberal education, but who will not teach this subject. Prerequisite, course 4, Chem 5-6, Physiology 8. Laboratory fee, \$6. Four credits; autumn and winter. Koehne

107-108. Nutrition:—*Dietetics.—Principles of Human Nutrition.* For those expecting to teach home economics or to enter professions related to food and nutrition. Prerequisite, course 5-6, Chem 135-136. Laboratory fee, \$6. Breakage ticket \$4. Five credits; autumn, winter. Koehne

112-113. Clothing.—*Costume design and construction.*—Principles of design applied to dress and dress accessories. Practice in selection and construction. Prerequisite, course 8 and P. S. & D. 3. Laboratory fee, \$4. Five credits, autumn, winter, spring. Patty

121. Large Quantity Cookery.—Preparation of food in large quantities for cafeterias, tea rooms, dormitories, hospitals and camps. Prerequisite, course 5-6. Laboratory practice. Laboratory deposit, \$4. Four credits; winter. Lusby

122. Buying and Dietaries.—Marketing, buying, institution equipment and supplies. Planning menus for dormitories, hospitals, cafeterias and tea rooms. Prerequisites, course 5-6 and 107-108. Three credits; spring. Lusby

123. Institutional Management.—A study of the problems of various types of institutions, relating to their organization and operation, relation to the state and community, employment of help. Three lectures. Prerequisites, course 5-6, 107-108 and 122. Three credits; spring. Raitt

124. Practice Work I.—At least nine hours per week spent in the different departments of the University Commons and University dormitories, under supervision of the instructor in charge. Conferences, service in food preparation. Prerequisites, course 5-6, 107-108. Three credits; autumn, winter or spring. Lusby

125. *Practice Work II.*—Eight hours' work off the campus among the following: tea rooms, cafeterias, school lunch rooms, hospitals. Conferences, services in food preparation. Prerequisite, course 124. Three credits; autumn, winter or spring. Lusby

130. *Clothing: Costume Design and Construction.*—Designing and draping on the form, practice in dress construction, and a study of trade conditions. Prerequisites, course 112-113, P. S. & D. 3, P. S. & D. 169. Laboratory fee, \$4. Five credits; spring. Patty

133. *Clothing: Costume Design.*—Development of fashion from ancient times to the present with emphasis upon the best art periods. Adaptation to the present mode. Prerequisites, course 112-113, P. S. & D. 3 & 169. Three credits, spring. Laboratory fee, \$4. Patty

135. *Millinery.*—Design, selection, practice in construction. Study of trade methods and materials. Prerequisites, course 8 or equivalent, P. S. & D. 3. Laboratory fee, \$4. Three credits, autumn. Patty

143. *Home Furnishing.*—Application of structural art principles to choice and arrangement of household furnishings. Comparative costs. Prerequisite, P. S. & D. 3. Laboratory fee, \$4. Three credits; autumn, spring. Denny

144-145. *Household Management.*—Organization of the household. Application of scientific principles to the household. A study of scientific management. Household budgets. Household accounts. Prerequisites, course 5-6, 105-106 or 107-108, Arch. 101-102, Physics 89-90, Bact 101, Econ 1, Sociology 1. Three credits; winter, spring. Raitt

146-147. *Teacher's Course.*—Curricula, methods of teaching and equipment. Prerequisite, course 5-6, 107, 112-113, 143, 144, 145; P. S. & D. II, 1; Physics 89-90; Bact 101. Three credits; autumn, winter. Raitt, Denny

148. *Practice Cottage.*—Seniors are required to live in Practice Cottage three weeks. Two credits. Amery

188. *Advanced Textiles.*—Intensive study of fabric values. Historic textiles and tapestries. Dyeing of yarns and fabrics. Hand weaving. Prerequisite, H. E. 25, Economics. Laboratory fee, \$4. Two credits; spring. Denny

189. *Special Food Problems.*—Investigation of food products, nutrition, individual assignments. Prerequisite, course 106 or 107. Laboratory fee, \$2. Three credits; autumn. Raitt

190. *Nutrition: Developments in the Science of Nutrition.*—Library research. Open to advanced undergraduates and graduates. Prerequisite, course 107-8. Two credits; spring. Koehne

191. *Advanced Nutrition.*—A study of normal and *abnormal metabolism*. Two lectures and one or two laboratory periods. Open to senior and graduate students. Prerequisite, course 107-108. Laboratory fee, \$4. Three to four hours credit; winter. Koehne

192. *Advanced Nutrition.*—An intensive study of the *dietary deficiency diseases*. Two lectures and one or two laboratory periods. Open to seniors and graduate students. Prerequisite, course 107-108. Laboratory fee, \$4. Three to four hours credit; winter. Koehne

193. *Advanced Nutrition.*—A special study of the *undernourished child*. Two lectures and one or two laboratory periods. Open to seniors and graduate students. Also open to nurses and social service students. Prerequisite, H. E. 105-106-107-108. Laboratory deposit, \$2. Three to four hours credit; spring. Koehne

GRADUATE COURSES

200. *Special Food Problems.*—Investigation of local food products. Prerequisite, courses 5-6, 107, 189, Chem 108. Laboratory fee, \$2. Three credits, spring. Raitt

202. *Seminar.*—A study of the present status of home economics education with special attention to the work in the elementary and high schools of the state of Washington. Prerequisite, 30 credits in home economics, including course 146-7. Four credits. Raitt

203. *Research.*—Investigation of recent discoveries in the biological or physical sciences of immediate value to the housewife and consideration of methods for their utilization. Credits to be arranged. Raitt

204-205-206. *Research in Nutrition.*—Animal experimentation on some special problem. Open to graduate students. Prerequisites, course 107-108. It is highly desirable that this course be accompanied by 191, 192, & 193. Open all three quarters. Two to three credits per quarter. Laboratory fee, \$4. Koehne

207. *Research in Textiles.*—Prerequisite, course 25, Economics 1. Laboratory fee, \$2. Denny

JOURNALISM

Commerce Hall

PROFESSOR SPENCER; ASSISTANT PROFESSORS KENNEDY, CASEY, JONES;
INSTRUCTOR, HICKLIN

61. *The Country Newspaper*.—The country newspaper field; makeup of the country paper; problems peculiar to the country weekly. Two lecture hours and one laboratory period a week. Required in the sophomore year of pre-journalism majors. Laboratory fee, \$2 per quarter. Two credits per quarter; autumn. Jones

75-76. *Elements of Publishing*.—Head styles, construction, and harmony; proof-reading; binding, engraving, press work, and modern appliances; problems of production; actual practice in the journalism laboratory. Required in the sophomore year of pre-journalism majors. Laboratory fee, \$2 per quarter. One credit per quarter; winter, spring. Kennedy

90-91-92. *Current Events*.—Current state, national, and world movements; extensive readings in current periodicals. One quarter required of majors in journalism. Prerequisite, Journalism 51. Laboratory fee, \$1. One credit per quarter; autumn, winter, spring. Jones

101. *Reporting*.—Study of all types of stories covered by a reporter; practical assignments. Required of majors in journalism. Prerequisite, Journalism 51. Laboratory fee, \$2. Five credits per quarter; spring. Hicklin

104. *Newspaper Administration*.—Newspaper organization, administration, and management; activities and relations of the various departments. Prerequisite, Journalism 51. Laboratory fee, \$1. Two credits per quarter; winter. Spencer

105. *The Sporting Page*.—Duties and responsibilities of the sporting editor; practical experience in covering athletic events. Prerequisite, Journalism 51. Laboratory fee, \$1. Two credits per quarter; spring. Hicklin

109. *Literary and Dramatic Reviewing*.—Routine work of the literary and dramatic editors; study of successful book reviews and dramatic criticisms; practical assignments. Prerequisite, Journalism 51. Two credits per quarter; spring. Jones

120. *Copy Reading*.—Copy reading; head writing; rewriting; general desk work. Required of majors in journalism. Prerequisite, Journalism 101. Laboratory fee, \$2. Five credits per quarter; autumn, winter, spring. Hicklin

130. *Fundamentals of Advertising*.—Fundamentals of newspaper and periodical advertising; advertising ethics. Laboratory fee, \$2. Five credits per quarter; autumn. Jones

131. *Display Advertising*.—Study of successful advertisements; preparation of copy; the layout; retail advertising and the newspaper. Prerequisite, Journalism 130. Laboratory fee, \$2. Five credits per quarter; winter. Jones

133-134-135. *Advertising Typography*.—Type families; application of type; advertising type units; type problems. Laboratory fee, \$2 per quarter. Two credits per quarter; autumn, winter, spring. Kennedy

136. *Comparative Journalism*.—Types of English-language newspapers; style; makeup; heads; policies. Prerequisite, Journalism 101 and 120. Laboratory fee, \$2. Two credits per quarter; winter. Jones

138. *History of Journalism*.—Problems of newspaper editing and publishing in the light of their origin and development; history of American journalism. Required of majors in journalism. Prerequisite, Journalism 51. Three credits per quarter; autumn. Spencer

140-141-142. *The Business Office*.—Cost finding, estimating, and simplified accounting for newspaper plants; selling commercial printing; business office management. Required of majors in journalism. Laboratory fee, \$2 per quarter. Two credits per quarter; autumn, winter, spring. Kennedy

150. *Editorial Writing*.—Editorial policy; newspaper ethics; theory and practice of interpreting current news by means of the editorial; daily assignments. Required of majors in journalism. Prerequisite, Journalism 101 and 120. Five credits per quarter; spring. Jones

160. *Trade Journalism (I)*.—Agricultural, horticultural, poultry, and general farm publications. Prerequisite, Journalism 51. Laboratory fee, \$1. Two credits per quarter; autumn. Jones

161. *Trade Journalism (II)*.—Business and trade publications. Prerequisite, Journalism 51. Laboratory fee, \$1. Two credits per quarter; winter. Jones

162. *Trade Journalism (III)*.—Class publications and house organs. Prerequisite, Journalism 51. Laboratory fee, \$1. Two credits per quarter; spring. Jones

170-171-172. *Magazine and Feature Writing*.—Practice in writing special newspaper and magazine articles; study of current magazines and newspaper supplements. Articles are graded according to their probable marketability. Prerequisite, Journalism 51. Laboratory fee, \$2 per quarter. Two credits per quarter; autumn, winter, spring. Spencer

173. *The Short Story*.—Critical appreciation of the short story; extensive readings. Laboratory fee, \$2. Three credits per quarter; autumn. Spencer

174-175. *Short Story Writing*.—Prerequisite, Journalism 173. Laboratory fee, \$2 per quarter. Three credits per quarter; winter, spring. Spencer

188. *News Writing for Teachers*.—Methods and problems of teaching news writing in high schools. Two credits per quarter; spring. Jones

GRADUATE COURSE

250. *Research in Journalism*.—Admission only by consent of the instructor. Three to five credits per quarter; autumn, winter, spring. Spencer

LAW

Commerce Hall

PROFESSORS CONDON, LANTZ, GOODNER, BISSETT, AYER; LECTURER O'BRYAN

FIRST YEAR

All first year courses required

100. *Agency*.—Wambaugh's Cases. Five credits; spring. Ayer

103-104. *Contracts*.—Williston's Cases. Five credits per quarter; autumn and winter. Lantz

106-107. *Criminal Law and Procedure*.—Derby's Cases supplemented by Washington Criminal Code and Cases. Three credits per quarter; autumn and winter. O'Bryan

108-109. *Pleading and Procedure*.—Sunderland's Cases on Common Law Pleading, and Sunderland's Cases on Code Pleading, and Washington Code and Cases. Five credits per quarter; winter and spring. Goodner

115. *Property I.—Personal*.—Bigelow's Cases, Vol. I. Three credits; autumn. Bissett

116. *Property II.—Real*.—Bigelow's Cases, Vol. II. Five credits; spring. Bissett

117-118. *Torts*.—Bohlen's Cases. Four and two credits respectively; autumn and winter quarters.

SECOND YEAR

125-126. *Equity*.—Ames' Cases in Equity Jurisdiction, Vol. I and II. Three credits per quarter; autumn and winter. Ayer

128. *Damages*.—Beale's Cases on Damages, supplemented by Washington Cases. Three credits; spring. O'Bryan

129-130. *Evidence*.—Wigmore's Cases. Five and four credits, respectively; autumn and winter. Condon

133. *Insurance*.—Vance's Cases. Three credits; spring. Lantz

137. *Negotiable Instruments*.—Huffcut's Cases. Three credits; winter. Bissett

138. *Quasi-Contracts*.—Woodruff's Cases. Three credits; spring. Lantz

139-140. *Property II. (continued)*.—Aigler's Cases, Vol. III, and Kale's Cases, Vol. IV; autumn and winter quarters, four and two credits, respectively. Bissett

142-143. *Public Utilities*.—Beale and Wyman's Cases. Three credits per quarter; winter and spring.

146-147. *Sales*.—Woodward's Cases. Three credits per quarter; winter and spring. Ayer

161. *Procedure IV*.—This course relates to procedure in civil actions in the Superior Court of Washington. Five hours. Three credits; autumn. Goodner

179. *Partnership*.—Gilmore's Cases. Three credits; spring. O'Bryan

THIRD YEAR

153. *Property III*.—Aigler's Cases, Vol. III, and Kale's Cases, Vol. IV. Three credits; autumn. Bissett

159. *Wills*.—Costigan's Cases. Three credits; autumn. Goodner

163. *Procedure VI*.—A course in Probate Proceedings, covering administration of estates, probate of wills, appointment of guardians, etc. Five hours. Four credits; winter. Goodner

165. *Admiralty*.—Ames' Cases. Three credits; autumn. Lantz

166. *Office Practice*.—Conveyancing and examination of abstracts, care of a law office generally, drawing wills and contracts, preparation of briefs and office accounts. Five credits; spring. Condon

168. *Conflict of Laws*.—Lorenzen's Cases. Five credits; winter. Lantz

170-171. *Constitutional Law*.—Hall's Cases. Three credits per quarter; autumn, winter. Bissett

188. *Private Corporations*.—Canfield and Wormser's Cases. Three credits per quarter; autumn and winter.

191. *Property: Community*.—Washington Statutes and selected cases on community property. Five credits; spring. Bissett

196. *Trusts*.—Kenneson's Cases. Five credits; spring. Goodner

NOTE—Fifteen hours or credits in each quarter are required, making a minimum total of 135 hours or credits for completion of the law course.

Students are limited to fifteen hours per quarter, except upon special permission of the dean, and payment of an additional fee of \$1 per credit hour in excess of fifteen.

LIBRARY SCIENCE

Library

PROFESSOR HENRY; ASSOCIATE PROFESSOR SMITH; INSTRUCTORS, HOWE, SPENCER, BLODGETT

1. *Use of the Library*.—An elective course open to any student in the University, but especially designed as an introduction for those who expect to enter the Library School. Lectures will be given on the arrangement of the library, on classification and cataloging of the books, on some of the general reference material, and on library organization and usage. One hour per week; repeated each quarter. Staff

Registration in any quarter limited to thirty, preference given to those expecting to enter the Library School.

The following courses are not open to students not registered in the Library School.

173. *Order, Accession and Trade Bibliography*.—In this course the routine of ordering, receiving, checking, accessioning and mechanical preparation of books, and the elements of trade bibliography are treated. One credit; autumn. Blodgett

174. *Circulation Administration*.—Covers charging systems, registration of borrowers, circulation of books and circulation records. One credit; autumn. Howe

175. *Classification and Subject Headings*.—The Decimal classification is studied in detail, followed by a brief survey of the Expansive and the Library of Congress classifications. The use of subject headings is considered early in the quarter and much of the prepared work consists of the classification and assignment of subject headings to specified books. Three credits; autumn. Spencer

176, 184. *Cataloging*.—The subject is taught largely by means of examples illustrating cataloging rules. Some attention is also given to the subjects of book numbers, shelf-listing, authorities, and

alphabeter. Much of the work is done in periods of supervised study, but some unsupervised work is also required. Three credits per quarter; autumn and winter. Spencer

177, 185, 193. *Reference*.—The purpose of these courses is to give a working knowledge of important types of reference books and to develop the power of research. Lectures cover books and methods. Practical problems are assigned and worked out. These courses include also the work with government documents. Two credits per quarter; autumn, winter, spring. Smith

194. *Subject Bibliography*.—Practical work in the preparation of bibliographic lists; lectures on sources and methods of work. Problems cover arrangement and form of entry. One piece of independent bibliographic work is required of each student. Two credits; spring. Smith

186, 195. *Practice*.—Each student is expected to do 300 hours of practice or laboratory work under expert personal supervision as a test of practical ability and as an opportunity to exhibit personality in service. The practice work is given in both the University Library and the Seattle Public Library, and consists of 15 hours per week for twenty weeks. Five credits per quarter; winter, and spring.

178. *History of Books and Libraries*.—Lectures, readings and reports. Two credits; autumn. Henry

187. *Library Organization and Extension*.—In this course such subjects are treated as legalization and organization of a general library system for city, county or state, as the unit of organization; also the organization of various types of libraries with varying degrees of equipment. Two credits; winter. Henry

179, 188, 196. *Book Selection*.—Designed to cultivate taste and good judgment in the evaluation of books through a study of the principles of book selection, annotation and book reviewing. Three credits autumn. Two credits; winter and spring. Howe

197. *Library Administration and Library Literature*.—Lectures, readings and discussions upon library legislation, local taxation, library budget, and all means and instruments for realizing the educational and social functions of the library. Reading and class discussion of the literature of libraries and librarianship, including library periodicals and the publications of library organizations, with special emphasis upon the best papers in the A.L.A. Proceedings for recent years. Two credits; spring. Henry

189. *Work with Children and Schools*.—This course is planned to meet the needs of general library assistants and librarians in charge of small libraries. It deals with principles of book selection

with special attention to choice of books for children of various ages. Students read and discuss children's books with these ideals in mind. Two credits; winter. Howe

198. *Special Lectures by Active Librarians.*—Ten lectures are given by as many persons, each upon some vital problem of library service or administration. These persons are selected because of their experience and success in dealing with the problems treated. One credit; spring.

199. *Study of a Selected Public Library.*—Each student is required to make a study of some specific public library reasonably near Seattle, and to write a report upon its general policy and plans of organization, extension and administration. One credit; spring. Henry

MATHEMATICS

Philosophy Hall

PROFESSOR MORITZ; ASSOCIATE PROFESSORS CARPENTER, WINGER, BELL; ASSISTANT PROFESSORS GAVETT, NEIKIRK; INSTRUCTORS, SMALL, WEST, STAGER; ASSOCIATES, MULLEMEISTER, HAMILTON, CRAMLET, TAYLOR

REQUIREMENTS OF THE DEPARTMENT

For a major in mathematics, 36 credits, including courses 5 and 109.

Candidates for the normal diploma must complete course 127 (teachers' course) in addition to the major requirement.

Candidates who are not majors in mathematics but wish to teach mathematics as a minor subject must have earned at least 15 credits in mathematics, including courses 4 and 5, before receiving the recommendation of the department.

Major students in mathematics should, if possible, select their courses in mathematics in the following order: Math. 4, 5, 6, 107, 108, 109. In addition they should elect physics as their freshman science and take solid geometry (Math. 2) in their freshman year.

1. *Advanced Algebra.*—Algebra from quadratics on. Prerequisite, one year of high school algebra. Five credits autumn, winter.

2. *Solid Geometry.*—Prerequisite, one year of plane geometry. Five credits; winter, spring.

4. *Plane Trigonometry.*—For students in the Colleges of Liberal Arts, Science, Education, Fisheries, Law, and Pharmacy. Prerequisites, one year of algebra and one year of plane geometry. Five credits; each quarter.

5. *College Algebra.*—Prerequisite, course 1 or one and one-half years high school algebra. Five credits; winter.

Winger, Mullemeister

6. *Analytical Geometry*.—Primarily for students in the College of Science. Prerequisite, courses 1, 2, and 4. Five credits; spring. Winger

11-12. *Theory of Investments*.—Primarily for students in commerce. A two quarter course. The first quarter's work deals with the preliminary processes of algebra, together with applications to problems in interest and annuities. The second quarter's work deals with annuities, amortization, capitalization and depreciation, sinking funds, bond values, building and loan associations. This is followed by a brief study of life contingencies, applied to the computation of single and annual premiums on life policies. Prerequisite, one year algebra, one year geometry. Five credits per quarter; autumn, winter, spring.

13. *Elements of Statistical Methods*.—Data obtained by observation, enumeration or estimate, and their application to interpreting social and natural phenomena. Prerequisite, one year algebra, one year plane geometry. Five credits each quarter.

Gavett, Stager

51. *Higher Algebra*.—Primarily for students in the Colleges of Engineering and Mines. Prerequisite, one and one-half years algebra, one year plane geometry. Five credits; each quarter.

Gavett, Stager

52. *Trigonometry*.—Primarily for students in the Colleges of Engineering and Mines. Prerequisite, course 51. Four credits; each quarter.

53. *Analytical Geometry*.—Primarily for students in the Colleges of Engineering and Mines. Prerequisite, course 52. Four credits; each quarter.

54, 55, 56. *Mathematics for Foresters*.—A study of advanced numerical and graphical methods and solution of plane triangles by trigonometric methods. Prerequisite, one and one-half years algebra, one year plane geometry. Three credits per quarter; autumn, winter and spring. Gavett

57, 58, 59. *Mathematics for Architects*.—Algebra through quadratic equations and plane trigonometry through solutions of triangles. Advanced topics in algebra; the elements of analytical geometry; elementary differential and integral calculus. Prerequisite, one year algebra, one year plane geometry. Three credits per quarter; autumn, winter, spring. Gavett

61, 62, 63. *Calculus*.—Primarily for students in the Colleges of Engineering and Mines. Prerequisites, courses 2 and 53. Three credits per quarter; autumn, winter, spring.

101. *Spherical Trigonometry with Applications*.—Prerequisite, course 2 and 4. Two credits; autumn. Smail

102, 103. *Solid Analytical Geometry*.—Prerequisite, course 8 or 63. Two credits per quarter; winter, spring. Smail

107, 108, 109. *Calculus*.—Elements of differential and integral calculus, primarily for students in the College of Science. Prerequisite, course 6. Five credits per quarter; autumn, winter, spring. Moritz.

115, 116. *Ordinary and Partial Differential Equations*.—With applications to problems in physics, chemistry, astronomy and engineering. Prerequisite, course 108 or 63. Three credits per quarter; winter, spring. Neikirk

117, 118, 119. *Projective Geometry*.—An analytic treatment. The relation of projective to metric geometry is emphasized. Prerequisite, course 8 or 61. Two credits per quarter; autumn, winter, spring. Winger

127. *Teachers' Course*.—Required of those who make mathematics their major study and who are applicants for the teachers' certificate. Prerequisite, course 109. Five credits; autumn. Winger

151. *Mathematical Theory of Finance*.—This course is especially designed to meet the needs of expert accountants, of majors in business administration, and of majors in mathematics who wish to turn their mathematics to account in business. The course includes a comprehensive study of the theory of interest and discount symmetrically developed; valuation of annuities; determination of rates of income; valuation of redeemable and irredeemable securities; capitalization and depreciation; sinking funds and amortization of expenditures and of options; construction and use of bond tables; Makeham's Formula. Prerequisite, a thorough working knowledge of algebra. Three credits; autumn. Moritz

152. *Mortality Tables*.—Various methods of graduation of tables; probabilities of life; expectations of life; force of mortality; probabilities of survivorship; DeMoivre's, Gompertz and Makeham's formulas for the law of mortality. Lubbock's summation formula; the life table and its uses. Prerequisite, a thorough working knowledge of algebra. Three credits; winter. Moritz

153. *Insurance—Premiums and Reserves*.—Life annuities and assurances; single and annual premiums with and without premiums returns; commutation columns; conversion tables; joint life annuities and assurances; relation between annuities and assurances; varying benefits; policy values; surrender values; life interest and reversions. Prerequisite, course 151 and 152. Three credits; spring. Moritz

161, 162, 163. *Analytical Mechanics*.—The aim of the course is to familiarize the student with the foundation principles—D'Alembert's, Hamilton's, Lagrange's—necessary to read intelligently the literature of the subject. Specific applications will be prominent throughout the course. Prerequisite, course 109. Two credits per quarter; autumn, winter, spring. Bell

GRADUATE COURSES

201, 202, 203. *Introduction to Projective Differential Geometry*.—Projective theory of plane and space curves, surface and line congruences, as developed from certain differential equations and their invariants. Prerequisites, courses 119 and 116. Three credits per quarter; autumn, winter, spring. Carpenter

204, 205, 206. *Modern Algebra*.—An introduction to the theories of linear dependence, matrices, linear transformations, invariants and covariants, trilinear and quadratic forms, and elementary divisors and equivalence of matrices. Three credits per quarter. Moritz

*207, 208, 209. *Infinite Series*. Smail

*211, 212, 213. *Foundations of Mathematics*.

*214, 215, 216. *Complex Variable*.

*217, 218, 219. *Elliptic and Theta Functions*.

*221, 222, 223. *Higher Plane Curves*. Smail

*224, 225, 226. *Real Variables*. Smail

251, 252, 253. *Mathematical Journal and Research Club*.—Meets on the second Thursday of each month in Philosophy Hall, room 137, at 5 p. m. The club consists of advanced students and teachers in the department of mathematics. The purpose of the club is primarily to discuss the research work carried on by members of the club, and secondarily to review important recent mathematical literature. Prerequisite, open to all graduate students in mathematics. No credit; autumn, winter, spring.

MECHANICAL ENGINEERING

Engineering Hall

PROFESSOR EASTWOOD; ASSOCIATE PROFESSORS WILSON, WINSLOW;
INSTRUCTORS, MCINTYRE, BEATTIE, KANE, MCMINN, EDMONDS, STRUBE

1, 2, 3. *Woodwork*.—Bench work; cabinet work; pattern making. Laboratory deposit, \$2. One credit per quarter; autumn, winter, spring. Beattie

53, 54, 55. *Metalwork*.—Foundry; forge; machine work. Laboratory deposit, \$2. One credit per quarter; autumn, winter, spring.
Kane

70. *Marine Gas Engines*.—Arranged for the short course in fisheries. Two credits; winter.

71. *Airplane Gas Engines*.—Arranged for military science department. Two credits; spring.

81. *Mechanism*.—The operation of machines involving the transmission of forces and the production of determinate motions. Prerequisite, C. E. 2, Math. 52. Three credits; autumn, winter, spring.
Wilson, Winslow, McIntyre, McMinn

82. *Steam Engineering*.—The various forms of steam apparatus used in modern steam plants; their construction, use, and reason for their installation. Not open to freshmen. Prerequisite, C. E. 2. Three credits; autumn, winter, or spring.
Eastwood, Winslow, McMinn

83. *Steam Engineering Laboratory*.—Calibrations of thermometer, gages, indicator springs, etc.; tests of the simple steam engine; one complete engine and boiler test with report. Preceded or accompanied by M. E. 82. Laboratory deposit, \$2. Three credits; autumn, winter, spring.
Wilson, Winslow, McIntyre

91, 92, 93. *Machine Design*.—The design of machine details. Preceded or accompanied by M. E. 81. Prerequisite, C. E. 2. Two credits per quarter; autumn, winter or spring
McIntyre, Edmonds

101, 102, 103. *Machine Design*.—The design of hoisting and pumping machinery; special machines. Prerequisite, M. E. 93, C. E. 132. Two credits per quarter (103, three credits); autumn, winter, spring.
Winslow

105, 106, 107. *Metalwork*.—Advanced machine shop practice. Prerequisite, M. E. 55. Laboratory deposit, \$2. One credit per quarter; autumn, winter, spring.
Kane

108. *Metalwork*.—Manual arts for teachers. Prerequisite, M. E. 107. One credit; autumn, winter, or spring.
Kane

109. *Woodwork*.—Manual arts for teachers. Prerequisite, M. E. 3. One credit; autumn, winter or spring.
Beattie

123, 124. *Engines and Boilers*.—The generation and use of steam in various types of boilers and engines. Three lectures per week first quarter; two lectures and three laboratory periods per week, second quarter. Prerequisite, M. E. 82, 93, C. E. 131. Three credits per quarter; autumn, winter.
Winslow

151, 152, 153. *Experimental Engineering*.—A continuation of M. E. 83, involving more extended and complete investigations. Prerequisite, M. E. 83. Laboratory deposit, \$2. Three credits per quarter; autumn, winter, spring. Wilson, Winslow

167. *Engineering Materials*.—The properties of the various materials used in engineering construction, including iron, steel, reinforced concrete, timber, etc. Recitation and laboratory. Prerequisite, C. E. 132. Junior mechanical engineers. Laboratory deposit, \$2. Three credits; winter and spring. Winslow, McMinn

179. *Steam Turbines*.—The theory, construction and design of steam turbines. Prerequisite, M. E. 82. Three credits; autumn. Eastwood

182. *Heating and Ventilation*.—The various systems of heating and ventilating, methods or design and tests. Prerequisite, M. E. 82. Three credits; autumn, winter. Eastwood

183. *Thermodynamics and Refrigeration*.—The fundamental principles underlying the transformation of heat into work, with special application to engineering. Prerequisite, M. E. 82. Five credits; autumn. Eastwood

184. *Power Plants*.—The design of steam power plants, involving their location, buildings, prime movers, power transmission, etc. Prerequisite, M. E. 123, 83. Three credits; spring. Eastwood

185, 186, 187. *Naval Architecture*.—The theory of naval architecture, as pertains to displacement, stability and strength, and the usual calculations involved in construction. Not open to freshmen. Three credits per quarter; autumn, winter, spring. Eastwood

188, 189. *Ship Design*.—Application of the principles of naval architecture to the design of a ship for a definite purpose. Prerequisite, M. E. 186. Two credits per quarter; autumn and winter. Eastwood

190. *Marine Engineering*.—The power plant equipment of ships, including boilers, engines, auxiliaries and propellers. Prerequisite, M. E. 82, 185. Three credits; spring. Eastwood

198. *Gas Engineering*.—The development of gas engineering, including stationary, marine, automobile and airplane motors, and gas producer plants. Prerequisite, M. E. 82. Three credits; autumn and winter. Wilson

199. *Gas Engine Design*.—Calculations and plans for the design of a given type of motor. Prerequisite, M. E. 198. Three credits; spring. Wilson

GRADUATE COURSES

210. *Thesis*.—An investigation, design or experiment under the direction of the professor in charge. Three credits; senior year. Eastwood, Wilson, Winslow

211. *Research*.—Time to be arranged. Three credits per quarter. Eastwood, Wilson

MILITARY SCIENCE AND TACTICS

The Armory

COLONEL PHILLIPS; LT. COLONEL PLATT, LT. COLONEL MAIZE; MAJOR ESTY, MAJOR MUHLENBERG, MAJOR FRAZER, MAJOR DENNIS, MAJOR GREGORY; CAPTAIN MEREDITH, CAPTAIN PRIEST; FIRST SERGEANTS THOMAS, MCGINLEY; STAFF SERGEANT WHITE; SERGEANTS LANG, BOYLE, BAILEY, ROGERS, KENT, LINTON, AARON, BROCKETT, PALMS; PRIVATES PAYNE, SKINNER, HENSOHEL

All male students in the University who are American citizens, and not physically disqualified, are required to take military training throughout the first two years of attendance. The present requirement is five hours per week.

The instruction of these two years, together with that provided for the third and fourth years, constitute the courses prescribed by the War Department for institutional units of the Reserve Officers Training Corps. Three of these units have been established in this University, an Infantry Unit, a Coast Artillery Unit and an Air Service Unit, each leading to commissions as Reserve Officers in the appropriate Corps. The Advanced Courses, those of the third and fourth years, are open to all students who have completed the first two years—Basic Course—of instruction and training.

Much of the instruction and mental development acquired by the student from his regular college course is of the highest importance in his preparation to perform the duties of a military officer. This has been kept in mind in outlining the schedules of instruction and training for the several R. O. T. C. units to the extent of restricting such schedules to subject essentially military and which are not generally included in the curricula leading to graduation. It is evident, however, that in certain cases, there will be subjects requisite to his proper preparation for military duty which may not be included in the student's regular course for graduation. As to such subjects the University has authorized their listing as University electives whenever they are not included in the student's required subjects. To meet these requirements, the student desiring to complete the R. O. T. C. courses must present recorded collegiate credit in each such subject.

The following courses are listed as electives required under the conditions stated:

Infantry Unit and Air Service Unit.—Algebra, Math. 51—Trigonometry, Math. 52—Analytical Geometry, Math. 53—Surveying, C. E. 21.

Coast Artillery Unit.—Algebra, Math. 51-Trigonometry, Math. 11-12-13, Surveying, C. E. 21—Higher Surveying, C. E. 23.

These courses may be taken by the student at his convenience except that Surveying, C. E. 21, is prerequisite to higher surveying, C. E. 23.

Military History and Policy of the United States, Special Course, Department of History, and Military Law, Special Course, School of Law, must be registered for by the student taking fourth year's course R. O. T. C. for the second and third quarters respectively and with the respective departments named.

With the foregoing exceptions, all assignments for instruction and training will be made at the time of registration with the Military Department.

In addition to the above courses, the University has provided for those students who desire to major in Military Science a four-year curriculum which will give a good general college education upon which any line of professional or technical study may be based and which will give to the graduate the degree of B. S. in Military Science, and at the same time enable him to obtain a commission as second lieutenant in the Officers Reserve Corps of the United States Army in accordance with the provisions of the National Defense Act.

FIRST YEAR

One and two-thirds credits per quarter, five hours per week.

BASIC COURSE—ALL UNITS

1-2-3. *Practical.*—Organization, schools of soldier, squad, platoon and company. Close and extended order drill, first aid, interior guard duty, tent pitching, bayonet training, nomenclature and care of U. S. rifle, infantry equipment, military courtesy, personal hygiene, camp sanitation, ceremonies.

Summer Basic Camp—Optional after completion of first or second year's course.

SECOND YEAR

One and two-thirds credits per quarter, five hours per week.

BASIC COURSE—ALL UNITS

51-52-53. *Practical.*—Organization, leadership, nomenclature and care of U. S. service pistol, small arms practice.

SPECIAL COURSE—INFANTRY

61-62-63. *Practical.*—Bayonet, automatic rifle, machine guns, trench mortar, 37-mm. gun, grenades, musketry, minor tactics.

SPECIAL COURSE—COAST ARTILLERY

71-72-73. *Coast Artillery Materiel.*

SPECIAL COURSE—AIR SERVICE

81-82-83. *Air Service Materiel.*

THIRD YEAR

Three credits per quarter

BASIC COURSE—ALL UNITS

101. *Company Administration.*—First quarter, one hour per week.102. *Field Engineering.*—First quarter, one hour per week.103-104-105. *Leadership.*—Practical. Two hours per week.

SPECIAL COURSE—INFANTRY

111-112. *Minor Tactics.*—Second and third quarters, two hours per week.121. *Theoretical Military Service & Coast Artillery.*

SPECIAL COURSE—COAST ARTILLERY

127-128. *Ballistics and Gunnery.*—Second and third quarters. Two hours per week.

SPECIAL COURSE—AIR SERVICE

129-130. *Air Service Materiel.*—Second and third quarters. Two hours per week.*Summer Advanced Camp.*—Required of all under contract for Advanced Course; requisite for commission in Officers' Reserve Corps, U. S. army.132. *Theoretical Mil. Sci., C. A.*133. *Theoretical Mil. Sci., Coast Artillery.*

FOURTH YEAR

Three credits per quarter

BASIC COURSE—ALL UNITS

152. *Military History and Policy, U. S.*—Second quarter, one hour per week.153. *Military Law.*—Third quarter, one hour per week.161-162-163. *Leadership.*—Two hours per week.

SPECIAL COURSE—INFANTRY

151. *Minor Tactics.*—First quarter, two hours per week.164-165. *Minor Tactics.*—Second and third quarters, one hour per week.

SPECIAL COURSE—COAST ARTILLERY

171. *Coast Artillery Gunnery.*—First quarter, one hour per week.

174. *Organization of Artillery*.—First quarter, one hour per week.

175. *Ordnance*.—Second quarter, one hour per week.

176. *Tactical Problems*.—Artillery. Third quarter, one hour per week.

SPECIAL COURSE—AIR SERVICE

172. *Air Service Materiel*.—First quarter, two hours per week.

173-174. *Air Service Materiel*.—Second and third quarters, one hour per week.

METALLURGY

Mines Hall

PROFESSOR ROBERTS; ASSOCIATE PROFESSOR DANIELS, COREY;
ASSISTANT, MERRILL.

101. *Fire Assaying*.—The testing of reagents, the crushing, sampling and assaying of ores, furnace and mill products. Prerequisite, Chemistry 111. One recitation and three laboratory periods. Laboratory deposit, \$20. Five credits; autumn.

Corey, Glenn, Merrill

102. *General Metallurgy*.—The properties of metals and alloys, fuels, refractory materials; furnaces; and the extraction of the common metals from their ores. Visits to smelters. Prerequisite, junior standing. Three recitations and two laboratory periods. Laboratory deposit \$10. Five credits; spring.

Corey

103. *Metallurgical Fuels*.—The analysis of fuels and a consideration of the most effective utilization of the country's present supplies. Prerequisite, junior standing. Two recitations and one laboratory period. Laboratory deposit, \$5. Three credits; winter.

Daniels

104. *Non-ferrous Metallurgy*.—The metallurgy of copper, lead, gold and silver, especially the methods of roasting, smelting, lixiviation and refining. Prerequisite, Met. 102. Five recitations. Five credits; autumn.

Corey.

153. *Wet Assaying*.—Technical methods for the determination of copper, lead, zinc, etc., in ores and furnace products. For students in ceramics, the analysis of clays and ceramic products. Prerequisite, course Met. 102, Chemistry 111. One recitation and two laboratory periods. Laboratory deposit, \$12. Three credits; winter.

Corey

155. *Iron and Steel*.—The metallurgy and manufacture of commercial iron and steel, with especial reference to their properties and uses in engineering work. Prerequisite, junior standing. Three recitations. Three credits; autumn. Daniels

157. *Design of Plant*.—The design of a piece of equipment or a structure for mining, milling, or metallurgical purpose. Prerequisite, senior or graduate standing. Three drafting periods. Three credits; spring. Roberts, Daniels

158. *Minor Metals*.—The metallurgy of zinc, antimony, tin, aluminum, nickel, etc.; a study of the plant required, the methods and costs of treatment. Three credits; spring. Corey

160. *Metallurgical Analysis*.—Technical methods of analysis of slags and industrial products. Prerequisite, Met. 153. Two laboratory periods. Laboratory deposit, \$12. Two credits; spring. Corey

162. *Metallography*.—The constitution and microstructure of metals and alloys, especially iron and steel. Prerequisite, senior standing. Two recitations. Two credits; autumn. Corey

163. *Metallography*.—The preparation and study of metal sections, photomicrography and the use of the microscope in testing industrial alloys. Two laboratory periods. Laboratory deposit, \$5. Two credits; winter. Corey

165. *Metallurgy Calculations*.—Physical chemistry for the metallurgist, slag calculations, etc., illustrated by figures quoted from the present practice at a number of smelting plants. Prerequisite, senior standing. Two credits; winter. Corey

166. *Electro-Metallurgy*.—A study of methods and practice with special consideration of the possibilities of electrometallurgical industries in the Pacific Northwest. Prerequisite, senior or graduate standing. Three credits; spring. Corey

211, 212, 213. *Metallurgical Research*.—A study of methods applicable to the development of metallurgical processes for special ores and metals. Prerequisite, graduate standing. Hours and credits to be arranged. Corey

221, 222, 223. *Electro-Metallurgy*.—The application of electro-chemical and electro-metallurgical knowledge to the solution of the particular problems of the Pacific Northwest. Prerequisite, graduate standing. Hours and credits to be arranged. Corey

MINING

Mines Hall

PROFESSOR ROBERTS; ASSOCIATE PROFESSORS DANIELS, COREY;
ASSISTANT PROFESSOR WILSON; LECTURERS, GLENN, POWELL; ASSISTANTS,
SCHONING, MERRILL, GLAESER, MCKIM

NOTE—Mining, metallurgical, geological, or ceramic experience. Each student is required to spend at least one summer vacation, or its equivalent, in practical contact with the industry, and to submit upon his return to college a detailed report of his observations. Work of this nature offers an opportunity to secure data and material for the graduation thesis.

51. *Elements of Mining*.—A general study of the field of mining, considering prospecting, boring, drilling, explosives, rock breaking, timbering, methods of development and working, transportation and drainage. Prerequisite, sophomore standing. Three recitations. Three credits; autumn. Daniels

101. *Milling*.—A preliminary course designed to familiarize all students in the department with the principles and uses of the various types of crushing, sampling, concentrating and washing machinery in the Mines Building. Prerequisite, junior standing. Two recitations and one laboratory period. Laboratory deposit, \$5. Three credits; autumn. Roberts, Daniels

103. *Mine Rescue Training*.—Twenty-five hours of instruction. Practice in the care and use of oxygen rescue apparatus, smokeroom training, and first-aid-to-the-injured work in the U. S. Bureau of Mines Safety Station. Required of all students in the College of Mines. One credit; winter Daniels, Schoning

106. *Mining Excursion*.—A ten-day excursion taken in the spring of each year to a neighboring mining region; detailed examinations of mining and metallurgical industries. Expense varies from \$25 to \$50. Two credits; spring. Roberts, Daniels, Corey

122. *Coal Mining Methods*.—Prospecting and development. A detailed study is made of a nearby mine. Prerequisite, Min. 51. Three recitations. Three credits; winter. Daniels

151. *Mining Engineering*.—Lectures on exploration, mine development, power generation, air compression, hoisting and transportation. Practice with air compressors, machine drills, and mine equipment in laboratories and local plants. Prerequisite, senior standing. Two recitations, one laboratory period. Laboratory deposit, \$5. Three credits; autumn. Roberts

152. *Ore Dressing*.—A detailed study of certain branches of ore dressing accompanied by mill tests of ores checked by assays. Prerequisite, senior standing. Three recitations and two laboratory periods. Laboratory deposit, \$10. Five credits; spring. Roberts, Daniels

153, 154, 155. *Thesis*.—The preparation of a graduation thesis, including outline, gathering of material, making of drawings,

maps, tests, etc. The laboratory work is supplemented by consultation and conferences. A deposit of \$5 or \$10 per quarter will be required to cover cost of materials in thesis work involving the use of mining or metallurgical equipment. Completed thesis must be submitted at least one month before graduation. Prerequisite, senior standing. Five laboratory periods. Total of five credits required. Roberts, Daniels, Corey.

158. *Mining Law*.—A series of lectures on the mining laws of the United States and Alaska; illustrated by diagrams and mine maps. Two lectures. Two credits; winter. O'Bryan

162. *Mining Methods*.—A detailed study of mining methods and costs. Prerequisite, senior mining standing. Three recitations. Three credits; winter. Roberts.

163. *Mine Operation*.—The complete operations at a few typical mines, including mining, transportation and treatment of ore, disposal of products, company finances, and management. Illustrated by ores and products, maps and photographs, cost sheets, engineering and financial reports of the mines studied. Prerequisite, senior mining standing. Three recitations. Three credits; winter and spring. Roberts

170. *Coal Mining Machinery*.—Study of coal cutting machines, mine locomotives, fans, hoists, and pumps with especial reference to application to coal mining. Prerequisite, senior standing. Three recitations. Three credits; autumn. Daniels

171. *Mine Gases and Ventilation*.—Composition and properties of mine gases, methods of testing; lighting of mines; principles of ventilation; ventilating machinery. Prerequisite, Min. 122. Three recitations. Three credits; winter. Daniels.

172. *Coal Mining Plant*.—Design of plant and machinery employed in mining and preparing coal for market. Prerequisite, senior standing. Three drafting periods. Three credits; spring. Daniels

176. *Coal Preparation*.—Methods of preparing coal for market, together with laboratory tests and runs on various coals, to determine best methods of preparation. Prerequisite, Min. 101, Met. 103. Two recitations and three laboratory periods. Laboratory deposit \$10. Five credits; winter. Daniels

178. *Coal Preparation Machinery*.—Machines and equipment used in tipples and washeries for the screening and washing of coal. Prerequisite, Min. 176. Two recitations. Two credits; spring. Daniels

182. *Mine Management*.—The organization and administration of engineering plants, involving the keeping and interpretation of cost accounts, the efficiency of labor and methods, the financial,

legal and social aspects of engineering operation. Prerequisite, senior standing. Three recitations. Three credits; spring. Daniels

201, 202, 203. *Seminar*.—Lectures and discussions by Bureau of Mines staff, College of Mines faculty and fellows. Required of Bureau of Mines fellowship holders. Prerequisite, senior or graduate standing. One credit; autumn, winter, spring.

Roberts, Daniels, Corey, Wilson

211, 212, 213, 214. *Graduate Thesis*.—Preparation of a thesis in mining engineering, metallurgy or ceramics. Prerequisite, graduate standing. A deposit will be required if the work involves the use of laboratory materials or equipment. Hours and credits to be arranged.

Roberts, Daniels, Corey, Wilson

221, 222, 223. *Mine Development*.—Preparation of a plan of development for a metal mine, including studies of the geological conditions, surface and underground explorations, mining methods, layout of plant. Prerequisite, graduate standing. Hours and credits to be arranged.

Roberts

231, 232, 233. *Mill Design*.—Design of a plant for ore dressing purposes. Prerequisite, graduate standing. Hours and credits to be arranged.

Roberts

241, 242, 243. *Coal Mining*.—Methods which may be applied to the solution of problems in the coal mining industry such as a higher recovery of minable coal; economical layout of mine and plant; application of improved methods and machinery. Prerequisite, graduate standing. Hours and credits to be arranged. Daniels

251, 252, 353. *Coal Preparation*.—An advanced study of methods of coal preparation based on careful preliminary studies of character of coal and impurities in any locality. Laboratory testing will be emphasized. Prerequisite, graduate standing. Hours and credits to be arranged.

Daniels

261, 262, 263. *Utilization of Coal*.—Investigation of the possibilities of use of coals of low rank and quality. Briquetting, pulverization, and distillation will be given especial attention. Prerequisite, graduate standing. Hours and credits to be arranged.

Daniels

MINING AND METALLURGICAL RESEARCH

THE TECHNICAL STAFF OF THE UNITED STATES BUREAU OF MINES NORTHWEST EXPERIMENT STATION IN CO-OPERATION WITH THE INSTRUCTORS IN THE COLLEGE OF MINES

Class work will be directed by members of the instructional staff of the University. The research work is under the joint direction of the United States Bureau of Mines and the College of Mines. The subjects of research relate to the mining and metallurgical industries of the state and adjacent regions.

During the coming year investigations are contemplated in the following subjects:

1. The preparation and utilization of coal.
2. Ceramics.
3. Electrometallurgy.

MUSIC

Meany Hall

PROFESSOR GLEN; ASSISTANT PROFESSORS WOOD, ROSEN, VENINO, DICKEY; INSTRUCTORS,
VAN OGLE, ADAMS, KIRCHNER, TILLEY, FRENCH; ASSOCIATES, ALBERT,
CHITTICK; ASSISTANTS, FERRYMAN, BENTON, WILSON.

1, 2, 3. *Music Appreciation*.—This course is planned to aid not only music students but also all interested in music to become intelligent and discriminating listeners. Musical masterpieces, both instrumental and vocal, of different periods and forms, will be presented and discussed. Two credits per quarter; autumn, winter, spring. Van Ogle, French

4, 5, 6. *History of Music*.—The progress of musical development from the primitive period to the modern. Two credits per quarter; autumn, winter, spring. French

7, 8, 9. *Sight Singing*.—For prospective grade supervisors and for music students. Two sections—one for beginners and the other for students who have had some experience in sight singing. Two credits per quarter; autumn, winter, spring. Dickey, Wilson

*10, 11, 12. *Choral Study*.—The university chorus provides the opportunity, for those qualified, to study the more serious as well as the lighter forms of choral composition. Candidates must satisfy the director as to the extent of their musical ability. One credit; autumn or winter. Glen

14, 15, 16. *Ear Training and Melody Writing*.—Principles of melodic invention and training in hearing accurately; study in notation. Two credits per quarter; autumn, winter, spring. Dickey, Wilson

14D. *Ear Training*.—An intensive course for qualified students. Equivalent to courses 14, 15, 16. Five credits per quarter; autumn. French

17. *Choral Study*.—Part songs for men's voices. Candidates admitted only upon examination. Two credits; autumn. Glen

18, 19, 20. *Applied Music (Freshman)*.

68, 69, 70. *Applied Music (Sophomore)*.

118, 119, 120. *Applied Music (Junior)*.

*Only those who have successfully completed the work in course 11 will be eligible for registration in course 12.

168, 169, 170. *Applied Music (Senior).*

Students of other colleges and schools may earn one or two credits per quarter in the applied music courses. Students of the College of Fine Arts carry a larger number of credits—one and one-half to three—as indicated in the set courses. Students enrolled in these courses will be given opportunity, upon demonstration of the required ability, to participate in the public recitals of the department.

Unless excused by reason of advanced standing upon entrance, students who major in courses in applied music will require two lessons a week, ordinarily, in order to cover the work necessary for a degree. One to three credits per quarter.

- (a) *Piano*.—Venino, Van Ogle, Ferryman.
- (b) *Violin*.—Rosen.
- (c) *Voice*.—Glen, Albert.
- (d) *Violoncello*.—Kirchner.
- (e) *Pipe Organ*.—Chittick.

31, 32, 33. *University Orchestra*.—The University orchestra affords to qualified students an unusual opportunity for the study of the better grades of orchestral composition. No one is eligible to enter the course unless the director is satisfied of the ability of the applicant. One credit per quarter; autumn, winter, spring. Glen

22, 23, 24. *University Band*.—Competent players of band instruments are admitted to the band upon consent of the bandmaster. Two credits per quarter; autumn, winter, spring. Adams

25, 26, 27. *Chamber Music*.—Advanced study of the musical literature for string trios, quartets and quintets. One credit per quarter; autumn, winter, spring. Rosen

28, 29, 30. *Ensemble Singing*.—A choral course for women. Only advanced students will be admitted. One credit per quarter; autumn, winter, spring. Glen

34, 35, 36. *Voice Training*.—A course presenting the principles of correct breathing and tone production essential to good singing. Two credits per quarter; autumn, winter, spring. ———

51, 52, 53. *Harmony*.—Ear training, analysis, and keyboard practice. Prerequisite, courses 7, 8, 9, and 14, 15, 16. Three credits per quarter; autumn, winter, spring. Wood, Wilson

51D, 52D. *Harmony*.—An intensive course for qualified students. Equivalent to courses 51, 52, 53. Prerequisite, courses 14, 15, 16, or 14D. Five credits per quarter; winter and spring. French

54, 55, 56. *School Music*.—A course for supervisors. Prerequisite, courses 7, 8, 9, and 14, 15, 16. Two credits per quarter; autumn, winter, spring. Dickey

57, 58, 59. *Advanced Sight Singing*.—Study of choral forms. Prerequisite, courses 7, 8, 9, or permission of instructor. Two credits per quarter; autumn, winter, spring. Dickey

101, 102, 103. *Advanced Harmony*.—Prerequisite, courses 51, 52, 53. Three credits per quarter; autumn, winter, spring. Wood

104, 105, 106. *History of Music, Advanced*.—A detailed study of important periods and composers of modern music. Two credits per quarter; autumn, winter, spring. Van Ogle

107, 108, 109. *Counterpoint*.—Prerequisite, courses 51, 52, 53. Two credits per quarter; autumn, winter, spring. Wood

110, 111, 112. *Instrumental Form*.—Analysis of many examples and simple exercises in composition. Prerequisite, courses 51, 52, 53. Two credits per quarter; autumn, winter, spring. Wood

113, 114, 115. *Music Education*.—Psychological and pedagogical principles and their application to the teaching of music. Prerequisite, courses 54, 55, 56. Two credits per quarter; autumn, winter, spring. Dickey

130, 131, 132. *University Band (advanced)*.—A continuation of the work of the freshman and sophomore years in the study and production of more difficult compositions for band. One credit per quarter; autumn, winter, spring. Adams

151, 152, 153. *Musical Appreciation*.—An appreciative study of some modern composers and schools. Two credits per quarter; autumn, winter, spring. Van Ogle

154, 155, 156. *Music Education and Supervision*.—This course is for seniors and students of experience. High school, normal school and institute music. Prerequisite, courses 113, 114, 115. Two credits per quarter; autumn, winter, spring. Dickey

157, 158, 159. *Free Composition*.—Choral work, piano accompaniment idioms, vocal and instrumental solos and pieces in the smaller forms. Prerequisite, courses 101, 102, 103. Two credits per quarter; autumn, winter, spring. Wood

160, 161, 162. *Polyphonic Forms*.—Free counterpoint applied to the invention, canon, fugue, etc. Analysis and composition. prerequisite, courses 107-108-109. Two credits per quarter; autumn, winter, spring. Wood

180, 181, 182. *University Band (advanced)*.—Prerequisite of courses 130, 131, 132 or their equivalents required. One credit per quarter; autumn, winter, spring. Adams

COLLEGE COURSES IN APPLIED MUSIC

The courses outlined are not arbitrary. They indicate the amount and character of the work that the student is expected to cover for his musical degree. Credit will be given for equivalent courses pursued elsewhere prior to entering the University.

Students not wishing to offer work in applied music as a major, may receive credit for applied music work done under the supervision of others than the instructional staff of the department, upon satisfying departmental and University requirements by examination. Approved equivalents of applied music courses in piano, voice and violin may also be credited.

PIANO

Scholarship in Piano Study.—Mr. A. F. Venino offers an annual scholarship to the candidate showing the greatest proficiency and promise in piano playing. This scholarship carries free tuition for one weekly lesson throughout the autumn, winter and spring quarters. All candidates must submit their application in writing to Dean Glen before September 1. The competitive examination preliminary to the award will be held in Room 106 Meany hall at 2 p. m. of the Saturday before registration day.

Freshman and Sophomore Years.—Major and minor scales and arpeggios; studies selected from Czerny, Cramer, Loeschorn, Kullak, Hiller and Krause; sonatas by Scarlatti, Haydn, Clementi, Mozart and Beethoven; shorter compositions and inventions by Bach; and works from the classic and romantic schools.

Junior and Senior Years.—Scales in thirds, sixths and tenths; studies by Czerny, Clementi, Chopin, Brahms, MacDowell and Moszkowski; well-tempered Clavichord and suites by Bach; sonatas, pieces including at least one concerto, taken from the classic, romantic or modern composers. At least one recital program must be played from memory from the repertoire studied.

VOCAL MUSIC

The course in vocal music is even more flexible than that outlined for piano study. The purpose is to develop the voice and musical understanding so that the best in vocal music may be faithfully interpreted. The fact of having studied vocal music for four years will not necessarily entitle a student to graduation.

Freshman.—Practical work in voice placing, breathing studies, from among the following: Concone, Op. 9; Marchesi, Op. 1; Panofka, Op. 85; Vaccai, Book I; simple Italian and English songs.

Sophomore.—Progressive tone work; Bordogni, Concone, Marchesi, Panofka, simple Italian arias, Italian and English songs.

Junior.—Tone work; advanced technique. Arias from Italian, French and German operas. German song classics; modern French and English songs.

Senior.—Tone work and technique. Repertoire in opera and oratorio; recitals; senior program.

VIOLIN

Freshman.—Violin Method, Book I, Rosen; Exercises Op. 45, Book I, Wohlfahrt; Book I, De Beriot; Exercises Op. 68.

Sophomore.—Scales, Hrimaly; Studies, Blumenstengel Op. 33, Mazas, Books I and II; Concerto, Accoly; Scene de Ballet, De Beriot.

Junior.—Scales, Book II, Baillot; Exercises, Books I and II, Schraedieck; Etudes, Kreutzer, Fiorillo, Rode, Rovelli; Concerto, 9 and 7, De Beriot; Concerto, 2 and 8, Spohr also one sonata by Handel.

Senior.—Scales, Rosen; Etudes, Dancla; Op. 73, Gavini; Op. 35, Dont; Sonata for violin alone, Bach; Concerto, Bruch, Mendelssohn, D-Minor, Wieniaski and No. 4 Vieuxtemps.

In the last semester the student is obliged to memorize one sonata by Bach for violin alone and one of the concertos given in the fourth year.

FEEES

Since most of the work in the courses in applied music must necessarily be of the character of individual instruction, the student will be required to pay tuition fees for this work in addition to the general University tuition fee.

All fees are payable in advance to the Comptroller of the University. The following quotations of regular fees are based on one lesson per week. More than one lesson per week will be charged for at the same rate. All lessons are one-half hour in length.

Piano.—Mr. Venino, \$22 per quarter; Mrs. Van Ogle, \$22 per quarter; Miss Ferryman, \$15 per quarter.

Vocal Music.—\$22 per quarter.

Dean Glen will give individual instruction in singing and repertoire to a maximum number of ten students. The fee will be at the rate of \$27 per quarter for one lesson weekly.

Violin.—Mr. Rosen, \$22 per quarter.

Pipe Organ.—Mrs. Chittick, \$22 per quarter.

Band and Orchestra Instruments.—Mr. Adams, \$15 per quarter.

Arrangements may be made for individual instruction in other musical courses if necessary or desirable.

Piano for practice may be rented at the music department at the following rates:

One hour daily, \$3 per quarter.

Two hours daily, \$5 per quarter.

Pipe Organ for practice; one hour daily, \$12.50 per quarter.

All rental charges must be paid in advance. No rebate in these charges will be allowed. Lessons lost through enforced absence may not be made up unless the teacher in charge has been previously notified of the intended absence and is willing to accept the excuse for the absence.

NURSING

Home Economics Hall

ELIZABETH S. SOULE

1. *History of Nursing*.—An historical and informational study of nursing from the earliest times; the traditions of nursing as a profession, and the development and opportunities open to college women in this field. Open to any woman student in the University. Five credits; autumn. Soule

3. *Ethics of Nursing*.—A course designed to introduce the student to those recognized principles which govern her relationship to the patient, the physician, the hospital and the public. Three credits; winter. Soule

5. *Home Care of the Sick*.—A practical course for women students. Instruction given in baths and bed making, care of patients ill with common contagious diseases, care of chronics, invalids and babies. Two credits; autumn, winter, spring. Soule

51-52-53.—*Public Health and Social Problems*.—Lectures on various phases of public health work in relation to social problems. Case plans discussed and study of records made. Two credits; autumn, winter, spring. Soule

102. *Principles of Public Health Nursing*.—Lectures on social and nursing technique in public health nursing. Discussion and observation of infant welfare, school, industrial, tuberculosis, and general visiting nursing. Theoretical and practical work required. Prerequisite, graduate registered nurse. Three credits; autumn, winter. Soule

103. *Administration of Public Health Nursing*.—Course deals with the organization and administration of societies organized for visiting nursing, methods of collecting funds, boards of directors, and various committees of these associations, office equipment, records, vital statistics, and supervision of staff nurses will be dealt with. Prerequisite: Open to public health nurses who have had one year of public health nursing. Three credits; winter, spring. Soule

110. *Public Health Nursing*.—The field work is intended to give a practical knowledge of the entire field of public health nursing. Discussion of family problems, demonstration in nursing technique, culture taking, milk modification, maternity care, discussion of general district problems, current events, home visiting in relation to communicable diseases, including tuberculosis, sick and well babies, pre-natal cases, general visiting nurse work, free and pay cases and follow-up work of the schools. Prerequisite, course 102. Eight to sixteen credits; time to be arranged. Soule

ORIENTAL HISTORY, LITERATURE AND LANGUAGES

Philosophy Hall

PROFESSOR GOWEN

The requirement of one year's work in ancient languages and literature may be satisfied by courses 50, 51 and 52. Courses 1, 2 and 3 count for credits in the department of history; courses 40, 41 and 42 in the College of Business Administration; and courses 114, 115 and 116 in the department of Philosophy. Courses above 100 are for juniors, seniors and graduates.

1. *History of China I*.—History of China from the earliest times to the Manchu Conquest. Three credits; autumn. Gowen

2. *History of China II*.—History of China from the Manchu Conquest to the present day. Three credits; winter. Gowen

3. *History of Japan*.—Japan from the earliest times to the present. Three credits; spring. Gowen

30-31-32. *Semitic Literature*.—A study of the literature of the Old Testament. Continuous through the three quarters, but each course independent and self-contained. One credit per quarter; autumn, winter, spring. Gowen

40-41-42. *Oriental Institutions*.—*Japan, Russia, and China*.—The physical geography, social character and commercial resources of the Orient. Two credits per quarter; autumn, winter, spring. Gowen

50. *Literature of India*.—Five credits; autumn. Gowen

51. *Literature of Egypt, Babylonia, and Palestine*.—Five credits; winter. Gowen

52. *Literature of Arabia and Persia*.—Five credits; spring. Gowen

100-101-102. *Hebrew or Arabic*.—The giving of these courses depends upon registration. Five credits per quarter; autumn, winter, spring. Gowen

104-105-106. *Sanskrit*.—The giving of these courses depends upon registration. Five credits per quarter; autumn, winter, spring.

114-115-116. *History of Religion*.—(See Philosophy 114-115-116.) First quarter—Primitive conceptions of religion, the religions of Egypt and the Euphrates valley. Second quarter. The religions of the Far East. Third quarter—Judaism, Muhammadanism, and Christianity. Three credits per quarter; autumn, winter, spring. Gowen

PAINTING, SCULPTURE AND DESIGN

Philosophy Hall

INSTRUCTORS, EDENS, CAMPBELL; ASSOCIATES, PATTERSON, WORMAN, WEHN; ASSISTANTS, SARGENSON, STORM

Advanced students applying for credit must present work to head of department.

3. *Principles of Design*.—The principles of design in line, dark and light, and color. For students in home economics. Four credits; autumn, winter, spring. Sirgenson

5-6-7. *Free-hand Still Life and Cast*.—The technique of drawing from elementary forms, with all mediums—water color, oil, pen, etc. Prerequisite for any subsequent course in drawing and painting; cast drawing from models of antique and modern sculpture, preparatory to drawing from living model. Laboratory deposit, \$2. Three credits per quarter; autumn, winter, spring. Patterson

9-10-11. *Art Structure*.—A study of the principles of design in line, dark and light, and color, to develop power of appreciation and creation of good design. Prerequisite for any subsequent course in art structure. Laboratory deposit, \$2. Four credits per quarter; autumn, winter, spring. Edens, Sirgenson, Storm

16-17-18. *Art Appreciation*.—Historical development, from the art of primitive man to the present day. One credit per quarter; autumn, winter, spring.

53. *Art Structure*.—Batik and tie-dyeing. Laboratory deposit, \$2. Four credits; autumn. Storm

54. *Art Structure*.—Bookbinding and woodblock printing. Laboratory deposit, \$2. Four credits; winter. Storm

55. *Art Structure*.—Textile design. Laboratory deposit, \$2. Four credits; spring. Storm

56-57-58. *Illustration*.—Drawing and painting, from the model in various mediums, for reproductive processes such as magazines, newspapers and commercial work. Prerequisite, freshman free-hand. Laboratory deposit, \$3. Three credits per quarter; autumn, winter, spring. Patterson

59-60-61. *Household Design*.—Designs for tiles, leaded glass, metal-works, fixtures and embroidery. Three credits per quarter; autumn, winter, spring. Campbell

72-73-74. *Sculpture—Clay Modeling*.—Construction of plaster moulds, elementary construction; modeling in clay and wax. Laboratory deposit, \$3. Three credits; autumn, winter, spring. Wehn

101. *Public School Drawing*.—For drawing supervisors. The working out of such drawings as would be used in the public schools. Three credits; spring. Edens

103-104. *Art Structure—Pottery*.—Advanced students will be allowed to work for advanced credits. Laboratory deposit, \$2. Three credits per quarter; winter, spring. Worman

105. *Art Structure*.—Design as applied to lettering, advertising, and posters. Three credits; autumn. Edens

106. *Art Structure*.—Posters. Three credits; winter. Edens

107-108-109. *Portrait*.—Portraiture in all mediums. Prerequisite, freshman free hand. Laboratory deposit, \$3. Three credits per quarter; autumn, winter, spring.

110-111-112. *Art Structure*.—Interior decoration. Three credits per quarter; autumn, winter, spring. Campbell

113-114-511. *Furniture Design*.—Lectures on the history of furniture and the working out of original designs in furniture. Two credits per quarter; autumn, winter, spring. Campbell

*151-152. *Landscape*.—Interpretations of landscape in design. Three credits per quarter; winter, spring. Edens

153. *Methods of Teaching Art*.—Courses of study, methods and material. Three credits; autumn. Storm

154. *Practice Teaching*.—Teaching under supervision in city schools. Five credits; winter. Edens

157. *Art Structure*.—Simple metal work—etching, sawing, and hammering of copper and brass. Laboratory deposit, \$2. Three credits; autumn. Edens

158. *Art Structure*.—Jewelry. Laboratory deposit, \$2. Three credits; winter. Edens

159. *Art Structure*.—Landscape composition. Three credits; spring. Edens

160-161-162. *Life*.—Laboratory deposit, \$3. Three credits per quarter; autumn, winter, spring. Patterson

*Not offered in 1921-1922.

163-164-165. *Mural Decoration*.—Decorative compositions done in oil, applied to the beautifying of wall spaces, in harmony with the scheme of architecture. Prerequisite, junior standing. Laboratory deposit, \$3. Three credits per quarter; autumn, winter, spring. Patterson

*166. *Landscape*.

169-170-171. *Textile and Costume Drawing*.—Two credits per quarter; autumn, winter, spring. Edens

172-173-174. *Interior Decoration*.—Advanced problems in interior decoration in elevation and perspective. Five credits per quarter; autumn, winter, spring. Campbell

PHARMACY, PHARMACEUTICAL CHEMISTRY, MATERIA MEDICA AND FOOD CHEMISTRY

Bagley Hall

PROFESSOR JOHNSON; ASSOCIATE PROFESSOR LINTON; ASSISTANT
PROFESSOR LYNN; INSTRUCTORS, GOODRICH, PATTY,
LECTURER, OSSEWARD AND ASSISTANTS

1, 2, 3. *Theoretical and Manufacturing Pharmacy*.—The study of the principles of pharmaceutical operations, and the manufacture of Pharmacopoeial and National Formulary preparations. Three lectures and two laboratory periods per week. Deposit \$7.50 per quarter. Five credits per quarter; autumn, winter, spring.

Goodrich, Patty

4. *Commercial Pharmacy*.—A lecture course covering the commercial problems of the practical pharmacist. Two credits. Spring. Osseward

5, 6, 7. *Drug Assaying*.—Experiments in gravimetric and volumetric analysis are given with the idea of training the student in the fundamental principles of quantitative analysis, and at the same time making them familiar with the analysis of substances of pharmaceutical importance. Alkaloid assay of crude drugs and assay of volatile oils are a part of the course. Two lectures and three laboratory periods per week in autumn and winter quarters. One lecture and two laboratory periods per week in spring quarter. Five credits; autumn, winter. Three credits; spring. Deposit \$7.50 autumn and winter; \$4.50, spring. Goodrich.

9, 10, 11. *Prescriptions*.—A study of dispensing and laboratory practice in the same. Students criticize and compound approximately two hundred selected prescriptions. One lecture and one laboratory period per week. Deposit \$3.00 per quarter. Two credits per quarter, autumn, winter, spring. Linton, Goodrich

12, 13. *Materia Medica*.—A study of crude organic drugs, their source, methods of collecting and preserving, identification, active constituents and adulterations. Three lectures per week. Three credits; winter, spring. Linton, Goodrich.

15. *Field Materia Medica*.—A study of the native medicinal plants of Washington and also of plants under cultivation in the drug garden. One laboratory period per week, consisting largely of work in the drug garden and field trips. Laboratory deposit, \$1. One credit; spring. Linton

16. *Food Laws*.—National, state and foreign food laws. For students in the department of fisheries. One credit; winter. Lynn

101, 102, 103. *Pharmacology and Toxicology*.—The physiological actions of drugs in health and disease; the therapeutic uses and posology. The symptoms and treatment in cases of poisoning. two credits; autumn, winter, spring. Lynn.

105, 106, 107. *Chemistry and Analysis of Food*.—Methods of analysis of food products and the study of federal and state laws regulating the sale of foods and drug products. Methods of the Association of Official Agricultural Chemists are used. Laboratory deposit, \$7.50 per quarter. Five credits per quarter; autumn, winter, spring. Lynn

109, 110. *Prescriptions*.—A continuation of prescription study and practice. Special attention given to incompatibility and to the newer remedies. One recitation and one laboratory period per week. Deposit \$3. Prerequisites, 9, 10, 11. Two credits; autumn, winter. Linton

113, 114, 115. *Advanced Prescriptions*.—Extensive practice in difficult and incompatible prescriptions, also a study of special problems in dispensing. Credit to be arranged. Laboratory deposit \$7.50. Autumn, winter, spring. Linton

117, 118. *United States Pharmacopoeia and National Formulary*.—A study of the chemistry and pharmacy of the U. S. P. and N. F. preparations and inorganic chemicals. Two recitations per week. Two credits; autumn, winter. Linton

121, 122, 123. *Toxicology*.—A laboratory course in the separation, identification and estimation of inorganic and organic poisons and in the analysis of alkaloids. Laboratory deposit according to credit. Credit to be arranged; autumn, winter, spring. Johnson

125, 126, 127. *Current Problems*.—A lecture and recitation course in current pharmaceutical problems, commercial and scientific. Use is made of the current number of most of the pharmaceutical journals published in the United States, also of several medical journals. One credit; autumn, winter, spring. Linton

129, 130, 131. *Manufacturing Pharmacy*.—An advanced course in pharmaceutical manufacturing, including the manufacture of some of the more difficult of the Pharmacopoeial and National Formulary preparations, as well as a number of organic and inorganic compounds used in pharmacy and medicine. Laboratory deposit according to credit. Credit to be arranged; autumn, winter, spring. Goodrich, Patty

GRADUATE COURSE

201, 202, 203. *Investigation*.—Senior and graduate students may undertake some original investigation in pharmacy, pharmaceutical chemistry or chemistry of foods under the direction of one of the instructors. Laboratory deposit according to credit. Credit to be arranged; autumn, winter, spring.

PHILOSOPHY

Philosophy Hall

PROFESSOR SAVERY; ASSISTANT PROFESSOR DUCASSE; INSTRUCTOR BLAKE
ASSOCIATE, MCGILL; TEACHING FELLOW, MISS FISHER

The Liberal Arts requirement is five credits in philosophy. This requirement may be satisfied by any one of the following courses: Philosophy 1, 2, 3, 5. (None of these has any prerequisites).

Philosophy 2 is required of seniors in the College of Business Administration.

Philosophy 1, 2 and 5 are suited to arts-law students.

Psychology 1 is required of majors in philosophy.

1. *Introduction to Philosophy*.—Five credits; autumn, winter, spring. Savery, Ducasse, Blake, McGill

2. *Introduction to Social Ethics*.—Social ideals and problems, with special emphasis upon the opposition of democracy and aristocracy in government, industry, law, education, art, and religion. Five credits; winter. Savery and assistants

3. *Introduction to Ethics*.—Ethical principles and their application to the problems of life. Five credits; spring. Blake and assistants

5. *Introduction to Logic*.—The conditions of clear statement, adequate evidence, and valid reasoning, and their establishment in the mental processes of the student. Five credits; winter. Ducasse

101-102-103. *History of Philosophy*.—Ancient, medieval and modern. Three credits per quarter; autumn, winter, spring. Blake

104-105-106. *Metaphysics*.—A course in metaphysics, with special reference to the concepts and principles of science. For advanced students in philosophy or in the physical or biological sciences. Three credits per quarter; autumn, winter, spring. Savery

113. *Philosophy of Religion.*—(1) The religious experience: the origin, nature and types of religion, and its effect on individual happiness and morality. The social aspect of religion and the religion of democracy. Study of mystical experiences. (2) The truth of religion: the proofs of the existence of God, the basis of faith, pessimism, optimism and meliorism, immortality. Discussion of agnosticism. Prerequisite, course 1. Five credits; spring. Savery

114-115-116. *History of Religion.*—(See Oriental Languages and Literature 114-115-116.) Autumn quarter: Primitive conceptions of religion, the religions of Egypt and the Euphrates Valley. Winter quarter: The religions of the Far East. Spring quarter: Judaism, Muhammedanism, and Christianity. Three credits per quarter; autumn, winter, spring. Gowen

123. *Philosophy in English Literature of the Nineteenth Century.—From Wordsworth to Shaw, Wells and Chesterton, and including Emerson, Whitman and Masters. (Alternates with course 126 as requirement for seniors in the Library School.) Prerequisite, course 1. Five credits; spring. Savery

126 *Philosophy in Contemporary Drama.—(English 187.) Social and philosophical ideas in the contemporary drama. (Alternates with course 123 as requirement for seniors in the Library School). Five credits, spring. Benham

129. *Esthetics.*—The origin and motives of art and the esthetic principles of the different forms of art. Five credits; spring. Ducasse

132. *Social Ethics.*—(For description, see course 2). Five credits; winter. Savery and assistants

133. *Ethical Theory.*—An advanced course in the fundamental concepts and principles of ethics. Prerequisite, course 2 or 3. Two credits; spring. Savery

141-142-143. *Contemporary Philosophy.*—Readings from authors representing the main tendencies in contemporary philosophy. Two credits per quarter; autumn, winter, spring. Blake

GRADUATE COURSES

144-145-146. *Hume and Kant.*—A critical study. Open to students upon approval of instructor. Two or three credits per quarter; autumn, winter, spring. Ducasse

207-208-209. *Philosophy of Science.*—An account of scientific method; and of the fundamental principles and concepts of the sciences—mathematical, physical and biological. Interpreta-

* Not offered in 1921-1922.

tion of the scientific view of the world and its place in the human economy. Open to students upon approval of instructor. Two or three credits per quarter; autumn, winter, spring. Savery

247-248-249. *Post-Kantian Idealism*.—A study of the post-Kantian systems with special reference to the philosophy of Hegel. Prerequisite, course 103. Two or three credits per quarter; autumn, winter, spring. Blake

PHYSICAL EDUCATION AND HYGIENE FOR MEN

Gymnasium

PROFESSOR HALL, UNIVERSITY HEALTH OFFICER; ASSISTANT PROFESSOR ARBUTHNOT

Requirements for Graduation.—All students, both men and women, are required to take a prescribed amount of directed physical training and hygiene or military science and tactics.

Military Training.—Requirements in military science and tactics take precedence over the requirements in physical education. (See Military Science and Tactics.)

Physical Examination.—Upon entering college each student is given a physical examination. On the basis of their examination students are segregated in three divisions: A, B, and C.

All able bodied men shall satisfy all requirements in this department with two years of military science and tactics. Students exempt from military training for any reason must take the same number of hours in physical training.

1-2-3. *Calisthenics and Gymnasium*.—Introductory courses for freshmen. Two credits per quarter; autumn, winter, spring.

4-5-6. *Hygiene*.—Required of all first year men. Credits included in first year's work in both physical education and military science and tactics. Hall

11-12-13. *Gymnasium Tactics*.—Two credits; autumn, winter, spring. Arbuthnot

14. *Play-ground Supervision*.—Two credits; spring. Arbuthnot.

16-17-18. *Intramural Sports and Games*.—For freshmen. Two credits per quarter; autumn, winter, spring.

51-52-53. *Calisthenics and Gymnastics*.—For sophomores. Two credits per quarter; autumn, winter, spring.

57-58-59. *Intramural Sports and Games*.—For sophomores. Two credits per quarter; autumn, winter, spring.

61a-61b-61c-61d. Boxing, Wrestling, Fencing, Swimming.—Taught to large classes for physical development. Two credits per quarter; autumn, winter, spring.

71-72-73. History of Athletics.—One credit; autumn, winter, spring. Arbuthnot

101-102-103. Advanced Gymnastics and Calisthenics.—For juniors. Two credits per quarter; autumn, winter, spring.

107-108-109. Intramural Sports and Athletics.—Small group leadership. For juniors. Two credits per quarter; autumn, winter, spring.

151-152-153. Class Leadership Calisthenics and Gymnastics.—For seniors or graduates. Two credits per quarter; autumn, winter, spring.

PHYSICAL EDUCATION AND HYGIENE FOR WOMEN

Gymnasium

PROFESSOR HALL, UNIVERSITY HEALTH OFFICER; ASSISTANT PROFESSOR GROSS, DIRECTOR;
ASSISTANT PROFESSOR AMERY; INSTRUCTOR, AID; ACTING INSTRUCTOR,
ANDERSON; LECTURER, IRWIN; ASSOCIATE, BLOOM;
ASSISTANT FORECHIEF.

There are two kinds of classes in this department.

a—Those required for graduation. All women, during two years of college attendance are required to participate two hours a week in some form of healthful exercise. The kind of exercise is determined by the medical and physical examination, and the amount of physical education the student has had in accredited high schools. The course in Personal Hygiene is required of freshmen; the course in Nutrition and Food is required of sophomores. Ten credits, six in healthful and recreational exercise, two in Hygiene and two in Nutrition and Food, are required for graduation.

b—Those leading to a major in physical education in the College of Science, or in the College of Education.

Teachers well trained in all phases of physical education are in demand, the most frequent calls being for school supervisors and recreation leaders. Students interested in courses in recreational and community leadership should see announcement for Colleges of Liberal Arts and Education.

Intramural Athletics.—Intramural contests, under the supervision and control of the department, are conducted in the following sports: baseball, hockey, tennis, basketball, archery, field events and volley ball. The Women's Athletic Association co-operates with the department in the conduct of these activities. All students are urged to come out for at least one sport.

Uniforms.—A uniform, consisting of serge tunic, white blouse and black gymnasium shoes is required of all students, and may be purchased at the University Book Store. The cost is \$14.25. No part of the uniform should be purchased before entering college.

Courses.—Courses 1-2-3 and 7-8-9 are open to freshmen who have had less than two years of physical education. Hygiene is required of all freshmen. Courses 10-11-12 are open to freshmen who have had two years or more of physical education. Courses 51 to 99 are open to sophomores who have had three quarters of freshman work. Course 54-55-56, Food and Nutrition, is required of all sophomores. Courses 100 to 200 are open to major students; these courses carry academic credit.

1-2-3. Healthful Activities.—A general course, includes gymnastics, dancing, athletics. For students who have had less than two years in high school, two hours practice a week. One credit per quarter; autumn, winter, spring. Gross, Anderson

4-5-6. Hygiene.—One hour of lecture. Two-thirds credit per quarter; autumn, winter, spring. Irwin

57-58-59. Corrective Gymnastics.—Two hours of practice. One credit per quarter; autumn, winter, spring. Bloom

10-11-12. Healthful Activities.—Gymnastics, dancing, and athletics. Open to freshmen who have had at least two years' physical education in high school. Autumn, winter, spring. Gross, Anderson

13-14-15. Limited Healthful Activities.—Light gymnastics, the less strenuous games and athletic activities, the lightest forms of dancing. Open, upon the recommendation of the examining physician, to students for whom the regular classes are too strenuous. Two hours per week. One credit per quarter; autumn, winter, spring. Anderson

51-52. Gymnastics.—Second year women. Two hours per week. One credit per quarter; autumn, winter.

54-55-56. Food and Nutrition.—(See Home Economics 54-55-56.) Required of second year women. Amery, Koehne

57-58-59. Corrective Gymnastics.—Two hours of practice. one credit per quarter; autumn, winter, spring. Bloom

61-62-63. Dancing.—Two hours of practice. One credit per quarter; autumn, winter, spring. Gross

64-66. Hockey.—Two hours of practice. One credit; autumn, spring. Forchemer

65. *Basketball*.—Two hours of practice. One credit; winter.
Anderson
- 67-69. *Tennis*.—Two hours of practice. One credit; autumn,
spring. Anderson
75. *Archery*.—Two hours practice. One credit; spring.
Aid
81. *Baseball*.—Two hours practice. One credit; spring.
Anderson
- 82-83-84. *Limited Healthful Activities*.—A continuation of
courses 13-14-15. For students for whom regular work is too stren-
uous. Two hours practice. Autumn, winter, spring. Anderson
- 94-95-96. *Dancing*.—Two hours of practice. Prerequisite,
courses 61-62-63. One credit; autumn, winter, spring. Lemon
- 101-102-103. *Methods of Gymnastics*.—Drill in gymnastics.
Gymnastic terminology and survey and classification of gymnastic
material. Principles and technique of teaching. Prerequisites, or
accompanying courses, Anatomy 101-102 and Physiology 54-55.
Two hours lecture and two hours practice per week. Three credits
per quarter for a year. Aid
- 111-112-113. *Plays and Games*.—Nature, function and the-
ory of play. Singing games, dramatic plays, graded games, organi-
zation and administration of playgrounds, conduct and equipment of
play centers. Play in education and civic life. Commercial and
municipal recreation and agencies promoting activity. Administra-
tion of athletics. One lecture and three hours practical work per
week. Three credits per quarter; autumn, winter, spring. Gross
- 104-105-106. *Methods of Folk Dancing*.—Dances of the na-
tions arranged for teaching in schools. Technique, meth-
ods of teaching, relation of music to dancing, costuming, school
festivals, etc. Prerequisite, 1 year of dancing or course 111-112-113.
One hour lecture and two hours practical work per week. Two
credits per quarter; autumn, winter, spring. Gross
- *109. *History of Physical Education*.
- 131-132-133. *Theory and Practice in Corrective Gymnastics*.
—Study of deviations from the normal, remedial gymnastics and
application of exercises for correction, kinesiology. Two hour lec-
tures and four hours practice. Prerequisites, Anatomy 101-102 and
Physiology 54-55. Two lectures per week. Four credits per quar-
ter; autumn, winter, spring. Bloom
- 151-152. *Administration of Physical Education*.—Study of
curricula for grades and high schools; school administration. Value

of various types of activities. Prerequisite, courses 101-102-103, and 104-105-106. Two credits per quarter; autumn, winter. Gross

153. *Health Instruction*.—Material and methods in teaching hygiene in the grades. Two hours per week. Spring. Gross

154-155-156. *Advanced Dancing*.—Prerequisite, course 104-105-106. Technique of natural dancing, based on natural movements. Composing of dance dramas. One hour lecture and two hours practice. Two credits per quarter; autumn, winter, spring. Aid

161. *Normal Diagnosis*.—Diagnosis of the normal and deviations from the normal. Prerequisite, Anatomy 101-102 and Physiography 54-55. Two credits; spring. Irwin

162. *Anthropometry*.—Methods in physical examinations, standards of efficiency in measurements. Two credits for autumn quarter.

164-165. *Advanced Methods in Gymnastics*.—Advanced gymnastics. Development of lesson plan. Gymnasium problems. Adaptation to schoolroom. One hour lecture and two hours practical work. Prerequisite, course 101-102-103. Two credits per quarter; autumn, winter.

167-169. *Athletic Coaching*.—Methods of coaching, hockey, tennis, archery. Prerequisites, Psychology 1, and knowledge of and participation in the above named athletics. One hour lecture and two hours practice. Two credits; autumn, winter, spring.

Anderson, Forchemer

170-171-172. *Advanced Athletic Coaching*.—Coaching in basketball, baseball. Students will take charge of classes in sports. Prerequisite, psychology 1 and knowledge of game. Two hours of practice. One credit; autumn, winter, spring.

Anderson, Aid

*173-174-175. *Swimming*..

179. *Public Recreation*.—Problems in civic and community recreation with practice in field houses and playfields. Prerequisites, courses 104-105-106 and 111-112-113. Three credits; winter.

Gross

PHYSICS

Denny Hall

PROFESSOR OSBORN; ASSOCIATE PROFESSOR BRAKEL; ASSISTANT
PROFESSOR ANDERSON; INSTRUCTORS, UTTERBACH AND ELLER;
DEMONSTRATOR, HIGGS.

1-2 *General Physics*.—Courses 1-2 will satisfy the physical science requirement in the colleges of Liberal Arts and Science. Prerequisite, high school physics or 47, 48, 49. Five credits per quarter; autumn, winter. Osborn

* Not offered in 1921-1922.

3. *General Electricity*.—This course is required of physics majors; of mathematics majors taking physics as a minor, and of all pre-medical students. Prerequisite, course 1-2. Five credits; spring. Osborn

47-48-49. *High School Physics*.—For students without any physics, these courses will satisfy the physical science requirement in colleges of Liberal Arts and Science and the entrance requirement in other colleges. Five credits per quarter; autumn, winter, spring. Eller

50-51. *Sound and Music*.—For students in College of Fine Arts only. Five credits per quarter; winter, spring. Anderson

54. *Photography for Amateurs*.—Open to students who have had elementary physics or chemistry. Three credits; spring. Higgs

89-90. *Physics of the Home*.—For students in Home Economics. Five credits per quarter; autumn, winter. Osborn

97. *Physics for Engineers*.—Mechanics. Prerequisites high school physics or 47-48-49, and fifteen hours of mathematics. Five credits; autumn, winter or spring. Brakel

98. *Physics for Engineers*.—Electricity. Prerequisite, course 97. Five credits; autumn, winter or spring. Brakel, Anderson, Utterbach

99. *Physics for Engineers*.—Heat, light. Prerequisite, course 97. Five credits; autumn, winter, spring. Brakel, Anderson, Utterbach

101. *Modern Physics Theories*.—Prerequisite, course 3. Five credits; autumn. Anderson

102. *Mechanics*.—Prerequisite, fifteen hours of college physics and ten hours of college mathematics. Five credits; autumn. Anderson

103. *Heat*.—Prerequisite, course 2. Five credits; winter. Utterbach

104. *Light*.—Prerequisite, course 2 and ten hours of mathematics. Five credits; spring. Osborn

105. *Electricity*.—Prerequisites, course 3 and ten hours of mathematics. Five credits; winter. Brakel

106. *Physics of AC and DC Circuits*.—Prerequisite, course 105. Five credits; spring. Brakel

113. *Acoustics and Illumination*.—A course for students in architecture. Prerequisite, course 2. Four credits; spring. Osborn

114. *Electrical Measurements*.—A course for students in engineering. Prerequisite, courses 97, 98, 99. Three credits; autumn or spring. Brakel

169. *Special Problems*.—Students admitted after consultation with instructors. Credit arranged; autumn, winter, spring.

170. *Spectroscopy*.—Prerequisite, course 2 and ten hours of chemistry or astronomy. Three credits; spring or autumn. Osborn

175. *High Temperature Measurements*.—Prerequisite course 103. Three credits; autumn or spring. Utterbach

180. *Vibratory Motion and Sound*.—Prerequisite course 102 and calculus. Five credits; winter. Osborn

GRADUATE COURSES

201, 202. *Dynamics*.—Three credits; autumn. Two credits; winter. Anderson

203, 204. *Theoretical Electricity and Magnetism*.—Two credits; autumn. Three credits; winter. Brakel

206. *Advanced Optics*.—Three credits; spring. Osborn

209. *Thermo-dynamics and Kinetic Theory*.—Two credits; spring. Utterbach

210. *Seminar*.—Credits arranged; autumn, winter, spring.

212. *Investigation*.—Credits arranged; autumn, winter, spring.

NOTE: The laboratory deposit for courses 1, 2, 3, 47, 48, 49, 50, 51, 89, 90, 97, 98, 99, 103, 104, 105, 106, 118, 170, 175, 180, 206 is \$2.50; 54, 114—\$5.

Graduate students may elect any course from 114 and on as a part of their major work in physics.

POLITICAL SCIENCE

Denny Hall

PROFESSOR J. ALLEN SMITH; INSTRUCTOR LAURE

The work in the department of political science is designed to give a scientific account of the activities of the state and of the functioning of the electorate and legislative bodies in determining state action. Some of the courses are planned to give that knowledge of public affairs which ought to be part of a liberal education, while others lead to a special study and investigation of problems and methods in the different branches of the government. The aim is to train the powers of observation and reasoning, to develop correct methods of research, and to apply the knowledge gained to the solution of practical problems.

1. *Elements of Government*.—An introductory course in which special attention is given to the citizen's part in government. Laboratory deposit, \$1. Five credits; autumn, winter or spring.

Smith

10. *American Government*.—A general study of the American system of national government. Prerequisite, course 1. Three credits; winter.

Smith

11. *State Government*.—A general study of the American system of state government. Prerequisite, course 1. Three credits; spring.

Smith

50. *Comparative Government*.—The constitutional organization of the principal governments of Europe; with emphasis on political parties and current questions. Prerequisite, course 1. Five credits; winter.

Laube

*51. *Principles of Political Science*.—

52. *Political Parties*.—Organization and methods of modern political parties; growth and theory of the party system. Prerequisite, course 1. Three credits; spring.

Laube

60. *Public Finance and Taxation*.—Prerequisite, course 1. Econ. 51. Five credits; autumn.

Laube

61. *Problems in Taxation*.—With special reference to the state of Washington. Prerequisite, course 60. Three credits; winter.

Laube

62. *Municipal Finance*.—Prerequisite, course 60. Three credits; spring.

Laube

100. *Municipal Government*.—Municipal organization and administration in the United States and Europe with some consideration of functions and problems. Prerequisite, eight credits in political science. Three credits; autumn.

Laube

102. *Municipal Problems*.—Problems of city government, with special attention to municipal utilities. Prerequisite eight credits in political science. Three credits; autumn.

Laube

*110. *International Law*

111. *International Politics*.—Prerequisite, eight credits in political science. Three credits; spring.

Laube

120. *Governmental Functions*.—A study of regulation with reference to individual liberty; the individualistic and the socialistic theory of governmental functions; influence of political democracy on state interference. Open to upper division students

who have had eight hours in political science, and to graduates. Three credits; autumn. Smith

150, 151, 152. *Reading Course*.—Discussions based on selective readings in political theory. Prerequisites, junior standing and eight credits in political science. Two credits per quarter; autumn, winter and spring. Smith

181, 182, 183. *Research in Public Finance*.—Two credits per quarter; autumn, winter, spring. Laube

GRADUATE COURSE

201, 202, 203. *Seminar in Political Theory*.—Topic for 1921-1922: sovereignty. For graduates. Autumn, winter, spring.

PSYCHOLOGY

Philosophy Hall

PROFESSOR SMITH; ASSISTANT PROFESSOR GUTHRIE; INSTRUCTOR WILSON;
ASSISTANT, MISS WILKINSON.

The Liberal Arts requirements are five credits in psychology. For psychology as prerequisite to education, see announcement of department of education.

Majors in psychology may count five hours in Philosophy 1, or in 101-102-103 toward satisfying their major requirement.

1. *General Psychology*.—A survey of the science as a whole. No prerequisites. Three lectures, one discussion section, and one two-hour laboratory a week. Five credits; course repeated every quarter. Smith, Guthrie, Wilson

101. *Physiological Psychology*.—Man's behavior viewed as a result of his neurological mechanism. Students who so desire will be offered an opportunity for individual work in dissection and microscopic study. Prerequisite, Psychology 1. Three credits; winter. Guthrie

106. *Experimental Psychology*.—Students taking this course receive training in laboratory methods, are made familiar with the more important kinds of psychological apparatus, and perform many of the classical experiments in psychology. Prerequisite course 1. Three credits; spring. Guthrie

109. *Mental Tests*.—Training in applying tests for intelligence and for mental analysis. The principles of experimental procedure, methods of measurement, and statistical treatment of results. The course is essential to work in clinical psychology. Prerequisite, ten credits in psychology. Three credits. Wilson

111. *History of Psychology*.—The origin and development of psychology, beginning with the primitive conceptions of mind, and

including a comprehensive view of the sources of scientific psychology. Prerequisite, course 1. Three credits; spring.

Guthrie

112. *Modern Psychological Theory*.—A criticism of psychological theories in the light of recent experimental findings. The significance of behaviorism and the concept of the unconscious in psychology. Prerequisite, course 1. Three credits; spring. Guthrie

114. *Current Psychological Literature*.—This course offers each student the opportunity of reading and discussion in the direction of his particular interests, and at the same time makes him familiar with a wide range of subjects treated in recent journals and with the new developments in psychology. Prerequisite, course 1. Two credits; winter. Guthrie

116. *Animal Behavior*.—The mind of animals as shown by their behavior under natural conditions and in the laboratory. Prerequisite, course 1. Three credits; autumn. Guthrie

118. *Folk Psychology*.—A psychological study of social human nature, language, custom, public opinion, morals, war, family, caste, nationalism, religion. Prerequisite, course 1. Two credits; autumn. Guthrie

121.—*Applied Psychology*.—Psychology as applied to personal efficiency, vocational guidance and the measurement of vocational fitness, scientific management, the psychology of advertising, legal testimony and the mental states affecting its reliability. The significance of sex and individual differences in practical life. Prerequisite, course 1. Five credits; winter. Wilson

124. *Psychology of Learning*.—The principles of learning and the transfer of training. Prerequisite, ten credits in psychology. Two credits; spring. Smith

126. *Abnormal Psychology*.—The explanation of unusual behavior. Prerequisite, ten credits in psychology. Five credits; winter. Guthrie

131. *Child Psychology*.—A study of mental development from infancy to adult age with the purpose of giving the student a scientific understanding of childhood. Prerequisite, course 1. Three credits; autumn. Wilson

132. *Psychology of Exceptional Children*.—The nature and cause of mental defects and peculiarities of children, with special reference to methods of diagnosis and to physical pathology. Prerequisite, course 1. Three-credits; spring. Smith

151, 152, 153, 154. *Undergraduate Research*.—Prerequisites, course 1 and 106. Each quarter. Smith, Guthrie, Wilson

GRADUATE COURSES

201, 202, 203, 204. *Graduate Research.*

Smith, Guthrie, Wilson

Seminar.—Open to students doing research in the department. Weekly meetings on Monday evening.

PUBLIC SPEAKING

Denny Hall

(See Dramatic Art)

ROMANIC LANGUAGES AND LITERATURE

Denny Hall

PROFESSORS FRIEN, OBER; ASSOCIATE PROFESSORS UMPHREY, PATZER, GOGGIO; ASSISTANT PROFESSORS HELMLINGE, DE VRIES; INSTRUCTORS, WHITTLESEY, PHILBRICK, DE SOLENNI; ASSOCIATES, PATCHIN, MEROIER, BONHAM; ASSISTANTS, HAMILTON, DAVIS.

Students entering with high school credits in French or Spanish will be admitted to classes upon the basis of one high school semester counting as the equivalent of one University quarter. Exceptional cases will be determined by the head of this department.

Students may not begin French 1 and Spanish 1, (nor Italian), during the same quarter, and it is better to have three quarters of one Romanic language before beginning another. If the entrance requirement in foreign language has not been fulfilled, no credits will be given for courses 1, 2, 3, 4, and 7 in any of the Romanic languages.

I. FRENCH

Requirements of the department.—Courses 41, 101, 102, 103, 191, 192, 193, and at least nine credits in literature are required of majors and those who wish to be recommended to teach.

1-2-3. *Elementary.*—As much as possible French will be used in the class room. Each of the courses 1, 2, 3, is repeated each quarter. No credits will be given for course 1 until course 2 has been completed. Five credits per quarter; autumn, winter, spring.

4-5-6 *Reading of Modern Texts*—One section of the class will be devoted to translation, exclusively, while the other sections will read and be questioned in French. Each of the courses 4, 5, 6, is repeated each quarter. Course 4 may be combined with 7, making a five-hour course. The same is true of 5 and 8, 6 and 9. Prerequisite to course 4 is course 3, or equivalent. Two credits per quarter; autumn, winter, spring.

7-8-9. *Grammar and Composition.*—These courses must be taken by those who intend to major in French, unless they have already done the equivalent in high school. Course 7 may be combined with

course 4. The same is true of 8 and 5, 9 and 6. Prerequisite to course 7 is course 3, or equivalent. Two credits per quarter; autumn, winter, spring.

41. *Phonetics*.—This course is intended to furnish the student an opportunity to acquire a reasonably correct pronunciation, and to bring more order out of what seems a mass of exceptions. Prerequisite, course 3. Three credits; repeated each quarter. Frein

71-72-73. *Scientific French*.—For students in science courses; reading in their special lines will be assigned by the head of their department, but the examinations will be given by this department. Credits according to work done.

101-102-103. *Composition and Conversation*.—With each of these courses is offered (at the same hour, but not on the same days) a course in advanced reading under the same instructor who gives these courses. See Courses 104, 105, 106. Prerequisites, courses 6 and 9. Three credits per quarter; autumn, winter, spring. Patzer, Helmlinge, Goggio, De Vries, Whittlesey

104-105-106. *Advanced Reading*.—These courses are planned so that they may be taken with courses 101, 102, 103. Courses 101 and 104, 102 and 105, 103 and 106 may be taken together as five hour courses. The instructor will give occasional talks in French, upon the authors read, the interesting literary, social and other topics of their day, so as to prepare the student to enter courses given by lectures in French. Prerequisite, course 6. Two credits per quarter; autumn, winter, spring.

Patzer, Goggio, Helmlinge, De Vries, Whittlesey

107-108. *Themes*.—Writing of original compositions upon assigned topics. Given in connection with course 124-125, which will be used as suggestive material for this course. Prerequisite, 103. Two credits per quarter; winter, spring. Helmlinge

115. *Outline History of French Literature*.—Lectures in English, and collateral reading of English translations of French literature. Those who have studied French sufficiently will be assigned French texts to read. No prerequisites. Five credits; autumn.

De Vries

*121. *The French Novel*.

124-125. *The Short Story*.—History of the short story, and reading and discussion of some of the best authors. Given in connection with courses 107, 108. Prerequisite, course 103. Three credits per quarter; winter, spring. Helmlinge

*131. *Lyric Poetry*.

*141-142-143. *The French Drama*.

151-152. *History of the French Literature of the Nineteenth Century*.—Lectures in French, and assignments of reading to be done outside of class. Intended to give an opportunity to hear French spoken connectedly, though slowly. Students may enter at the beginning of either quarter. Prerequisite, courses 6 and 9, or equivalent. Five credits per quarter; winter, spring. De Vries

161-162. *History of the French Literature of the Eighteenth Century*.—Lectures in French, and assignments for outside reading. Prerequisite, courses 6 and 9. Three credits per quarter; autumn, winter. Patzer

171. *History of the French Literature of the Seventeenth Century*.—Lectures in French, and assignments for outside reading. Prerequisite, courses 6 and 9. Three credits; spring. Patzer

191-192-193. *Teachers' Course*.—Emphasis on the methods of teaching pronunciation and syntax; review of phonetics and syntax, with students conducting the recitations. Prerequisite, courses 41, 101, 102, 103. Two credits per quarter; autumn, winter, spring. Frein

GRADUATE COURSES

**201-202-203. *Middle and Sixteenth Century*.—The masterpieces of the fourteenth, fifteenth and sixteenth centuries will be read, and their influence upon later French literature studied. Open to graduates and seniors who have studied French at least four years. Two credits per quarter, autumn, winter, spring. Frein

**221-222-223. *Old French Readings*.—One of the most helpful courses for teachers of French. Open to graduates and seniors who have studied French at least four years. Three credits per quarter; autumn, winter, spring. Frein

**231-232-233. *History of Old French Literature*.—Lectures and assigned readings. Open only to those who can read Old French. Three credits per quarter; autumn, winter, spring. Frein

*241-242-243. *French Historical Grammar*.

**251-252-253. *Seminar*.—The study will be centered upon the drama of the sixteenth century. Open only to advanced students of French. Two credits per quarter; autumn, winter, spring. Frein

II ITALIAN

Requirements of the department: No student will be allowed to begin Italian and French or Spanish the same year. Beginning with 1922-1923 enough courses will be offered for a major in Italian.

* Not given in 1921-1922.

* * Either courses 201-202-203 and 221-222-223 or 231-232-233 and 251-252-253 will be offered in 1921-1922. It will depend upon the preparation of the students desiring advanced work.

1-2-3 *Elementary*.—No credit will be given for courses 1 and 2 until course 3 has been completed. Five credits per quarter; autumn, winter, spring. Goggio

*107-108-109. *Modern Italian Literature*.

*121-122-123. *The Italian Novel*.

181-182. *Dante*.—In this course the Divine Comedy of Dante will be read and studied with the purpose of bringing out the character of the imaginative and philosophical ideas contained in it, and the relations of these ideas to medieval thought. Knowledge of Italian not necessary. Two credits per quarter; autumn and winter. Goggio

184. *Renaissance Literature of Italy*.—In this course stress will be laid upon the works of Petrarch and Boccaccio especially, and on those of Machiavelli, Castiglione, Ariosto, Cellini and Tasso. Lectures in English and collateral reading. Knowledge of Italian not necessary. Two credits; spring. Goggio

GRADUATE COURSE

201. *Research in Italian Literature*.—For graduates only. The number of credits will be determined by the amount of work done. Goggio

III SPANISH

Requirements of the department: Courses 191, 192 and at least 9 credits of literature are required for majors and of all who wish to be recommended as teachers. (After June, 1922, courses 101-102-103 also will be required.)

1-2-3. *Elementary*.—No credit will be given for course 1 until course 2 has been completed. Each of the courses 1, 2, 3 is repeated each quarter. Five credits per quarter; autumn, winter, spring.

4-5-6. *Reading of Modern Authors*.—Reading of some of the best works of the nineteenth century. If desired, courses 4, 5, 6 may be combined with courses 7, 8, 9 making a five-hour course each quarter. Prerequisite to 4 is 3, or equivalent. Three credits per quarter; autumn, winter, spring.

7-8-9. *Grammar, Composition, Conversation*.—These courses may be combined with courses 4, 5, 6 making a five hour course. Prerequisite to course 7 is course 3. Course 7 is prerequisite to course 8. Two credits per quarter; autumn, winter, spring.

*101-102-103. *Advanced Composition*.

112. *Commercial Spanish*.—Commercial terms and business correspondence. Prerequisite, course 9, five credits; spring. Umphrey

* Not given in 1921-1922.

*115. *Outline History of Spanish Literature.*

121-122-123. *The Novel.*—The origins of the Spanish novel and its development. Reading of selected texts; collateral readings and reports. Prerequisite, courses 6 and 9. Three credits per quarter; autumn, winter, spring. Umphrey

*131-132. *Lyrics and Ballads.*

*141-142-143.—*Drama.*

184-185-186. *Spanish American Literature.*—Representative writings of Spanish American authors. Collateral reading and reports. Lectures. Prerequisite, course 6 and 9. Two credits per quarter; autumn, winter, spring. Umphrey

191-192. *Teachers' Course.*—Methods of teaching Spanish; practice teaching; observation; review of linguistic difficulties. Open to major students. Two credits per quarter; winter, spring. Ober

GRADUATE COURSES

221. *Old Spanish Readings.*—Reading and linguistic study of the Poema de mio Cid and other old Spanish texts. Five credits; autumn. Umphrey

231. *Epic Poetry.*—Study of the epic material as a unifying factor in the literature of Spain. Five credits; winter. Umphrey

241. *Spanish Historical Grammar.*—Five credits; spring. Umphrey

Note: For courses in Comparative Philology, see the department of Scandinavian Languages and Literature.

SCANDINAVIAN LANGUAGES AND LITERATURE

Denny Hall

PROFESSOR VICKNER

1-2-3. *Elementary Swedish.*—Grammar and reading; composition and conversation. Course, 1,2,3, are so arranged that they may be taken with courses 4, 5, 6 making a five-hour course. Three credits per quarter; autumn, winter, spring. Vickner

4-5-6. *Swedish Reading Course for Beginners.*—Reading of easy texts. These courses are supplementary to courses 1, 2, 3, but may also be taken separately by students desiring a reading knowledge of Swedish with a minimum of grammatical study. No previous knowledge of Swedish necessary. Courses 4, 5, 6 are especially adapted to meet the needs of students in the Colleges of Science, Education, Business Administration, and the Library School. Two credits per quarter; autumn, winter, spring. Vickner

* Not given in 1921-1922.

10-11-12. Elementary Norwegian-Danish.—Grammar and reading; composition and conversation. Courses 10, 11, 12, are so arranged that they may be taken with courses 13, 14, 15, making a five-hour course. Three credits per quarter; autumn, winter, spring. Vickner

13-14-15. Norwegian-Danish Reading Course for Beginners.—Reading of easy texts. These courses are supplementary to courses 10, 11, 12, but may also be taken separately by students desiring a reading knowledge of Norwegian-Danish with a minimum of grammatical study. No previous knowledge of Norwegian-Danish necessary. These courses are especially adapted to meet the needs of students in the Colleges of Science, Education, Business Administration and in the Library School. Two credits per quarter; autumn, winter, spring. Vickner

20-21-22. Norwegian-Danish Literature.—Representative authors are read in connection with a survey of the Norwegian-Danish literature. Prerequisite, ability to read easy Norwegian-Danish. Course may be entered at the beginning of any quarter. Two credits per quarter; autumn, winter, spring. Vickner

23-24-25. Swedish Literature.—Representative authors are read in connection with a survey of the Swedish literature. Prerequisite, ability to read easy Swedish. Course may be entered at the beginning of any quarter. Two credits per quarter; autumn, winter, spring. Vickner

*30. *Scandinavian Culture and Institutions.*— Vickner

*31-32-33. *Reading Course in Norwegian and Swedish.*

40, 41, 42. Great Scandinavian Writers in English Translation.—The reading and discussion of significant works of recent Scandinavian literature; papers; lectures on the social, political and cultural life of Scandinavia. Course may be entered at the beginning of any quarter. Five credits; autumn, winter, spring.

103-104-105. Recent Swedish Writers.—Representative writers of the nineteenth and twentieth centuries are read, including Strindberg, Fröding, Selma Lagerlöf. Study of cultural movements and social problems of modern Sweden. Course may be entered at the beginning of any quarter. Two credits per quarter; autumn, winter, spring. Vickner

*106-107-108. *Recent Norwegian-Danish Writers.* Vickner

*109-110-111. *Modern Scandinavian Authors in English Translation.* Vickner

* Not given in 1921-1922.

180-181-182. Recent Scandinavian Literature in English Translation.—The principal writers of recent Scandinavian literature will be read with special attention to literary and social movements and to the interrelation of English and Scandinavian literature. Lectures, reports, and discussion. For advanced students. Course may be entered at the beginning of any quarter. Two credits per quarter; autumn, winter, spring. Vickner

*201-202. *Old Norse, Scandinavian and Comparative Philology.*

*203. *History of the Swedish Language.*

*205-206. *Scandinavian Literature in the Nineteenth Century.* Vickner

*207. *Scandinavian Lyric Poetry.*

*209. *History of Scandinavian Literature.* Vickner

COMPARATIVE PHILOLOGY

190-191. Introduction to the Science of Language.—A study of the general principles of linguistic development with special reference to English. Lectures and discussions. Prerequisite, some knowledge of one of the classical languages and of one modern foreign language or Old English. Two credits per quarter; autumn, winter. Vickner

192. Life of Words.—Etymology and semasiology; growth of vocabulary; word values. Lectures, discussions and exercises. Prerequisites; same as for courses 190-191. This course is a continuation of courses 190-191 but may be taken separately. Two credits per quarter; spring. Vickner

SOCIOLOGY

Philosophy Hall

PROFESSOR WOOLSTON; ASSOCIATE PROFESSOR MCKENZIE; ASSISTANT PROFESSOR SPIER; INSTRUCTOR, STURGES; ASSOCIATE, McCABE.

Sociology treats of the development, organization and functions of human groups. Its general purpose is to explain the relations of institutions; to stimulate a critical and constructive attitude toward programs of reform and to furnish a sound basis of information for intelligent citizenship. Its practical outcome lies in preparation for advanced study, field investigation, teaching and administration in such lines as community and industrial welfare, law, diplomacy, journalism, public health and institutional management; and also in supplementing the specialized training along such lines.

Sociology is related to many problems treated in biology, psychology, history, economics, politics, education, home economics,

* Not offered in 1921-1922.

literature and philosophy. Students choosing sociology as a major or minor subject are urged to consult members of the department staff regarding their elections. Work in other departments may be essential for success in this field, and may, when approved, be credited toward advanced requirements.

The following basic and supplementary courses are particularly recommended:—Mathematics 13, zoology 16, 17, psychology 109, 118, education 151, economics 61, 162, political science 51, 100, history 71-2-3, 131, 149, English 73-4-5, 133-4-5, 164-5-6, philosophy 2.

Students are advised to postpone work in sociology until lower division requirements in biology, psychology, economics, and political science are completed. *Sociology 1 or its equivalent is prerequisite throughout*, and satisfies minimum requirements in this subject. Further work is arranged along three lines:

1. Anthropology, courses 51, 52, 91, 92, 93, 141, 142, 143, 204, 205, 206.

2. Social Problems and Methods of Reconstruction, courses 55, 56, 57, 58, 61, 62, 63, 103, 104, 105, 130, 156, 166, 171-2-3, 207, 208, 209, 211-12-13.

3. Social Theory and Methods of Investigation, courses 29, 60, 70, 160, 161, 162, 181, 182, 221, 222, 223.

For a major in sociology 36 credits are required. *The following are fundamental for advanced work: Courses 29, 60, 51, 55, 56.* Upper division courses should not be elected before completing such elementary work as instructors in special fields may suggest. Courses numbered over 200 are primarily for graduates. Qualified seniors may be admitted by permission of the instructor in charge. Advanced students are required to secure the approval of their program by the head of this department before completing their registration.

COURSES

1. *Introductory Sociology.*—A general survey of the field of social relations, with some discussions of the forces at work, the practical problems presented and the methods of solution suggested. Five credits; autumn, winter, spring. Required of all students in the department. Woolston and assistants

29. *Social Statistics.*—Methods and sources of quantitative investigation. Prerequisite, Math. 13. Three credits; winter. Sturges

51. *Growth of Culture.*—The origin and development of social institutions, industrial activities, and arts. Basic to courses in anthropology. Five credits; autumn, spring. Spier

52. *Primitive Social Life.*—The social institutions and folkways of primitive peoples. Five credits; winter. Spier

55. *Community Organization*.—A study of the principles of community organization, forms of community action, essentials of leadership. Three credits; autumn. McKenzie

56. *The Family*.—The origin of marriage, the family and its status, the effects of the industrial revolution, and the functions of the modern family. Three credits; autumn. McCabe

57. *Child Welfare*.—A study of the biological, psychological, social, and economic factors bearing on the welfare of children in modern society. Three credits; winter. McCabe

58. *Neighborhood Resources*.—A study of national, state and local organizations which deal with practical social problems; e. g., The Children's Bureau, American Red Cross, National Federation of Settlements, Community Service. Three credits; spring. McCabe

60. *Social Psychology*.—The instinctive and reflective side of man, and his adjustments to civilization. Prerequisite, psychology 1. Three credits; autumn. Woolston

61. *The Church as a Social Agency*.—The social psychology of religious groups: the relation of organized religion to philanthropy and social reform. Three credits; autumn. McKenzie

62. *Public Recreation*.—Organization of indoor and outdoor amusement; public morality and the use of leisure. Three credits; winter.

63. *Municipal Sociology*.—A study of the social conditions and problems of modern social life in American cities, and a discussion of the various agencies developed to deal with them. Three credits; spring.

70. *History of Sociology*.—The principal contributions to sociological science, from the standpoint of their background. Three credits; spring. Woolston

91. *Cultural Determinants*.—Factors that determine growth of civilization, as illustrated by the North American Indians. Three credits; autumn. Spier

92. *Peoples of Europe and Africa*.—Racial types and languages of the Old World; origins of historic cultures; the background of American immigrants. Three credits; winter. Spier

93. *Peoples of Asia and Oceania*.—Cultures and racial types in Eastern Asia, the Philippines, and the Pacific Islands. Three credits; spring. Spier

103. *Problems of Maladjustment*.—An examination of the biological, psychological, pathological, and economic factors involved in the various types of social maladjustment. Three credits; autumn. McKenzie

104. *American Social Conditions*.—An analytical and descriptive study of social conditions in America today and their relation to social progress. Primarily for teachers. Three credits; winter. McKenzie

105. *Industrial Welfare*.—A study of the problems relating to the industrial group. Designed especially for students expecting to enter the fields of industrial welfare or employment management. Prerequisites, sociology 1 and at least 5 credits in economics. Three credits; spring. McKenzie

130. *The Social Survey*.—Methods of planning, conducting, and presenting results of investigations of communities and institutions. Three credits; winter. McKenzie

141. *Primitive Religion*.—Religious institutions in primitive life; rise of theological systems. Three credits; autumn. Spier

142. *Communication*.—Modes of communication from the standpoint of beginnings and social relations. Three credits; winter. Spier

143. *Art and Recreation*.—Leisure time activities; development in art, literature, and pastimes. Three credits; spring. Spier

155. *Poverty and Philanthropy*.—Care of dependents and prevention of destitution; discussion of causes of poverty and methods of relief. Three credits; autumn. McKenzie

156. *Criminology*.—A study of the social, economic, and hereditary causes of crime; various theories and plans of prison reform; the relations of prisons and criminals to society. Three credits; winter. McKenzie

157. *Care of Defectives*.—Causes of disease and degeneracy; methods of treatment, education and prevention. Three credits; spring. McKenzie

160. *Programs of Social Reform*.—A critical examination of individualism, conservation, philanthropy, social justice, liberalism, unionism, the co-operative movement, the single tax, socialism and syndicalism. Three credits; autumn. Woolston

161. *Theories of Social Progress*.—A discussion of the factors involved in improving society and an estimate of their efficiency. Three credits; autumn.

162. *Social Ideals*.—A review of the great conceptions of social purpose and destiny. Three credits; spring. Woolston

171-172-173. *Methods of Social Service*.—Field experience under supervision at local social work organizations. Eight hours

field work, one hour conference. Permission of instructor necessary for registration. Prerequisites 56, 57, 155. Five credits; autumn, winter, spring. McCabe

181. *The Mind of America*.—An investigation of characteristic traits and tendencies shown in the population of the United States. Prerequisite, course 60. Three credits; autumn. Woolston

182. *The Urban Habit of Mind*.—A study of typical reactions shown by city-dwellers. Prerequisite, course 60. Three credits; winter. Woolston

GRADUATE COURSES

204-205-206. *Anthropological Methods and Theories*.—The analysis of culture; historical and psychological methods; theories of culture growth. Open to qualified seniors. Each quarter may be taken separately. Three credits per quarter; autumn, winter, spring. Spier

207-208-209. *Community Research*.—Original investigation of special community problems. Emphasis will be placed upon methodology and the interpretation of data. Prerequisite, graduate standing or special permission. Two credits per quarter; autumn, winter, spring. McKenzie

211-212-213. *Case Work Principles and Practice*.—A training course for social work. Eight hours field work, one hour conference. Permission of instructor necessary for registration. Prerequisites, courses 171-172-173. Five credits per quarter; additional credit by special arrangement. Autumn, winter, spring. McCabe

221-222-223. *Seminar*.—For graduate students who are candidates for higher degrees and for approved major students in the department, when recommended by an instructor in charge of their special work. The purpose is to train in methods of original research and investigation. Two credits; autumn, winter, spring. Woolston and associates

ZOOLOGY

Science Hall

PROFESSOR KINCAID; ASSISTANT PROFESSORS E. V. SMITH, GUNTHERP

1-2. *Elements of Zoology*.—A general review of zoological science, stressing the economic and philosophic aspects of the subject. Laboratory deposit, \$2.50. Five credits per quarter; autumn, winter, repeated winter, spring. Kincaid, Gunthorp and assistants

3. *Pre-Medical Zoology*.—For students entering upon a medical course. Laboratory deposit, \$2.50. Five credits; autumn. Gunthorp

4. *Vertebrate Zoology*.—The structure of vertebrates, with emphasis on mammalian organization. For students in medicine and physical education. Prerequisite, course 3 or 1. Laboratory deposit, \$2.50. Five credits; winter. Gunthorp

5. *General Embryology*.—The comparative developmental history of animals, with emphasis on vertebrate forms. For students in medicine, pharmacy and fisheries, but open to others. Prerequisite, course 1-2 or 3-4. Laboratory deposit, \$2.50. Five credits; spring. Gunthorp

16. *Evolution*.—A series of lectures upon the more important biological problems related to the general theory of evolution. Two credits; autumn. Kincaid

17. *Eugenics*.—The principles of evolution in their relation to human welfare. Two credits; spring. Kincaid

51. *Elementary Entomology*.—The structure, classification and economic relations of insects. Prerequisite, course 1-2 or its equivalent. Laboratory deposit, \$2.50. Five credits; spring. Kincaid

101. *Cytology*.—The anatomical, physical and chemical properties of the animal cell with special reference to the problems of development and inheritance. Prerequisite, course 1-2 or 3-4. Laboratory deposit, \$2.50. Five credits; winter. Gunthorp

106. *Plankton*.—The classification, adaptations and interrelationships of the microscopic fauna of the fresh and salt water. Field work in the neighboring lakes and in Puget Sound. Prerequisite, course 1-2. Laboratory deposit, \$2.50. Five credits; autumn. Kincaid

107. *Parasitology*.—Study of animal parasites. For students in medicine but open to others. Prerequisite, course 1-2 or 3-4. Laboratory deposit, \$2.50. Five credits; spring. Smith

108. *Aquatic Biology*.—Distribution, adaptations and interdependence of the several categories of aquatic organisms. For students in fisheries, but open to others. Prerequisite, course 1-2. Laboratory deposit, \$3. Five credits; spring. Kincaid

154. *Advanced Entomology*.—The morphology and ecology of insects, with emphasis on forms of economic importance. Prerequisite, course 51. Five credits; winter. Kincaid

155-156-157. *Elementary Problems*.—Students will be assigned minor problems which will be worked upon under the direction of one of the instructors in the department. Prerequisite, twenty hours in zoology or physiology. Laboratory deposit, \$2.50. Three credits; autumn, winter, spring. Kincaid, Smith, Gunthorp

GRADUATE COURSE

201-202-203. *Research*.—Students capable of carrying on independent research will be assigned problems to be worked upon under the direction of one of the instructors. Prerequisite, twenty-five hours of zoology or physiology. Credit to be arranged.

Kincaid, Smith, Gunthorp

PHYSIOLOGY

7. *Elementary Physiology*.—A general survey of the functions of the human body with special emphasis on metabolism, the nervous and vascular systems. Primarily for pharmacy students. Laboratory deposit, \$2.50. Five credits; autumn. Smith

8. *Elementary Physiology*.—A general survey of the structure and functions of the human body. Special emphasis will be placed on the digestive system and metabolism. A course especially designed for students in home economics, but open to others. Laboratory deposit, \$2.50. Five credits; winter, spring. Smith

54-55. *General Physiology*. Adapted to meet the needs of students expecting to teach the subject in high school. Required of students majoring in physical education; recommended for students majoring in home economics who desire more extended training than is offered in course 7, and for students in sanitary science. Laboratory deposit, \$3. Five credits; autumn, winter. Smith

56. *Principles of General Physiology*.—The application of the laws of physics and chemistry to physiological problems. Prerequisites, course 55, Chem. 3 and Physics 3. Laboratory deposit, \$3. Five credits; spring. Smith

151-152-153. *Advanced Physiology*.—Designed to meet the needs of students in medicine. Open to others prepared to carry the work. Prerequisites, Zoology 3, Chemistry 33 and Physics 3. Laboratory deposit, \$5. Five credits autumn, winter, spring.

SUMMER QUARTER

JUNE 21-AUGUST 30, 1921

DIRECTOR

FREDERICK E. BOLTON, PH. D., University of Washington

Facilities—The summer quarter is an integral part of the university year and its courses coordinate with the other quarters. It thus offers especial opportunities for teachers and others whose regular work is suspended during the summer months.

By the four-quarter plan regular students will be able to take their vacations during any quarter of the year, or by attending the four quarters each year they may complete their college course in three years. Regular work will be offered in the Colleges of Liberal Arts, Science, Law, Education, Fine Arts, Business Administration, the Graduate School, and in the Pre-medical Course. The Puget Sound Biological Station at Friday Harbor maintains a session of six weeks beginning June 20 and ending July 30. The laboratories, libraries and museum are open and the various departments offer both undergraduate and graduate work equal in quality to that maintained during the rest of the year. In most departments three grades of work are offered: (a) courses for beginners in the subject, (b) courses for advanced undergraduates, and (c) courses for graduate students. In a very large number of cases, heads of departments are in charge of the work. In addition to regular members of the faculty several prominent teachers from outside the University give courses.

For whom intended.—In addition to the regular undergraduate work in the various colleges exceptional opportunities are afforded for the following classes of persons:

1. College and university graduates who wish to specialize in some particular field or to work for advanced degrees.
2. Superintendents and principals who wish to acquaint themselves with recent progress in education or to study special problems.
3. High school teachers who wish to advance in their special lines of work.
4. Supervisors and teachers of music, domestic science, drawing and other special fields of work, who will find many courses suited to their needs.
5. School teachers who wish to work toward college degrees.
6. Directors of gymnasiums and teachers of physical education and playground work. The university campus offers unusual opportunities for playground demonstration, and special emphasis

will be placed on this important phase of education. The city of Seattle and the public school afford splendid objective illustrations of playground and recreation centers.

7. Undergraduates who for some good reason find it desirable to shorten the period of their college course.

8. Recent high school graduates who expect to enter the University in the fall who wish to get in touch with the University before that time. High school pupils find this a very advantageous plan.

9. Persons desiring training in child welfare work, social workers, Y. M. C. A. and Y. W. C. A. directors and teachers.

10. County superintendents who desire to study problems of rural school organization and social center and community center work.

11. Candidates for certificates who need special courses in education and psychology or other subjects.

12. Persons who are preparing to become specialists in college and normal school positions.

13. Persons who desire practical field work in botany, geology and zoology in a region possessing unique facilities.

14. Students who wish regular courses in law or special courses in law in preparation for teaching the commercial branches.

Registration.—Registration for the summer quarter will take place on Tuesday, June 21. Students expecting to be in attendance during the last six weeks only may register on or before Wednesday, July 27. Students should go first to Administration Hall, where notices will be posted giving the order of procedure in registration.

Students desiring to be enrolled in any college or school of the University will be assigned by the registrar to the deans of the respective divisions for assistance in making out their election of studies; those not intending, at this time, to become candidates for graduation will be assigned to the director of the summer quarter.

Admission.—The courses of the summer quarter are open to all persons eligible for admission to the University as either regular, unclassified or special students. As far as possible, all credentials for prospective students and applications for admission as special students should be in the hands of the registrar before the opening of the session.

Credits.—Students desiring university credit will be required to pass the examinations given during the closing week of each term. A maximum of nine quarter hours of credit may be obtained during each term.

Persons who expect to be candidates for any degree or the normal diploma at the close of the quarter should make application through the registrar on registration at the beginning of the session.

Fees.—The regular tuition fee of twenty dollars (\$20.00) is required of all students, and admits to all the privileges of the summer quarter, except certain laboratory courses and to special music courses requiring individual instruction. See the statements of these courses for the special fees. No reduction of fees will be made because of late registration or early withdrawal. Open lectures are free to all students regularly registered in the summer quarter and also to the public.

Masters' Degrees Through Summer Quarters.—At each succeeding summer quarter a larger number of graduate students are in attendance. Last summer more than a third of the whole number of attendants were graduate students. Many were planning definitely to apply their work toward higher degrees. The University will accept 36 credits earned during at least 30 weeks of residence in summer quarters as a fulfilment of the year of required residence, provided the student does work between the sessions under regulations prescribed by the graduate faculty and the departments concerned.

Correspondence Courses.—The University has established correspondence courses in many departments. These will be of special advantage to students who have been in attendance at summer quarters and who wish to go forward to the bachelor's degree. The correspondence work can be very advantageously planned as a continuation of the regular summer quarter. For detailed information concerning correspondence courses write to the Extension Service.

Education.—The summer quarter and the College of Education stand in very close relations to each other. Doubtless a large number who plan to secure a degree, or a normal diploma, through the College of Education will accomplish much in summer quarters. The work of the summer quarter being especially arranged for teachers will make it possible to accomplish this.

Business Administration.—An interesting curriculum of business courses is offered in the summer quarter for students who contemplate going into business. These courses will be along lines of business organization, corporation, finance, employment management, and kindred subjects. Teachers of commercial subjects will also find subjects of special importance in preparation for their work.

For bulletin of the summer quarter address the Registrar, University of Washington. For other information address Frederick E. Bolton, Director of the Summer Quarter.

PUGET SOUND BIOLOGICAL STATION

FRIDAY HARBOR, WASHINGTON

June 20-July 30, 1921

DIRECTOR

THEODORE CHRISTIAN FRYE, PH. D., University of Washington

Station and Surroundings.—The Puget Sound Biological Station is situated in a sheltered bay near the town of Friday Harbor, the county seat of San Juan County, with a population of approximately 800. It is between Bellingham and Victoria, about 25 miles from the former and about 20 miles from the latter.

San Juan County consists of an archipelago of something like 100 islands, separated by channels cut by glacial action. The northern islands of the county are composed of sandstone, comparatively easy eroded, and wearing into potholes and peculiarly pocketed walls. In the sandstone are occasional beds of fossils, notably on the Sucia Islands. On Waldron Island and the Sucia Islands the sandstone is being cut for paving blocks for city streets.

Some of the islands are partly limestone, notably the north end of San Juan and the west side of Orcas. The largest lime works in Washington is at Roche Harbor, at the northwest corner of San Juan Island. However, comparatively little of the shore line of the archipelago is limestone.

Most of the islands are composed of metamorphic rock, which is very resistant to weathering and therefore changes very little. This is one of the reasons for the remarkable wealth of fauna and flora. Here and there are beaches of glacial material, or of sand, or flats of mud. There are no large streams on the islands, and therefore the water is exceptionally free from river detritus. Through the channels between the islands the tides rush at times with a velocity of seven to ten miles an hour, filling and again draining the Gulf of Georgia. This gulf is a body of water roughly 100x20 miles, and the spring tides are about twelve feet. The channels in the Friday Harbor region are the chief points of entrance and escape for this immense volume of water. Thus the rocky points are swept clean from erosion deposits, the water is constantly aerated and changed, and a good habitat for water forms insured. Some of the channels are over 100 fathoms deep, thus affording opportunity for the study of forms of life to a considerable depth. Those who have been at the station have again and again attested to the abundance of marine life. A 12-foot tide exposes a wide beach, and gives excellent opportunity for the study of shore life.

The site of the station is on a steep, rocky hillside, forested with conifers. The land was donated by Mr. Andrew Newhall, and is about a quarter of a mile from the village. A road runs through the grounds to the village. The village contains about a dozen stores, and any ordinary purchases may be made there.

The University of Washington also holds a lease on 485 acres about one mile from the present site, and expects to move there when suitable buildings have been erected.

Building and Equipment.—The zoological laboratory was built in the spring of 1910. It is about 30x60 feet, two stories and attic. The building is just above high tide on a steep shore. Material can therefore be landed from a small floating dock anchored to the pillars of the laboratory itself. On the first floor are laboratory tables and stock room. The attic is a general storeroom and drying loft. A dark room is fitted up for photography. Both fresh and salt water are piped to all parts of the building.

The botanical laboratory was built as a part of the dining hall in the spring of 1913. It has fresh water piped into it, and there is a dark room adjacent.

Compound microscopes are taken up from the University of Washington; some general glassware is supplied. Certain ordinary glassware, containers, and preservatives may be secured at the stock room. It is the aim to have in the stock room the things ordinarily called for. Unusual things cannot be supplied. Those wishing special apparatus should write the Director. Usually the station hires a shrimp trawler for one month. Rowboats are on hand for general use.

Supply Departments.—A supply department has been established for the purpose of providing material for class use and for investigators at the station; also for supplying museums and schools with zoological and botanical material for their exhibits or classes. A price list will be furnished on application to the Director of the Station. Those who attend the station may have a reasonable amount of material for their own laboratories put up at very nearly cost. This will permit scientists to put their whole time on class work investigation. Teachers who wish to make small collections for their own use are not discouraged in their endeavors. Those who are looking forward to collecting large quantities of material should first correspond with the station authorities. Scientists are urged to co-operate with the station in its endeavor to earn part of its running expenses through its supply department.

Library.—The library contains about 500 volumes, of which about 160 are bound volumes of reprints. A limited number of books are shipped to the station every summer from the University.

Lectures.—General lectures by the station staff or by visitors are given as the occasion arises.

Registration.—Experience has shown that it is wise to register for one full course only. Six weeks is a very short time to give to any course, even though one's whole time be put on the work. Advanced students have found it profitable to begin some line of investigation in the same field in which they are carrying a course.

Credit.—Students giving their whole time to the work may earn one semester-credit or one and one-half quarter-credits per week.

Expenses.—For one person for six weeks the cost is about as follows:

Station fee -----	\$13.00
Tent, two in a tent-----	5.00
Board (estimate) -----	36.00
Books (estimate) -----	5.00
Incidentals (estimate) -----	4.00
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Total -----	\$61.00

The station fee of \$13 goes toward paying the running expenses of the station. There is no laboratory fee. For persons occupying research rooms the station fee is \$50, instead of \$13.

The tents are 10x12 feet, on board platforms with three-foot board wall, making the lowest part about five feet. They are rented during the season for \$1.50 per week per tent, including bed springs, mattresses, lamp, broom, camp chairs, buckets, wash basins, and drinking cups. During the time before and after the session the rental is \$1 per week. Stoves may be rented for \$1.50 for the season. Bedclothes and pillows are not furnished, although they may be bought at the village. Persons coming to the station should bring a sufficient supply of bedding for cold nights. The whole lodging system is merely self-supporting over a term of years.

Meals are served in the dining hall at six dollars per week. The service is merely self-supporting over a term of years, and as nearly co-operative as the conditions permit. The dining hall is about 75 feet above the sea level, and commands a splendid view of channels and islands in the foreground, with Mount Baker lifting its ice-covered peak 12,000 feet high in the distance.

For bulletin of the Puget Sound Biological Station address the Registrar, University of Washington. For other information address T. C. Frye, Director of the Puget Sound Biological Station.

UNIVERSITY EXTENSION SERVICE

OFFICERS OF ADMINISTRATION AND INSTRUCTION

HENRY SUZZALLO, Ph. D. (Columbia), LL. D., (California), President of the University.
JOHN THOMAS CONDON, LL. M., (Northwestern), Dean of Faculties.
EDWIN AUGUSTUS START, A. M., (Harvard), Director of the Extension Service.

ADMINISTRATIVE BOARD

DIRECTOR START, Chairman

DEAN THOMSON, Liberal Arts
DEAN LANDES, Science
DEAN BOLTON, Education

DEAN MILLER, Business Administration
PROFESSOR RAITT, Home Economics
COMPTROLLER CONDON

THE FACULTY

The Extension faculty is composed of members of the general faculty who give extension courses and of the following instructors on the Extension staff.

AILETA MARIA GILLETTE, A. B., (Smith), A. M., (Washington), Instructor in English.
JAMES M. MCCONAHEY, LL. B., (Northwestern), C. P. A., Lecturer in Accounting.
WILLIAM B. HENDERSON, Lecturer in Foreign Trade.
EMUEL J. FORMAN, Lecturer in Water Transportation.
WAYNE E. BUTTERBAUGH, A. B., (Pennsylvania), Lecturer in Industrial Traffic.
PAUL MORGAN GUSTIN, Lecturer in Fine Arts.
VICTOR ALONZO LEWIS, Lecturer in Fine Arts.
IRENE EWING DAVIS, Lecturer in Fine Arts.

OFFICE STAFF

MARY C. GRADY, Office Manager.
CORINNE B. BABCOCK, Secretary in charge of Seattle city office.
EDNA HINDMAN, A. B., (Washington), Secretary for Correspondence Study.
HARRIETTE R. BAILEY, Stenographer.
BLANCHE I. BINGHAM, Stenographer.

OFFICES

The general offices of the Extension Service are on the University campus, in a small building devoted exclusively to their use. It is the third building on the right from the Fortieth Street entrance.

A city office is maintained in the Henry Building, in the heart of the business district of Seattle.

THE EXTENSION SERVICE

The Extension Service of the University of Washington (known as the Extension Division until 1917) was organized in 1912, as an integral part of the University to promote and administer its work outside the campus. At the present time its field embraces university teaching by correspondence and in classes for those who cannot attend the University.

DIVISION OF INSTRUCTION

Extension teaching is primarily for adults and for those who cannot attend the University. Many of the subjects offered may be taken for credit toward a university degree, but this is a second-

dary object, the primary one being to make university instruction available to as many persons as possible who could not otherwise obtain it.

This teaching is carried on by correspondence, which is available to anyone, anywhere, at any time; and by classes conducted at different places.

Correspondence courses are offered in the departments of astronomy and navigation, botany, classical languages and literature, (Greek, Latin), economics and business administration, education, English, forestry and lumbering, geology, history, home economics, philosophy, physics, political science, psychology, Romanic languages and literature (French, Italian, Spanish), sociology, and zoology.

Class work is offered in Seattle, and in other cities as far as practical, in many of these departments and in some others. Both lists are subject to change from time to time, as courses are added or withdrawn.

The greater number of the extension courses parallel the resident university work and may be taken by qualified persons for credit toward a university degree. Some are planned to meet vocational needs of those who have no university degree in view.

Announcements of the Extension Service are published in bulletins issued at intervals of one or two months.

In Seattle the Extension Service maintains a city office and downtown classrooms, where a program of classes in various subjects is annually carried on. This schedule varies somewhat from year to year but usually includes general economics, accounting (three full year courses), advertising, business correspondence, business law, employment management, foreign trade, water transportation, French, Italian, Spanish, subjects in home economics, philosophy and psychology.

Extension classes have been conducted in Aberdeen, Bellingham, Everett, Hoquiam, Olympia, Spokane, Tacoma, and Yakima. On account of time and distance it has not been possible to develop this work on the same basis of permanence and regularity as that in Seattle, but as much is done as possible and any real local demand is generally met.

Fees.—In accordance with the wishes of the Legislature of 1921 all university extension work must hereafter be entirely self-supporting. The fees hitherto charged have therefore had to be increased. They are still very moderate, being kept low enough to cover only the actual cost. The cost of courses varies according to their length from eight to twenty-four dollars.

GRADUATE MEDICAL LECTURESHIP

In 1916 the Extension Service, with the coöperation of the Washington State Medical Society and the King County Medical Society, instituted a Graduate Medical Lectureship. The King County Medical Society annually appoints a committee which works with the representatives of the Extension Service in planning the course. The lectures are held in the early summer, and occupy five days. They are open to graduate physicians and surgeons. A fee is charged and any surplus over the expenses of the year goes into a special fund to be used as a reserve fund for the maintenance of this lectureship, or for the extension of medical education. The lectureship has proved of great value to the physicians and surgeons of the Pacific Northwest, bringing to them each year some of the best thought of the medical education centres of the country.

The lecturers have been :

- 1916. Dr. Charles L. Mix, Chicago, Northwestern University.
- 1917. Dr. Martin H. Fischer, University of Cincinnati.
Dr. Allen B. Kanavel, Chicago, Northwestern University.
- 1918. Omitted on account of the war.
- 1919. Dr. Charles Lyman Greene, St. Paul.
Dr. Dean Lewis, Chicago.
- 1920. Dr. Henry A. Christian, Boston, Harvard University.
Dr. Barton Cooke Hirst,, Philadelphia, University of Pennsylvania.
- 1921. Dr. Charles F. Hoover, Cleveland, Western Reserve University.
Dr. Carl A. Hamann, Cleveland, Western Reserve University.
Dr. Harris P. Mosher,, Boston, Harvard University.

BIBLIOGRAPHY

Publication for the year 1920 and for the first three months of 1921.

ASTRONOMY

BOOTHROYD, S. L.

The Orbits of the Spectroscopic Components of Boss 4602.—Publications of the Dominion Astrophysical Observatory at Victoria, B. C.

BACTERIOLOGY

WEINZIRL, JOHN

Detection of Manural Pollution in Milk by the Anaerobic Spore Test.—American Journal of Public Health. February, 1921.

BOTANY

FRYE, T. C.

Notes on Useful and Harmful Mosses.—Bryologist 23:71. 1920.

The Pan-Pacific Scientific Congress.—The Pacific Review, Vol. 1, pp 422-424. 1920.

Plant Migrations along a Partly Drained Lake.—Publications Puget Sound Biological Station 2, pp 303-397. 1920.

The Puget Sound Biological Station.—Reports of Pan-Pacific Scientific Congress of 1920. 1 page.

The Seaweeds of Puget Sound.—Reports of Pan-Pacific Scientific Congress of 1920. 3 pages.

HOTSON, JOHN WILLIAM

Collar-rot of Apple Trees in the Yakima Valley.—Phytopathology 10, pp 465-486 (with 15 illustrations in text, 1920.

Planting and Care of Shade Trees.—Northwest Journal of Education 31, pp 205-208. Illustrated. 1920.

Tree Surgery.—Northwest Journal of Education 31, 295-299. Illustrated. 1920.
RIGG, GEORGE BUNTON

Abstracts of All Papers of Botanical Interest in the Journal of Biological Chemistry, Journal of American Peat Society, and Botanical Notes from Trinity College (Dublin). Botanical Abstracts, Vols. 3 and 4. 1920.

Some Factors in Evergreenness in the Puget Sound Region.—Ecology, Vol. 2, No. 1. 1921.

CHEMISTRY

BENSON, HENRY KREITZER

Low Temperature Distillation of Sub Bituminous Coal.—(with R. E. Canfield) Journal of Industrial and Engineering Chemistry 12, pp 443. 1920.

DEHN, WILLIAM M.

Apparatus for the Estimation of Alcohol in Beverages. U. S. Patent. 1920.

A Chemical Method for the Detection in Fruit of a Prior Frozen Condition.—(with M. C. Taylor). Journal of Industrial and Engineering Chemistry 12, pp 977-978. 1920.

SMITH, G. MCPHAIL

Heterogeneous Equilibria between Aqueous and Metallic Solutions: The Interaction of Mixed Salt Solutions and Liquid Amalgams.—(with L. S. Wells) Sixth Paper. Journal of American Chemical Society 42, 1920.

A Simple Combustion Method for the Determination of Halogen in Organto Compounds.—Journal of American Chemical Society 42, 1920.

TARTER, H. V.

The Reaction between Nitrogen Peroxide and Copper.—(with W. L. Semon) Journal of American Chemical Society, March, 1921.

THOMPSON, THOMAS G.

The Intersolubility of Chloropterol in Water.—(with J. H. Black) Journal of Industrial and Engineering Chemistry 12, p. 1066. 1920.

Pressures Produced by the Action of Sulphur Monochloride upon B, B'-Dichloroethyl Sulfide.—(with F. J. Kopp) Journal of Industrial and Engineering Chemistry 12, p. 1056. 1920.

The Solubility of B, B'-Dichloroethyl Sulfide in Petroleum Hydrocarbons and its purification by Extraction with these Solvents.—(with Henry Odeen) Journal of Industrial and Engineering Chemistry 12, p. 1057. 1920.

CLASSICAL LANGUAGES

SIDEY, THOMAS K.

Some Unnoted Latinisms in Tennyson.—Modern Language Notes. Johns Hopkins University, April, 1920.

DRAMATIC ART

HUGHES, GLENN ARTHUR

Broken Lights.—University of Washington Press, 1920.

Concerning a Theatre of the People.—Drama Magazine, October, 1920.

The Changing Theatre.—Pacific Review, September, 1920.

ECONOMICS

LEWIS, HOWARD THOMPSON

The Trade of the Pacific.—Annual American Academy, 1921.

PRESTON, HOWARD HALL

History of Banking in Iowa.—Written for the Historical Society of Iowa. 1920.

EDUCATION

AYER, FRED C.

The County Unit System.—Legislative Bulletin of the Washington Education Association. 1921.

BOLTON, FREDERICK E.

A Selected Bibliography of Books and Monographs on Education.—Published by State Superintendent of Public Instruction, Washington, March, 1920.

JENSEN, GEORGE HENRY

Proceedings of Vocational Section Inland Empire Teachers Association.—10 pages, Apr. 1, 1920.

TERRY, PAUL W.

An Experimental Study in the Reading of Isolated Numerals and of numerals in Arithmetical Problems.—Supplementary Educational Monographs. 1921.

Persistence in High School as Related to Curricula in Four Years Accredited High Schools of Washington. 1921.

WOODY, CLIFFORD

Scientific Method in the Evaluation of Subject-Matter in Spellers.—Journal of Educational Research. January 1920.

The Administration of the Psychology Prerequisite to Courses in Education.—Journal of Educational Psychology, February, 1920.

Principles and Factors to be Considered in the Construction of the Salary Schedule.—Northwest Journal of Education, March, 1920.

Overlapping of the Contents of Fifteen Second Readers.—Journal of Educational Research, June, 1920.

Socialized School Organization.—Proceedings of Washington Educational Association, 1920.

The Woody Arithmetic Tests: How to Use Them.—(Monograph) Bureau of Publications, Teachers College, Columbia University, 1920.

Arithmetic: Report of Progress. Duluth Public Schools.—Journal of Educational Research, January, 1921.

Arithmetic Survey in the Public Schools of Newark.—Journal of Educational Research, January, 1921.

The Alexander Speller.—Alumni Quarterly, December, 1920.

ELECTRICAL ENGINEERING

CURTIS, LESLIE F.

Voltage Wave Analysis with Indicating Instruments.—Bulletin No. 6, Engineering Experiment Station, University of Washington. 28 pages. 1920.

MAGNUSSON, CARL EDWARD

Trunk Transmission Lines.—Journal of Electricity, December, 1920.

The Centennial of the Discoveries of Oersted, Arago and Ampere.—Journal of A. I. E. E., Vol. 39, pp 1031-1033. 1920.

Trunk Transmission Lines and Water Power Development.—Pacific Review, December, 1920.

MECHANICAL ENGINEERING

WILSON, GEORGE S.

An investigation of Compound Spruce Pulleys.—Bulletin No. 10, Engineering Experiment Station, University of Washington. October, 1920.

ENGLISH

BENHAM, ALLEN R.

Political Principles of Lord Beaconsfield.—Pacific Review, June, 1920.

John Heywood, the Four Ps (modernized).—Privately published at the University of Washington. March. 1921.

GARRETT, ROBERT MAX

The Poetry of Australia.—Pacific Review, December, 1920.

A Second Word-List from Washington.—Dialect Notes, December, 1920.

Masterlinck and Mediaeval Gardens.—Sewanee Review, January, 1921.

PADELFORD, FREDERICK M.

The Poems of Henry Howard, Earl of Surrey.—University of Washington Publications in Language and Literature. pp. 238. 1920.

A Crisis in Scientific Research.—Pacific Review, September, 1920.

FISHERIES

CORB, JOHN N.

Opportunities in the Fish Canning Industry.—Pacific Fisherman Year Book, pp 114-116. Illustrated. 1920.

The Puget Sound Salmon Situation.—Pacific Fisherman 18, No. 5, pp 21-22. 1920.

Papers on the Exploration of the North Pacific Ocean. Scientific Problems of the Fisheries of the North Pacific.—Bulletin No. 9, Scripps Institution for Biological Research of the University of California. 19 pages. 1920.

The Future of the Pacific Fisheries.—Paper in symposium on "The Animal and Plant Resources of the North Pacific Ocean", at meeting of Pacific Division American Association for the Advancement of Science. Pacific Fisherman 18, No. 7, pp 26, 27, 61. 1920.

Value of the Fisheries College.—Canadian Fisherman, Quebec, Canada. Vol. 7, No. 6, pp 128-131. 1920.

Pacific Salmon Fisheries.—App. 1, Report U. S. Com'r of Fisheries for 1921, 31 plates. 1921.

FORESTRY

CLARK, ELIAS T.

Pacific Coast Logging.—West Coast Lumberman, May, 1920.

KIRKLAND, BURT P.

The Economics of Private Forestry.—Journal of Forestry 18, No. 3, March, 1920.

Cooperation between National Forests and Adjacent Private Lands.—Journal of Forestry 18, No. 2, February, 1920.

Continuous Forest Production on Private Lands.—Lumber World Review, January, 1920.

Forest Resources of Washington.—Forest Club Annual, U. of W. 1920. Also in Proceedings of Washington Association of Commercial Organization Secretaries. 1920.

WINKENWERDER, HUGO

History of Education in Logging Engineering.—Proceedings Pacific Logging Congress and reprinted in whole or in part in four trade journals. October, 1920.

GEOLOGY

LANDES, HENRY

A Report on a Proposed Rock Tunnel from the Masonry Dam to the Northwest Margin of Cedar Lake.—Report for Public Utilities Committee of the Seattle Council. 1920.

GERMAN

ECKELMAN, ERNEST O.

The Positive Element in Jacob Wasserman's Art.—Pacific Review, March, 1921.

HISTORY

MCMAHON, EDWARD

Lincoln and Civic Liberty.—Pacific Review, June, 1920.

LIBRARY

SMITH, CHARLES WESLEY

The Library as a Teaching Institution.—Presidential Address before the Pacific Northwest Library Association, Portland, September, 1920. Proceedings of the Association. 1921.

MATHEMATICS

BELL, ERIC TEMPLE

On a Certain Inversion in the Theory of Numbers.—Tohoku Mathematical Journal 17, Nos. 3, 4, pp 220-231. Sendai, Japan. May, 1920.

On the Enumeration of Proper and Improper Representations in Homogeneous Forms.—Annals of Mathematics 21, No. 3, pp 166-179. March, 1920.

Class Number Relations and Certain Remarkable Sums Relating to Quinary and Senary Quadratic Forms.—Quarterly Journal of Pure and Applied Mathematics 49, No. 193, pp 45-51. Cambridge, England, 1920.

Parametric Solutions for a Fundamental Equation in the General Theory of Relativity and Gravitation, with a Note on Similar Equations in Dynamics.—The London, Cambridge, Edinburgh and Dublin Philosophical Magazine 39, March, 1920.

Sur les Représentations Propres par Quelques Formes Quadratiques de Lionville.—Journal des Mathématiques pures et appliquées, Paris. pp 249-271. September, 1920.

On the Representations of Numbers as Sums of 3, 5, 7, 9, 11, or 13 Squares. American Journal of Mathematics 42, No. 3, pp 168-188. July, 1920.

Sur la Forme Arithmétique α plus γ et l'équation modulaire pour la transformation du troisième ordre des Fonctions Elliptiques.—Bulletin de la Société mathématique de Grèce; tom III fasc. 1, 1920.

The Equation $ds^2 = dx^2 + dy^2 + dz^2$.—Bulletin of the American Mathematical Society 26, No. 7, pp 312-318. April, 1920.

Definition and Illustrations of New Arithmetical Group Invariants.—Bulletin of the American Mathematical Society, 2nd Series, Vol. 26, No. 4, pp 211-223. February, 1920.

On Proofs by Mathematical Induction.—American Mathematical Monthly 27, pp 413-415. November, 1920.

And Still It Moves.—Pacific Review, June, 1920.

MORITZ, ROBERT EDOUARD

The Character of the Roots of a Quadratic Equation.—School, Science and Mathematics, May, 1920.

MINING

DANIELS, JOSEPH

Coal Mining in the State of Washington.—Proceedings Canadian Institute of Mining and Metallurgy, 1920.

The Coking Industry of the Pacific Northwest.—Bulletin No. 9, Engineering Experiment Station, University of Washington. September, 1920.

The Coal Mining Industry of Washington.—Bulletin, Washington State Geological Survey, 1920.

ROBERTS, MILNOR

A Proposed Iron and Steel Plant on Puget Sound.—Alaska and Northwest Mining Journal, Vol. 13, No. 5, pp 1-3. 1920.

Gold Mining Conditions in Alaska.—Engineering and Mining Journal, Vol. 110, No. 25, pp 1167-1168. 1920.

ORIENTAL LANGUAGES AND LITERATURE

GOWEN, HERBERT H.

The Canite and Sethite Genealogies of Genesis, and other Critical Notes.—Anglican Theological Review, March, 1920.

The Long Arm of Oriental Heroes.—Anglican Theological Review, May, 1920.

Sonnet Stories from the Chinese.—Privately printed, December, 1920.

The Folk-Lore of the old Testament.—Anglican Theological Review, March, 1921.

Wanted: An International Conscience.—Pacific Review, March, 1921.

The Color Terms of the Old Testament.—Anglican Theological Review, October, 1920.

Healing Cults within the Church.—American Church Monthly, November, 1920.

PHARMACY

PATTY, FRANK ARTHUR

A Reliable Disinfectant.—Bulletin of the Kansas State Board of Health, May, 1920.

Chemical Abstracts.—August, 1920.

PHYSICS

ANDERSON, S. HERBERT

Aerial Navigation.—Air Service Information Circular Vol. 1, No. 82. June, 1920.

Aeronautic Instruments.—Transactions, American Society of Mechanical Engineers, 1920.

PSYCHOLOGY

SMITH, STEVENSON

Chapters in General Psychology.—(with E. R. Guthrie) University of Washington Press, 1921.

ROMANIC LANGUAGES

UMPHREY, GEORGE W.

Los Amantes de Teruel, with introduction and notes.—Pages XXXII, 135. Heath and Co.

Spanish-American Poets of Today and Yesterday. II Jose Santos Chocano. el Poeta de America.—Hispania, Vol. III, No. 6. December, 1920.

El Americanismo en los Nuevos Poetas Anglo e Hispano-Americanos.—Mercurio Peruano. Lima, Peru. Vol. 5, No. 27, September, 1920.

Los Poetas Contemporaneos en los Estados Unidos.—Mercurio Peruano, Vol. 5, No. 28, October, 1920.

El Panamericanismo.—La Epoca, Buenos Aires, October, 1920.

La Educacion Superior en los Estados Unidos.—El Argentino, La Plata, October 1920.

Walt Whitman, el poeta de la Democracia.—Pegaso, Montevideo, Uruguay. Vol. 4, No. 29. November, 1920.

—
SPIER, LESLIE

SOCIOLOGY

Notes on the Kiowa Sun Dance.—Anthropological Papers, American Museum of Natural History, Vol 16, part 7. In press.

WOOLSTON, HOWARD B.

Japanthropy.—Pacific Review, December, 1920.

ZOOLOGY

GUNTHERP, HORACE

To Kill Cats for Laboratory Uses.—Science, 51:87. 1920.

Bird-lore's Twentieth Christmas Census, Topeka Kansas.—(with Sidney Hyde) Bird-Lore, 22:41. 1920.

Bird Study in the Mississippi Valley.—School, Science and Mathematics, 20:383-391, 1920.

Summary of Wood's Myriapoda Papers.—Canadian Entomologist, 52: 112-114. 1920.

An Improved Method of Holding Large Specimens for Dissection.—Science, 51: 543. 1920.

The Research Contribution of the Smaller Colleges.—(with E. Leigh Mudge) School and Society, 11: 656-660. 1920.

White-Winged Crossbill at Topeka, Kansas.—Wilson Bulletin, 32: 6263. 1920.

Note on Distribution and Spermatogenesis of Myriapoda.—Science, 52: 36-37. 1921.

The Washburn College Situation.—(with E. Leigh Mudge and J. E. Kirkpatrick) School and Society 12: 97-99. 1920.

Pulsation of Cat's Heart after Death.—Science 53:02.

SMITH, ELI VICTOR

The Taking of Immature Salmon in the Waters of the State of Washington.—State of Washington, Office of the State Fish Commissioner. 1920.

DEGREES

DEGREES CONFERRED JUNE 21, 1920

BACHELOR DEGREES COLLEGE OF LIBERAL ARTS

Bachelor of Arts

Allen, Helen Frances	Kaufman, Edith Rachel (<i>cum laude</i>)
Anderson, Hilma Emelle ¹ (<i>cum laude</i>)	Kitamura, Morimitsu (<i>cum laude</i>)
Armstrong, Ruth Anne	Krohn, Violet Lucille
Arntzen, Edward Jargo (<i>magna cum laude</i>)	Kruse, Mildred Margarethe ²
Bates, Bernard Riheldaffer	Lamberson, Frances Garner
Bogardus, Almon Eugene	Lawrence, Edna May (<i>cum laude</i>)
Bollman, Dean Stanley ¹	Logg, David Gladstone ¹
Bragdon, Ruth Alwin	Loomis, (Mrs.) Minerva Udell ²
Brown, Ford Keeler (<i>cum laude</i>)	Lucas, Harriett Yoder
Brown, Lois Eula	McCausland, Elizabeth
Bruce, Helen Roslyn	McConihe, Almee Katherine ²
Brown, Ford Keeler (<i>cum laude</i>)	McCormick, Dell Jerome
Burnside, Mary Frances	McCrea, Mary Helen
Butler, Benjamin Fox	McHugh, Edward Robert ²
Cage, Mary	McKay, Eloise
Campbell, Florence Elizabeth	McKillop, Marjorie ¹
Campbell, Kenneth (<i>cum laude</i>)	Maclean, Maude
Campbell, Mary ²	Masui, Leonard Goroku
Carlin, Agnes Adele	Mathieu, George Eugene
Chamberlain, Elizabeth	Merchant, Jessie
Christensen, Agnes Brigitta ²	Milne, Marjorie
Clyde, Paul Dean	Milton, Fletcher Roberts
Cochran, Velma (<i>cum laude</i>)	Morehouse, Dorothy ¹
Coe, Curtis Pearre ²	Morton, Lucie Wellington ²
Coffin, Geraldine	Munger, Ruth Willard
Coffin, Margaret (<i>magna cum laude</i>)	Nelson, Earl Calvin
Collins, Claude Chester ²	Newton, Cornelia Elizabeth
Council, Elizabeth	Nichols, Walter Robert ²
Craib, Margaret Cumming ²	Nicoll, Phila
Crouley, Anne Claire	Norwood, Annie
Cunningham, Theresa	Owen, Evelyn Claire
Dahl, Victor Vinje	Packard, (Mrs.) Lefay Davy ¹
Devlin, Mary Elmah	Parker, George Burnett
Dirimple, Bell ²	Parker, John Allen
Elchner, Isabel	Peterson, Clarence Walter
Ellsworth, Paul Theodore (<i>cum laude</i>)	Peterson, Philip Leonard
Ertle, Una Beatrice ²	Phillips, Herbert Joseph ²
Evans, Lecll Lacey ¹	Pickrell, Evelyn Ann
Ferguson, Frances Patricia	Playter, Mirie Denison
Finley, Sylvia Elfreda ² (<i>cum laude</i>)	Powllson, Lucille Alice
Fisher, Julia Euphemia ¹ (<i>cum laude</i>)	Preston, Frank Manley
Franklin, Alice Virginia	Rasmussen, Violet Mary ²
Gardner, Jessie	Ratigan, Thomas ²
Gardner, Raymond Locke ¹	Rhoades, Luke Caldwell ²
Gilbert, Elon James	Rice, Edith Allegra
Gillett, Frank Richard	Rice, Margaret Dorothea
Gleason, Dorothy ²	Richards, Winifred Baker ²
Glover, Oscar Kern ²	Richardson, Margaret ²
Greene, Lew Abrams	Riley, Gladys Florence
Greiner, Ruth Helen	Robinson, Bessie May ²
Haecker, Mary Mendota ²	Russell, Pearl Elizabeth ²
Hammarberg, Agnes Elizabeth	Saunders, John Monk ²
Hayner, Miriam Marjorie	Scott, Burton Foote ²
Hayner, Norman Sylvester	Shannon, James Francis
Henderson, Ruby Jean	Simpson, Lurline Violet (<i>cum laude</i>)
Hevly, Martin Bernard	Slauson, Ruth Irvine (<i>cum laude</i>)
Holmes, Raymond David	Smith, Priscilla Margaret
Hoover, Glen Edwin ²	Stegner, Guy Trent ²
Hossack, Myra Louise	Taylor, Grace Gladys
House, Osceola Louise	Tidball, Ben Watson
Hughes, Ina Belle	Thomas, Irving Wheat ²
Jensen, Arne Sigurd ²	Walker, Charles Hall
	Waltheu, Dorothy Eleanor

NOTES The persons whose names are followed by the superior figures ¹, ² received their degrees in the quarters of 1919-1920 ending in August, December and March, respectively; all others in June, 1920.

For degrees conferred at the end of the summer quarter, August 30, 1920, see page 324.

Walthew, Winifred Edna
 Watson, Anna Elizabeth
 Watson, Jean Ferguson
 Whitehead, Virgil
 Wilbur, Edward Perry¹
 Wilson, Doris Glasgow (*cum laude*)

Winter, Katherine¹ (*cum laude*)
 Wolff, Katherine Christina
 Wong, Hokkan²
 Woolpert, Ruth
 Young, Ruth Evelyn
 Zimmerman, Chloë Anice³

COLLEGE OF SCIENCE

Bachelor of Science

Carey, Robert Lincoln
 Chamberlain, Percy Ira
 Colman, Kenneth Burwell¹
 Dammann, Marjorie Luse
 Eagleson, Helen Elizabeth
 Garratt, Eugenia Enid
 Gilliland, William Lester
 Gunna, Marjorie (*cum laude*)
 Hall, Maude Elizabeth
 Hamm, Verda Gladys
 Helst, Lulu
 Herron, Willard George
 Hurley, Douglas Chester
 Kellner, Frank Everts
 Kirkham, Virgil Raymond
 Klopfer, Henrietta Johanna²
 Larssen, Kirsten² (*cum laude*)
 Lundstrom, Margaret
 MacClain, Albert Lewis
 MacDougall, John Brock

McConihe, Paul¹
 Moran, Malcolm Edward
 Myer, Thelma Anna Cecella (*cum laude*)
 Pepper, Echo (*cum laude*)
 Phelps, Vera May²
 Phillips, Ruth Naomi
 Presley, Dorothea
 Regan, Chester Alphonsus
 Reuter, Alexia Magdelene (*cum laude*)
 Sanden, Arthur Gustav Andrew
 Sartoris, George Bartholomew
 Shelton, Edward Mason, Jr.²
 Stewart, Isabel Clarissa
 Thompson, Effie Hazel
 Wallace, Carl
 Werby, Helena Johna
 Whitney, Frank Fleming
 Whyte, Kenneth¹
 Wolthausen, Eldon LeRoy

Bachelor of Science in Home Economics

Abel, Lena Blanche
 Allen, Mabel Derry²
 Anderson, Rachel Dorothy
 Barlow, Hertilla
 Benthien, Elsie Marie²
 Bjorklund, Ellen Margaret
 Burgess, Henrietta
 Countryman, Eva
 Faubert, Alice³
 Floyd, Lona Mildred
 Guenther, Chrystel
 Hallin, Ruth Marjorie
 Heywood, Carrie²
 Johnson, Florence
 Legg, Lois Cornelia⁴
 Lewis, Anna
 Lonke, Lillian Jensine²

Ludwigs, Flora Emma
 McCormick, Vivian Isabel
 Morris, Leotta Genevieve
 Rader, Grace McDonald²
 Stanton, (Mrs.) Blythe Bradley
 Stephenson, Marian Lucile
 Stevenson, De
 Thompson, Elizabeth Ruth¹
 Todd, Marcele Ruth
 Turner, Laura Anna²
 Watson, Ruth Elizabeth
 Watson, (Mrs.) Vivian Thrun
 Watt, Mabel
 Weaver, Grace Elizabeth³
 Williams, Carrie Colver²
 Williamson, Mary Agnes
 Wilson, Lena Aveline²

COLLEGE OF EDUCATION

Bachelor of Education

Abel, Marjory
 Alberts, Florence
 Baxter, Lelah Merle²
 Bouffler, Ethel Julia
 Brown, Beatrice Katharine
 Burr, Margaret³ (*cum laude*)
 Burton, Jennie Lind²
 Bush, Florence Wright¹
 Campbell, Mary Veronica
 Cook, Lois Ford
 Craske, Frederick Holdaway
 DeCan, Ina
 Dibble, Alice Rachel
 Dibble, Frances
 Fallis, Irene Crawford²
 Foley, Verona McKinley
 Forrester, Louise
 France, Alda May
 Gwinn, Alice Elizabeth
 Hansome, Marius
 Hardwick, Freda Phyllis
 Hoare, Julia Katharine
 Holbrook, Ray²
 Ingalls, Estelle Margaret³
 Jorgensen, Marguerite
 Kelly, (Mrs.) Ruth Haslett

Kizer, Dorothy²
 Lawless, Grace Theo
 Marchildon, Maria
 Michea, Marie Antoinette³ (*cum laude*)
 Miller, Helen Marie²
 Morris, Josephine Mae
 Ness, Arthur Bernhardsen² (*cum laude*)
 Olsen, Selma
 Parchman, Alice DeSommer
 Parsons, Elvy Tillman²
 Perkins, Gwendolyn Goff
 Pierrot, Marjorie
 Podmore, John Arthur
 Pugh, Louise Katherine
 Reed, Jennie Mabel
 Seton, Imogene Hurlburt
 Shumway, Ruth Katherine
 Skagerlind, Frances Louise
 Speer, Ernest Dewitt
 Spieske, Daisy Marietta
 Steele, Elsie (*cum laude*)
 Troth, Dennis²
 Van Horne, Esther
 Weage, Avery Dudley
 Wong, Hishing¹
 Worthen, Clifton Boyd

COLLEGE OF FINE ARTS
Bachelor of Arts in Music

Gardner, Mirian Neely
 McPhee, Aletha Sophia²

Maltman, Jennie Rebecca
 Mitchell, Ruby (*cum laude*)

Bachelor of Music

Carroll, Geneve North
 Donohue, (Mrs.) Merle Childs
 Freyd, Bertha Irene (*cum laude*)
 Gerry, Lillian Gertrude
 Honey, Katherine

Jertson, Edith Viola
 McGoran, Irene Marion
 Mulkey, Lucile
 Whipps, Carol Louise

Bachelor of Fine Arts

Hiatt, Maurine
 Klocker, Rosetta Pink

Reeves, Marie Adele (*cum laude*)

Certificate in Art

Foss, Mary Loretta

Bachelor of Architecture

French, Phil Eugene

COLLEGE OF ENGINEERING
Bachelor of Science in Chemical Engineering

Bennett, Albert Lee
 Carlander, Clarence Henry²
 Clifton, Clarence Cathcart
 Clulow, John William
 Cline, Felix John
 Crell, Edward, Jr.
 Freeman, Wood
 Garrison, Clarence Wilbur
 Gill, Stanley Harold (*cum laude*)

Goodner, Ernest Francis
 Greenleaf, Sidney Nelson
 Hofman, Henry Lee
 Kronfield, David
 Kronfield, Harry
 Matsumoto, Takao²
 Peterson, Axel Herman
 Semon, Waldo Lonsbury (*cum laude*)

Bachelor of Science in Civil Engineering

Chittenden, Hiram Martin, Jr.
 Dickerman, Elmer
 Douglas, Norval Durham²
 Egtvedt, Clairmont
 Fransen, Walter Clarence
 Goodfellow, James Burwell²

Haase, Herman Henry¹
 Laudan, Fred Phillip¹
 Miller, Alfred Lawrence
 Phipps, Frank William
 Reed, Raymond Francis

Bachelor of Science in Electrical Engineering

Angove, Clarence Virden¹
 Bach, Roy Odell¹
 Catlett, James Theodore²
 Colesworthy, Joseph Bicknell¹
 Cowgill, Lester Blaine²
 DeLong, Abe
 DeSelle, George Wesley
 Haakons, Hugo Raymond
 Havel, Fred
 Hunt, Ozro Harold
 Kallin, Albert² (*cum laude*)

Kleist, Walter Albert¹
 Kraut, Samuel Borovitch¹
 Lloyd, William John²
 Nelles, Roy Hubert¹
 Ryan, Francis Milton² (*cum laude*)
 Singer, Fred John² (*cum laude*)
 Stewart, Clyde Emery
 Tolmie, Jack Roderick¹ (*cum laude*)
 Walker, Glen Hart
 Wexelstein, Leo¹

Bachelor of Science in Mechanical Engineering

Blake, Buel Beecher
 Burke, LeRoy Arthur
 Duniway, Robert Edward
 Evans, Thomas Phillips¹

Laney, David Heren
 Marchion, Elmo
 Sallee, Hubert Bland¹

Bachelor of Science

Bibb, John Taylor, Jr.²
 Faubert, Edward Henry¹
 Hardy, William Agee¹
 Huddloff, Arthur George

Livingstone, Lawrence Fuller²
 McAdams, William Roy²
 Otis, Malcolm Jewell
 Pendergast, Hugh William²

COLLEGE OF MINES
Bachelor of Science in Mining Engineering

Nelson, Eugene Gerald

Bachelor of Science in Geology and Mining

Brown, Walter Franklin

Bachelor of ScienceWilcox, Howard Glen¹**COLLEGE OF FORESTRY****Bachelor of Science in Forestry**

Bevan, Arthur² (*cum laude*)
 Brown, Edward
 Corbitt, Willis Gregg
 Gamm, Irvin William Otto²
 Garrett, Clarence Burnwood²
 Kline, Charles Weldon

Morgan, William Edward
 Oass, Alf
 Powers, Victor²
 Renner, Frederic George
 Sylven, Helge
 Van Wickle, James Morgan

COLLEGE OF PHARMACY**Bachelor of Science**

Farrell, Charles Vincent
 Kath, Henry¹
 Kracower, Bella

Orossa, Maria
 Seils, Anthony Joseph²
 Wilkes, (Miss) Jean Robin

Pharmaceutical Chemist

Clothier, Lyle Bell

Graduate in Pharmacy

Anderson, Edgar¹
 Bagley, Raymond John
 Bell, James Nelson
 Carlander, Oswald
 Clark, Geraldine Delacour²
 Coffman, Charles¹
 Cordero, Rosario
 Edgern, Claude¹
 Edson, Gale
 Farquhar, Elizabeth Helen
 Fleming, Edward Paul
 Greene, Earl¹
 Haas, Selma

Heron, George
 Lewallen, Marjorie Frances
 Lofgren, Frederick Valentin
 McGahn, Ellen Dolores
 Middleton, Eldorn
 Millard, Bertha Newhouster²
 Molin, Morris James
 Roberts, (Mrs.) Mary Elizabeth
 Sears, George Lester²
 Shone, Bessie
 Stalberg, Doris Ethel
 Tiemens, George
 Turnacilffe, Lucile

SCHOOL OF LAW**Bachelor of Laws**

Abel, Donald George¹
 Anderson, Otto Duncan²
 Beardsley, George Orville²
 Benz, Fritz Rudolph²
 Black, Wendell Wilson
 Case, Randall Stacey
 Coffee, John Main
 Dumett, Ray Ephraim
 Dysart, Lloyd Butler²
 Falknor, Judson Fahnestock¹
 Haight, Gilbert Pierce¹
 Horiuchi, George Saraiichi
 Johnson, Esther Victoria

Johnson, Ofell¹
 Langenbach, John Joseph²
 Moriarty, Charles Patridge¹
 Newton, Arthur Moreland²
 Ostrander, Raymond Everett¹
 Preston, Frank Manley
 Ryan, Raymond Francis
 Savage, Lloyd Reuben²
 Stantz, Stanley Wallace
 Swale, Jack Bracy¹
 Tucker, Glyde Lynne
 Zelasko, Josef

LIBRARY SCHOOL**Bachelor of Science in Library Science**

Hazeltime, Lella

Bachelor of Arts

Bergoust, Charlotte
 Fuller, Myrtle Margaret
 Hall, Mary Lee
 Hawkins, Elma
 Hopkins, Doris Fernald
 Lopp, Weyna
 Ludington, Flora Belle

Martin, Leonora Ruth
 Mason, Myrth Lucile
 Platt, Gladys Hope
 Remsberg, Helen
 Richards, Dorothy Ward
 Welty, Consuelo

COLLEGE OF BUSINESS ADMINISTRATION**Bachelor of Business Administration**

Armstrong, Spencer
 Arthun, Amber Bertha
 Bailey, Margaret Edna
 Beauchamp, Owen William²

Bigelow, Ernest Carleton
 Blumenfeld, Herman Naphtoll
 Burlingham, Frank Wilfred
 Cuddy, George Asbury

Dahl, Aad Joel
 Gardner, Ray
 Hansen, Helen Marguerite
 Hartman, Robert Nathaniel²
 Harvitz, Barnett²
 Hopping, William Daniel²
 Keyes, Arthur Clarence
 MacLean, Elizabeth (*cum laude*)
 Mahony, Mary Agnes
 Parker, William Arthur²
 Pressentin, Marie Olga

Ratcliffe, Kent
 Sangster, Reid George³
 Smith, Ralph Ryan²
 Sutthoff, Helen Katherine
 Sutthoff, John Russell
 Taylor, Roy Franklin²
 Theisen, Arthur Leonard³
 Thompson, Richard Aldwin⁴
 White, Frank Isaman
 Williams, Ross Perry
 Winter, Charlotte Lucile

SCHOOL OF JOURNALISM

Bachelor of Arts

Bath, Gerald Horton
 Bevis, Dorothy True
 Cardwell, Frances
 Foley, Kathryn
 Dobbs, Thomas Erwin¹
 Haas, Mark Leo
 Hughes, Mary Monica¹

Leghorn, Frances Marie¹
 Landsay, Francis Steele (*cum laude*)
 Lundy, Iris Rachel
 Reynolds, Rox
 Rogers, Florence Alleen
 Rosenthal, Roy Gilbert¹
 Weston, Alvah Towle

GRADUATE DEGREES

Chemical Engineer

Addison Gardinar Bissell

B. S. in Ch. E., University of Washington, 1915

Thesis: The Application of Electric Arc Welding to Steel Ship Construction

Electrical Engineer

Henry Godfrey Cordes¹

B. S. in E. E., University of Washington, 1906

Thesis: Theory of Linear-Sinoidal Oscillations

Master of Arts

Eugene Christian Baltzer² (German)

Eden Theological Seminary, 1913

Thesis: Gewisse Grundzuge der Religion Gottfried Kellers

David Barber² (Education)

A. B., University of Washington, 1917

Thesis: The School System of British Columbia

Anna Marie Brueggerhoff² (Economics)

A. B., University of Washington, 1918

Thesis: Recent Changes in the Trade of the Pacific with Reference to the Port of Seattle

Iva Luella Buchanan (Ancient History)

A. B., University of Wisconsin, 1907

Thesis: Municipal Administration and Government in Rome and Italy

Louise Downer Eager² (English)

A. B., University of Louisville, 1914

Thesis, A Comparison of the Nietzschean Philosophy and the Philosophy of the Prose Dramas of Ibsen

Herbert Clay Fish (History)

B. L., University of Wisconsin, 1903

Thesis: The Early Development of the Northern Route from the Dakota Land to the Pacific

Gaylard Greene² (Education)

A. B., University of Washington, 1916

Thesis: A Comparison of Grades in the Seattle High Schools made by Graduates of Industrial and Regular Schools

Mamine Ishii (English)

A. B., Waseda University, 1916

Thesis: Rabindranath Tagore

Tenney Algott Lind² (Education)

A. B., University of Washington, 1912

Thesis: Report of an Educational Survey of School District Number Forty-nine ((Bellevue) King County, Washington

UNIVERSITY OF WASHINGTON

Mary Elizabeth McKee (English)

A. B., University of Washington, 1917

Thesis: The Political and Social Philosophy of Samuel Butler

Isogaya Melzen² (English)

A. B., Doshisha University, 1916

Thesis: Naturalism and Mr. Thomas Hardy

Sarah Patience Sutton² (French)

A. B., University of Washington, 1911

Thesis: The Sources of Rotrou's Antigone

Dennis Troth (Education)

B. Ed., University of Washington, 1919

Thesis: The Development of American Educational Policies in the Philippine Islands

Herman Porter Williams³ (Philosophy)

A. B., University of Iowa, 1895

Thesis: The Doctrines of Mani and Their Significance in the History of Religion

Shichiro Yuge (Political Science)

A. B., Meiji University, 1916

Thesis: Labor and the League of Nations

Master of Arts in Education

Edgar Adolphus Stanton²

A. B., University of Washington, 1911

Thesis: Not Required

Master of Science

Osman Horace Cady² (Chemistry)

B. S., University of Washington, 1915

Thesis: Influence of Gelatine upon the Transference Number and Conductivity of Copper Sulphate Solutions

Theodore Edward Dunlap² (Chemistry)

B. S., University of Puget Sound, 1918

Preparation of Perchlorates

Max Freyd (Psychology)

A. B., University of Washington, 1918

Thesis: Tests for Journalistic Aptitude

Grace Alma Hill (Bacteriology)

A. B., University of Washington, 1913

Thesis: The Bacteriology of Candy

Grace Elizabeth Howard (Botany)

A. B., University of Washington, 1911

Thesis: Extraction and Separation of the Pigments of Nereocystis Luetkeana

Wilbert Sherwood Slemmons² (Bacteriology)

B. S., University of Washington, 1917

Thesis: A study of Intestinal Bacteria and their Proteic Metabolism

Catharine Wright Smith (Botany)

B. S., University of Washington, 1919

Thesis: Variation in the Number of Ribs in Costaria Costata

Lillian Wood (Chemistry)

B. S., University of Washington, 1919

Thesis: The Hydrolysis of the Phosphates of Calcium

Master of Science in Forestry

Thomas Dearborn Burleigh

B. S., Pennsylvania State College, 1919

Thesis: Economic Value of Bird Life to the Forests

Frederick Malcom Knapp

B. S., New York State School of Forestry, 1919

Thesis: Logging by Motor Truck

Oscar Helge Sylven

B. S. in Forestry, University of Washington, 1920

Thesis: Compilation of our Knowledge of the Douglas Fir

Doctor of Philosophy

Floyd Whitney Gail (Botany)
A. B., University of Nebraska, 1911

Thesis: Hydrogen Ion Concentration and Other Factors Affecting the
Distribution of Fucus

Curtis Willard Thing (Chemistry)
A. B., Lenox College, 1914
M. S., University of Washington, 1917
Thesis: Passivity of Cobalt

NORMAL DIPLOMAS**University Life Diplomas**

Abel, Lena Blanche
Alberts, Florence
Allen, Mabel Derry²
Anderson, Isabelle May²
Armstrong, Ruth
Arntzen, Edward Jargo
Barlow, Hertilla
Baxter, Lelah Merle¹
Bjorklund, Ellen Margaret
Bollman, Dean Stanley
Brown, Beatrice Katharine
Bruce, Helen Roslyn
Burgess, Henrietta
Burns, Fern Elizabeth
Burnside, Mary Frances
Bush, Florence Wright¹
Campbell, Mary Veronica
Christensen, Agnes Brigitta²
Cochran, Velma
Cook, Lois Ford
Council, Elizabeth
Countryman, Eva
Craib, Margaret Cumming²
Cunningham, Theresa
Dammann, Marjorie Luse
Dibble, Alice Rachel
Dibble, Frances
Dillon, Margaret Winans²
Driscoll, Marie²
Ertle, Una Beatrice²
Fallis, Irene Crawford²
Faubert, Alice²
Ferguson, Frances Patricia
Finley, Sylvia Elfreda²
Foley, Venora McKinley
Forrester, Louise
Gardner, Jessie
Gardner, Miriam Neely
Gleason, Dorothy²
Greiner, Ruth Helen
Guenther, Chrystel
Gwinn, Alice Elizabeth
Hallin, Ruth Marjorie
Hamm, Verda Gladys
Hammarberg, Agnes Elizabeth
Hardwick, Freda Phyllis
Harshman, Gertrude²
Hayner, Mariam Marjorie
Hayner, Norman Sylvester
Henderson, Ruby Jean
Hoare, Julia Katharine
Honey, Katherine
Jorgensen, Marguerite
Kelly, (Mrs.) Ruth Haslett
Lawless, Grace Theo
Legg, Lois Cornelia²

Lewis, Anna
Lonke, Lillian Jensine²
Ludwigs, Flora Emma
McCausland, Elizabeth
McConihe, Aimee Katherine²
Marchildon, Maria
Merchant, Jessie
Michea, Marie Antoinette²
Miller, Helen Marie²
Minnis, Marjorie Elizabeth²
Mitchell, Ruby
Moore, Felix Enoch²
Morris, Josephine Mae
Munger, Ruth Williard
Myer, Thelma Anna Cecillia
Ness, Nels Arthur Bernhardsen²
Norwood, Annie
Olsen, Selma
Parchman, Alice DeSommer
Perkins, Gwendolyn Goff
Phelps, Vera May²
Pickrell, Evelyn Ann
Pierrot, Marjorie
Pitt, Mildred Esther²
Powlson, Lucile Alice
Presley, Dorothea
Rader, Grace McDonald²
Reeves, Marie Adele
Rice, Edith Allegra
Rohden, Elizabeth Helen²
Sanden, Arthur Gustav Andrew
Scott, Burton Foote²
Seton, Imogene Hurlburt
Shumway, Ruth Katherine
Simpson, Lurline Violet
Skagerlind, Frances Louise
Slauson, Ruth Irvine
Spleske, Daisy Marietta
Steele, Elsie
Stephenson, Marian Lucille
Stewart, Isabel Clarissa
Taylor, Grace Gladys
Todd, Marcelle Ruth
Turner, Laura Anna
Van Horne, Esther
Watson, Ruth Elizabeth
Watt, Mabel
Weage, Avery Dudley
Weaver, Grace Elizabeth²
Whipps, Carol Louise
Williamson, Mary Agnes
Wilson, Doris Glasgow
Wolff, Katherine Christina
Worthen, Clifton Boyd
Young, Ruth Evelyn
Zickler, Irma Pauline²

University Life Diplomas

Bailey, Caroline
Best, Elva
Bouffleur, Ethel Julia
Brown, Earl Theodore

Burr, Margaret²
Burton, Jennie Lind²
Campbell, Mary²
Carlin, Agnes Adele

Carpenter, Beatrice Hale
 Coe, Curtis Pearce²
 Collins, Claude Chester²
 Cornell, Gladys
 Cremer, Henry
 Culver, Evelyn Louise
 Davis, Martha Jane
 Devin, Mary Elmah
 Eckhart, Freda Louisa
 Engler, Dora Dean²
 Eriksen, Geneva Antoinette
 Everton, Clara
 Fay, Helen Frances
 Floyd, Ruth Marion
 Georgeson, Dagmar
 Gibson, Grant McDonald²
 Gleason, Ruth
 Glover, Oscar Kern²
 Grove, Maude Tarleton²
 Gulstine, Edna Mabel¹
 Hanson, Helen Rosanna
 Hemenway, Ruth Evelyn
 Hevly, Martin Bernard
 Holbrook, Ray²
 Hopkins, Olive Fay²
 Hopcock, Gertrude Corneila
 Ingalls, Estelle Margaret²
 Jacobson, Julia Anna
 Jensen, Arne Sigurd²
 Jolliffe, Ellen Mary
 Jones, Margaret Cornwell
 Jones, Zola Martha²
 Jordan, (Mrs.) Ruth Ratcliffe
 Kane, Susan Mary²
 Kaufman, Edith Rachel
 Kizer, Dorothy²
 Kraus, Ethel Margaret
 Lovely, Josephine Monica²
 McAllaster, Marlon
 McCabe, Lucile Marguerite
 McKee, Mary Elizabeth²
 McLean, Victoria²

Majors, Irene
 Matthews, William Peters²
 Matzen, (Mrs.) Marjorie²
 Merriman, Eugene Duette
 Miller, Alice
 Morehead, Elizabeth
 Morgan, Mona Margaret²
 Mykland, Albert
 Newton, Cornelia Elizabeth
 Nigh, Alice²
 Parr, Marie Flowers
 Parsons, Elvy Tillman²
 Patten, Anna Marie²
 Phelps, Vera May
 Philbrook, Madge Hiller
 Platt, Annie C.
 Platt, Lucella Bash
 Price, Frances Mary²
 Pritchard, Grace Montana
 Pugh, Louise Katherine
 Rambeau, Florence Maude¹
 Reed, Jennie Mabel
 Rehmke, Antonia²
 Rice, (Mrs.) Ruth Henry
 Roberts, Mary Christina¹
 Robinson, Maude Isabel
 Schumaker, Elizabeth²
 Seibert, Marjorie²
 Shannon, James Francis
 Silverstone, Libbie²
 Steendahl, Anna Serine
 Tewinkel, Ruth Merl
 Tift, Lillian Bryce
 Troth, Dennis²
 Vinsonhaler, Sara Rea²
 Wainwright, Mary Tripler
 Werby, Mamie Mathilda
 White, Gladys Lauthers
 Wlester, Grace Margaret
 Wintler, Ella²
 Young, James Arthur
 Young, Wesley George²

DEGREES CONFERRED AUGUST 30, 1920

BACHELOR DEGREES COLLEGE OF LIBERAL ARTS

Bachelor of Arts

Alberts, Hazel Estella
 Bell, Bonnie
 Bemis, Catherine
 Bothwell, Belle
 Collins, Kenneth Roger
 Cooper, Isabel Donkin
 Cope, Harvey Franklin
 Crain, Leota
 Ellis, James Land
 Ewing, Richard Howe
 Ford, Clara Louise
 Gule, Helster Dean
 Henthorne, Oril Elsie

Hone, Marie Curran
 Kershaw, William Earnest
 Klemle, Katherine
 Kilgore, Owen
 Kyd, Margaret Stewart
 Marquette, Elizabeth
 Rosling, Edward Lincoln
 Shepherd, (Mrs.) Esther Maria
 Smith, Virgil
 Stahlhut, Verna
 Stevens, Anna Leach
 Tucker, Josephine Olive
 Webster, Jessie Elizabeth

COLLEGE OF SCIENCE

Bachelor of Science

Claypool, John Cowles
 Holbrook, William Paul
 Jones, Effie Dora
 Scougal, Laura

Starr, Elizabeth Anita
 Stearns, Josephine
 Watrous, Genie Ida
 Williams, Lowell Eugene

Bachelor of Science in Home Economics

Cutter, Susan Ethel

COLLEGE OF EDUCATION

Bachelor of Education

Allen, Mildred Alice
 Anderson, Frances Bertine

Austin, George Ray
 Bursell, Blanche Gertrude

DEGREES

325

Carlson, Joseph Emanuel
Carr, Nell
Coleman, John Edward
Ettinger, Dorothy
Ganders, Harry Stanley
Gwyn, Leanna
Hall, Amy Violet

Hammer, Louise Blau
Hubbard, Anderson
Larsen, Laura Melana
Lemon, John Francis
Naugle, Fern Elizabeth
Whitman, Glnera

COLLEGE OF FINE ARTS Bachelor of Arts in Music

Chappelle, Gladys Jaunita

Craver, Eugenia Marcia

COLLEGE OF ENGINEERING Bachelor of Science in Chemical Engineering

Carr, Howard Maynard

Bachelor of Science in Electrical Engineering

Von Norman, Alfred George

COLLEGE OF MINES Bachelor of Science in Mining Engineering

Nelson, George Earl

COLLEGE OF PHARMACY Graduate in Pharmacy

Warsball, Adolph

COLLEGE OF BUSINESS ADMINISTRATION Bachelor of Business Administration

Baldwin, David Edward
Calvert, Lawrence Craigin
Elright, Eloise
Gardiner, Inez
Howe, Eva
Johnson, William Emanuel
Kalbus, Helen

Kelly, Raphael Lester
McGirr, Horace Donald
Nord, Swan Emanuel
Smith, Albert Earl
Smith, John Alliaude
Tremper, Edward Payson, Jr.

SCHOOL OF LAW Bachelor of Laws

Bar, William Lawrence
Brown, Vaughn
Dow, Neal Ellis
Lind, Fred Ainard

Matson, Joseph
Miller, Sylvia Alice
Robbins, Morris Allen
Toomey, Floyd Francis

LIBRARY SCHOOL Bachelor of Arts

Pettit, Mabel Florence

GRADUATE DEGREES

Master of Arts

Charles Henry Deane (History)
A. B., LL. B., University of Washington, 1912
Thesis: The Boxer Uprising in China

George Meade McKee² (Education)
A. B., University of Washington, 1919
Thesis: A Survey of the Cle Elum Schools

George Watson MacKinnon² (Education)
A. B., Queen's University
Thesis: The Development of the School System of British Columbia

Ray Kelzaburo Otaka² (English)
B. Ed., University of Washington, 1919
Thesis: The Drama as Wish Fulfillment

Master of Science

Madge Watson Wilkinson² (Psychology)
 A. B., University of Washington, 1919
 Thesis: A Method of Determining Mental Age

NORMAL DIPLOMAS**University Life Diploma**

Alberts, Hazel Estella
 Anderson, Frances Bertine
 Bell, Bonnie
 Bothwell, Belle
 Bursell, Blanch Gertrude
 Byers, Kathryn Ada
 Coleman, John Edward
 Cooper, Isabel Donkin
 Dillon, Margaret Winans
 Ettinger, Dorothy
 Floyd, Lona Mildred
 Franklin, Alice Virginia
 Hammar, Louise Blau
 Hone, Marie Curran
 Hubbard, C. Andresen
 Kyd, Margaret Stewart

Larsen, Laura Melana
 Lemon, John Francis
 Maclean, Maude
 Naugle, Fern Elizabeth
 Oertel, Ernest Edward
 Phillips, Herbert Joseph
 Phillips, Ruth Naomi
 Reuter, Alescia Magdelline
 Rice, Margaret Dorothea
 Roberts, Margaret
 Ruppenthal, Anna Barbara
 Stevens, Anna Leach
 Watson, Jean Ferguson
 Whitman, Gintera
 Whitney, Frank Fleming

University Normal Diploma

Alben, Nellie
 Allen, Mildred Alice
 Allison, (Mrs.) Ada Fonda
 Austin, George Ray
 Bachmann, Amelia Helen
 Brown, Leland Pennock
 Carlson, Joseph Emanuel
 Carney, William Harvey
 Carr, Nell
 Cole, Eva Marsden
 Costello, Mary Cecilia
 Crosno, May Frances
 Crosno, Olive Viola
 Driftmier, Rosett² Margaret
 Ewing, Richard Howe
 Gwynn, Leanna

Hall, Amy Violet
 Johnson, Martha Ragna
 Kilgore, Owen
 Lawrence, Edna May
 Magillicuddy, Martha
 Marquette, Elizabeth
 Minnis, Marjorie Elizabeth
 Mitchell, Neva Isabel
 Mossford, Frances Ada
 Mykland, Albert
 Pryde, Joel Joseph
 Shepherd, (Mrs.) Esther Maria
 Sparks, Percy Spencer
 Speer, Ernest DeWitt
 Thickens, Jane Gray
 Wood, Ruth Amelia

HONORS AND PRIZES

June 21, 1920

Fellowships Awarded

The Loretta Denny Fellowships
Doris Glasgow Wilson (History)
A. B., University of Washington, 1920
Esther Marie Shepard (English)
A. B., University of Washington, 1920

Fellowships in the College of Mines and
the Northwest Station United States Bureau of Mines

Arvid Anderson (Metallurgy)
B. S., University of Utah
James Bonner (Metallurgy)
B. S., University of Utah
Ernest Francis Goodner (Ceramics)
B. S., University of Washington, 1920

The Columbia University Fellowship in Mining Engineering and Chemistry
Stanley Harold Gill

The Mars Fellowship
Not Awarded 1920

Prizes and Scholarships Awarded

The Tau Kappa Alpha Debating Prize of \$75.00
Earl Nelson Floyd Toomey

The Philo Sherman Bennett Essay Prize of \$25.00
Not Awarded 1920

The E. F. Blaine Oratorical Prize of \$100.00
Kenneth Carey Cole

The Judge Kenneth Mackintosh Debating Prize of \$75.00
Kai Jensen Kenneth Collins

The N. Paoiella Gold Medal for Excellence in Italian
Gladys Lucille Smith

The Isabella Austin Memorial Scholarship for a Freshman Woman
Elizabeth Grislum

The Edwin A. Jaggard Law Essay Prize of \$50.00
Not yet awarded

Men's Freshman Latin Prize of \$50.00
Francis Fountain Powers

Sophomore Latin Prize of \$25.00
Not Awarded 1920

The University State Bank Prize of \$100.00
Shadrith Franklin William Randall Crawford

The Judge Thomas Burke Prize of \$25.00 for Excellence in French
Josephine Mary Waldo

The Judge Thomas Burke Prize of \$15.00 for Excellence in French
Ruth Holland

The Du Pont Scholarship of \$350.00
Not yet awarded

Junior Military Prize
Roy Paris Turner

UNIVERSITY OF WASHINGTON

The Samuel Rosenberg Scholarship of \$200.00 in French
Dorothy Helen Chesley

The Frank Buty Prize in Italian
Newton Drew

The Kellogg Prizes of \$35.00 in Architecture
Marshall Gill Doris Seibert
Elizabeth Ayer

The Gamma Phi Beta Scholarship of \$100.00
Zenith Watkins Jones

The Sigma Delta Chi Prize of \$100.00 in Journalism
Mitchell Vaughn Charnley

The Washington Alumnae Scholarship of \$100.00
Vivian Moore Robe

The Vimy Ridge Chapter of the Daughters of The British Empire Prize of \$100.00
William Chapin Collins

The following prizes, for essays dealing with China are not awarded for 1919-1920

Two prizes of \$25.00 each, offered by
Dr. Kohang Yik, Consul General, Vancouver, B. C.
Two prizes of \$25.00 each, offered by M. T. Hsieh
The Thomas Burks China Club Prize of \$25.00
The A. B. C. China Club Prize of \$25.00

Senior Scholars—Class of 1920

Bell, John Karl
Brown, Ford Keeler
Coffin, Margaret
Lindsay, Francis Steele
Pepper, Echo
Rind, Rudla
Semon, Waldo Lonsbury
Slauson, Ruth Irvine
Steele, Elsie
Whitehead, Virgil
Winter, Katherine

History
English
Sociology
English
Mathematics
Chemistry
Chemistry
History
Romanic Languages
Greek
Philosophy

REGISTER OF STUDENTS—1920-1921

Aalto, Hmi A., UD, ME....Douglas, Alaska
 Abbott, Bernice E., LD, LA.....Seattle
 Abbott, Tress, Unc, LA.....Kelso
 Abel, Carl William, LD, Ch E.....Seattle
 Abel, Mrs. Dora Edwards, LD, FA.....Seattle
 Abel, Robert Bryan, 1st Law....Montesano
 Abel, William Denzil, LD, For....Montesano
 Abelarde, Jose F., Sp, Sci.....Philippines
 Abell, Charles E., LD, Bus.....Seattle
 Abelsset, Mark, 3d Law.....Seattle
 Abrahamson, Hulda, Grad., Lib....Seattle
 Ackerman, Ruth, LD, Bus.....Seattle
 Acklen, Joseph Warren, LD, LA.....Alaska
 Ackley, Helen Marie, LD, LA.....Seattle
 Adair, Johnson Emma, LD, LA.....Seattle
 Adams, Anna Cate, LD, Bus.....Seattle
 Adams, Arlene Marie, LD, FA.....Seattle
 Adams, Carlton Fitch, LD, EE.....Seattle
 Adams, Charles White, LD, Bus....Spokane
 Adams, Drury Kenneth, LD, ME.....Seattle
 Adams, Eugene C., Sp, Bus.....Hunter, N. D.
 Adams, George B., Unc, Bus.....Iowa
 Adams, Hugh Jr., LD, Bus.....Tacoma
 Adams, Irwin Scott, LD, EE.....Milwaukie, Ore
 Adams, James Hall, LD, EE.....Touchet
 Adams, John Chilton, UD, Sci., Portland, Ore
 Adams, Robert Rowe, LD, Bus., Portland, Ore
 Adams, Vivian Irene, Unc, FA.....Seattle
 Adamson, John Q, UD, Bus....Sherman, Tex
 Adamson, Louise, LD, Phar.....Bellair, Mich
 Adamson, Merritt, LD, Ed.....Seattle
 Addy, Helen Frances, LD, Bus.....Seattle
 Adelson, Abraham Michael, UD, EE.....Seattle
 Aells, Margaret Kathryn, UD, Bus. Dayton
 Afroilan, Adriano, LD, ME.....Philippines
 Agcaoil, Andres G., Unc, Ed.....Philippines
 Agen, John Stuart, LD, Bus.....Seattle
 Agonias, Eusebio, Sp, Min.....Philippines
 Agulla, Jose, LD, Bus.....Philippines
 Aguineldo, Pedro D., LD, CE.....Philippines
 Ahnquist, Martha Edith, UD, Ed....Tacoma
 Ahrens, Russel F., LD, Bus.....Athena, Ore
 Ainsworth, Ruth, UD, Jour.....Newport
 Aitchison, Eredyn V., LD, LA.....Berkley
 Aitken, Florence R, UD, LA.....Bozeman, Mt
 Aitken, Victor, UD, Bus.....Bellingham
 Ajax, Ivor L., Sp, Bus.....Wenatchee
 Ake, Cora T., LD, LA.....Mountain Home, Ida
 Akimoto, Hanziro, LD, LA.....Pt Blakely
 Akin, Margaret Agnes, Unc, FA.....Elroy, Wis
 Alambra, Rufo Z., LD, Bus.....Philippines
 Alba, Felizberto O., LD, Sci.....Philippines
 Albaladejo, Elviro, Grad, Ed.....Philippines
 Albee, Archie Veryl, UD, LA.....Seattle
 Albert, Norman, Sp, EE.....Snohomish
 Albough, Dorothy G., LD, LA.....Or.
 Albrecht, George W., Sp, Min.....Alaska
 Alcid, Manuel, LD, Bus.....Philippines
 Alder, Martha, Sp, Sci.....Ellensburg
 Aldrich, Eric Newton, UD, Bus. Walla Walla
 Aldrich, Roy, UD, EE.....Tacoma
 Aldwell, Norah Ellen, UD, Bus. Pt Angeles
 Alegrado, Venancio, LD, MIN.....Philippines
 Alfonso, Mrs. Marie, Grad., Lib....Seattle
 Algeo, Thomas Herbert, UD, ME.....Tacoma
 Alinder, Elsie Kathryn, LD, Sci.....Seattle
 Allan, Helen Quinton, LD, LA.....Seattle
 Allemann, John F., LD, FA.....Seattle
 Allen, Albert Alexander, LD, Bus.....Seattle
 Allen, Arnold Southwick, UD, Bus. Seattle
 Allen, Baltis Jr., Sp, Bus....Portland, Ore
 Allen, Blanche Lucille, LD, Phar.....Seattle
 Allen, David Clyde, LD, ME.....Tahola
 Allen, Doris Martha, UD, Jour.....Duvall
 Allen, Charles Edward, UD, EE.....Seattle
 Allen, Elmer Nelson, LD, ME.....Seattle
 Allen, Erdman Jerome, LD, ChE.....Seattle
 Allen, Frederick Robert, LD, For.....Tacoma
 Allen, Glenna Alicia, UD, Sci.....Seattle
 Allen, Gordon Craig, Unc, For, Vanc'ver, BC
 Allen, Herbert Wilmoth, Jr, UD, Bus, Spokane
 Allen, Mabel Mary LD, Sci.....Yakima
 Allen, Howard Marshall, UD, Sci.....Seattle
 Allen, Ruth Frances, LD, FA.....Toppenish
 Allen, Thomas James Jr, LD, For.....Seattle
 Allen, Thomas S, Unc, Bus.....Seattle
 Allen, Vera, LD, LA.....Seattle
 Allen, Virginia, LD, Phar.....Seattle
 Allen, Harry Warren, LD, Bus.....Seattle
 Allison, Thomas Lyle, UD, Bus. Bremerton
 Allper, Morris, UD, ME.....Russia
 Alport, Ruth Jessie, UD, ED.....Buffalo, NY
 Alsop, Norma Beatrice, LD LA.....Bellingham
 Alvey, Mary LD, FA.....Seattle
 Alvord, Mary Hamilton, Unc, Law. Chehalis
 Amalleff, Sergius, LD, ME.....Seattle
 Ames, Anna, Sp, FA.....Seattle
 Ames, Annis Nancy, LD, FA.....Seattle
 Amesbury, Helen Jean, LD, Bus, Portland, Or
 Amiot, Maurice, LD, LA.....Spokane
 Ammos, Felipe Rodolfo, LD, For, Philippines
 Amundsen, Roy Edmund, LD, Bus.....Seattle
 Anderberg, Marvin Olket, LD, ME.....Spokane
 Anderson, Arthur Joel, UD, Bus.....Seattle
 Andersen, Detmer Amphion, LD, Min, Seattle
 Andersgard, Helen, Grad.....Comstock, Minn
 Anderson, Adolph, LD, EE.....Seattle
 Anderson, John Algot, LD, EE.....Seattle
 Anderson, Andrew Wallace, UD, Fish, Seattle
 Anderson, Arthur A, LD, LA.....Mitchell, S D
 Anderson, Arvid E, Grad, Min, Salt Lake, U'h
 Anderson, Carl A, LD, Min.....Seattle
 Anderson, David G, UD, EE Vancouver, BC
 Anderson, Earl W, LD, Bus.....Kennewick
 Anderson, Edgar, Sp Law.....Seattle
 Anderson, Elmer, LD, Bus.....Issaquah
 Anderson, E A, UD, Min, Fairbanks, Alaska
 Anderson, Evelyn C, LD, LA.....Seattle
 Anderson, Evelyn Martha, UD, Sci.....Seattle
 Anderson, George A, LD, Bus. Portland, Or
 Anderson, George D, LD, Bus.....Everett
 Anderson, Helen D, UD, LA.....Mabana
 Anderson, Helen E, LD, LA.....Coronado, Cal
 Anderson, Helen Josephine, LD, FA Auburn
 Anderson, Hope, LD, FA.....Seattle
 Anderson, Joe W, Unc, Bus.....Kennewick
 Anderson, Adolph John, LD, Bus.....Seattle
 Anderson, Juanita Baldwin, Unc, LA, Seattle
 Anderson, Mrs. Lou E UD, Sci.....Seattle
 Anderson, Mabel Felton, LD, LA.....Seattle
 Anderson, Margaret Gena, UD, Bus. Tacoma
 Anderson, Mary, UD, LA.....Seattle
 Anderson, Melvin G, LD, Fish.....Seattle
 Anderson, Myrtle, UD, Bus, Anaconda, Mont
 Anderson, Niles Milton, Uncias, For Mabana
 Anderson, Norman Bernard, LD, Sci Seattle
 Anderson, Olga, UD, FA.....Moscow, Ida
 Anderson, Reinhold, August UD, Sci, Seattle
 Anderson, Robert Freeman, UD, Bus, Spokane
 Anderson, Ray Horace, UD, Bus Mt Vernon
 Anderson, Robert S, UD, Sci.....Mt. Vernon
 Anderson, Stanley J, LD, Bus.....Tacoma
 Anderson, Sylvester, LD, EE.....Everett
 Anderson, Vida Runghilde, UD, LA.....Everett
 Anderson, Virgil L, UD, Bus.....Tacoma
 Anderson, W J, LD, Bus. Coeur d'Alene, Ida
 Anderson, William LD, LA.....Seattle
 Andrews, Emery E, UD, LA.....Modesto, Cal

- Andrews, La Mar Bert Uncl, Bus..Spokane
 Andrews, S S, UD, For..Walsenburg, Colo
 Andrew, H. Stay, SC, Min.....Seattle
 Angle, Herbert G, LD, Bus.....Shelton
 Angst, Ernest Clement, LD, Sci.....Chebais
 Annis, Verle Lincoln, LD, FA.....Alderton
 Antis, Irvin Albert, LD, FA.....Seattle
 Apple, Alberta Dickey, UD, ED..Ellensburg
 Applebaum, Gilbert H, LD, Bus...Spokane
 Appelgate, Kenneth W, LD, Sci...Everett
 Applegate, Lindsay M, UD, EE...Harrington
 Aquino, Juan, Unc, Bus.....Philippines
 Arai, Clarence Takeya, LD, LA.....Seattle
 Arai, Kichio Allen, LD, FA.....Seattle
 Arbogast, Ray, Sp, Bus.....Or
 Arbutnot, Isabelle, LD, Sci.....Colo
 Archer, Gerald S, LD, Bus..San Jose, Cal
 Archer, Glenwood Edward, LD, LA..Seattle
 Archer, Helen R, UD, FA.....Seattle
 Archer, Raymond B, LD, LA.....Seattle
 Archey, Howard D, LD, Bus..Thornton, Ind.
 Argens, Oscar Richard, LD, Bus...Seattle
 Arkley, Helen Lothian, UD, Phar..Tacoma
 Armitage, Harry, LD, Bus.....Yakima
 Armitage, Inez G, Sp, Sci.....Seattle
 Armstrong, Margaret Mary LD, Bus..Seattle
 Armstrong, Eileen Mildred, LD, LA..Seattle
 Arneson, Elias, UD, LA.....Seattle
 Arnold, Dlima R, LD, Bus.....Seattle
 Arnold, Edward C, LD, Bus.....Seattle
 Arnold, Frederick Grey, LD, EE..Seattle
 Arnold, Ruth L, UD, FA.....Naches
 Arntzen, Edward J, Grad, Ed.....Parkland
 Aronin, Morse Samuel, LD, LA.....Seattle
 Arzaga, Flaviano, LD, ME.....Philippines
 Arznor, Clarence Philip, Sp, FA.....Seattle
 Ashenfelter, Mabel Ann, UD, Sci..Seattle
 Ashton, Emmett Raymond, LD, EE..Seattle
 Asmussen, August J, LD, Min..Settler, B C
 Asp, Florence E, LD, Bus.....Seattle
 Astel, George Bernard, Sp, Jour..Stanwood
 Asuncion, Felipe, LD, ME.....Philippines
 Atkinson, Evelyn Ann, UD, LA.....Seattle
 Atkinson, Helen Dorothy, LD, LA..Tacoma
 Atterbery, Edgar Raymond, UD, LA..Everett
 Augerson, Harold Wilbur, UD, CE..Seattle
 Auld, Willis R, LD, Bus.....Granger
 Austin, George Ray, Grad.....Seattle
 Austin, Russell A, LD, Bus.....Aberdeen
 Austin, Villairs Thomas, LD, Sci...Pasco
 Avey, Ralph Dallas, LD, ChE.....Kent
 Axman, Bertram, LD, EE.....Seattle
 Axman, Ernest UD, EE.....Seattle
 Ayer, Elizabeth, UD, FA.....Seattle
 Ayer, George Earl, Unc, FA.....Seattle
 Ayers, Dorothy Adelaide, LD, LA..Kirkland
 Ayers, Leland S, Sp, LA..San Francisco, Cal
 Ayres, Katherine Mary UD, Sci.....Seattle

 Babcock, Mary Elizabeth, LD, Sci...Seattle
 Bach, Frank Angus, LD, LA..Douglas, Alaska
 Bachelor, Robert, UD, Bus.....Oakville
 Bachman, Amelia H., Grad.....Seattle
 Backer, James, LD, EE.....Seattle
 Backus, Kitty Clyde, LD, LA.....Seattle
 Bade, Dorothy Anne, LD, FA..Portland, Ore
 Baes, Florence Amalia, UD, Bus...Seattle
 Bahl, Albert Joseph, LD, Bus.....Seattle
 Bailey, Arthur Edwin, LD, Bus.....Seattle
 Bailey, Dorothy Alice, LD, Sci..Walla Walla
 Bailey, Dorothy B, LD, Sci..Los Angeles, Cal
 Bailey, Dorothy Florence, LD, Bus..Seattle
 Bailey, Elsworth Barr, Sp, EE.....Tacoma
 Bailey, Harriette R, LD, LA.....Seattle
 Bailey, Harrison, LD, LA.....Seattle
 Bailey, James Milton, 1st Law.....Seattle
 Bailey, Lucile Vivian, LD, LA.....Seattle
 Bailey, Merle P., Sp, EE.....Gooding, Idaho
 Bailey, Louisa Ruth, Unc, FA.....Seattle

 Bailey, Thelma, LD, LA.....Seattle
 Bailey, Theodora Abbott, LD, Sci...Seattle
 Bailey, William Locke, 1st Law.....Seattle
 Bailie, Provis Mary, Unc, LA.....Seattle
 Bailie, Robert Trezona, Unc, Bus...Seattle
 Bain, Harry, LD, Bus.....Milan
 Bain, Margaret Dorman, Unc, Bus...Seattle
 Baird, Alexander K., LD, Bus...Snohomish
 Baird, Elizabeth, UD, LA.....Seattle
 Baird, Lloyd Tallmadge, LD, Bus...Seattle
 Bakeman, Charles T, UD, EE...Snohomish
 Bakeman, Frances L, LD, Ed...Snohomish
 Baker, Albert L., UD, EE.....Yakima
 Baker, Carl Oscar, UD, Bus.....Garfield
 Baker, Cecil C, Grad, LA.....Ellensburg
 Baker, Charity Foxwell, LD, Bus...Seattle
 Baker, Dorothy Ada, LD, LA.....Seattle
 Baker, Edward, Unc, For.....Redmond
 Baker, Ella Louise, LD, Sci..Whitefish, Mont
 Baker, Mrs Ella Meagher, Grad.....Seattle
 Baker, Glenn, LD, Phar.....Centralia
 Baker, Jane Ayres, LD, LA.....Yakima
 Baker, Lillian W., LD, LA.....Seattle
 Baker, Ruth Evangeline, LD, Sci...Tacoma
 Baker, Ruthella, LD, LA.....Seattle
 Baker, Samuel G, Unc, ChE.....Seattle
 Baker, Warren B., LD, ME.....Seattle
 Bakke, F. William, LD, Bus.....Spokane
 Baldacchino, Massimo, LD, Sci...Seattle
 Baldacchino, M Samuele, Unc, Sci...Seattle
 Baldwin, Clarence Henry, LD, Bus...Elma
 Baldwin, Edward Starr, LD, ME...Yakima
 Ball, Philip K, Sp, Bus.....Seattle
 Ball, Rollyn John, LD, Bus.....Seattle
 Ballard, James M, Sp, Law.....Seattle
 Ballinger, Douglas T., 1st Law.....Seattle
 Balmer, Betty, UD, FA.....Seattle
 Baltazar, Emilio, Unc, Sci.....Philippines
 Balzer, N. Charles, LD, Bus.....Spokane
 Balzer, Walter W., LD, Bus.....Spokane
 Ramford, Lawren Ruth, LD, FA.....Seattle
 Bancroft, Cecyl, Unc, Bus.....Everett
 Banker, Helen Doris, UD, LA.....Winthrop
 Banks, Amy Theodora, LD, LA.....Seattle
 Banks, Hugh Thomas, UD, LA.....Seattle
 Bannwarth, Charles G., UD, Bus..Snohomish
 Barbee, Peyton Elias, UD, LA.....Seattle
 Barler, David A. Grad.....Seattle
 Barber, Edward A, Unc, Bus.....Wesler, Ida
 Barber, Florence M, Unc, FA.....Idaho
 Barber, Frank C, LD, Min.....Wenatchee
 Barber, James G, LD, Fish.....Bellingham
 Barber, Jesse Belmont Grad, LA.....Seattle
 Barberis, E. Albert, LD, Min.....Seattle
 Barbour, Philip R., LD, Bus...Helena, Mont
 Barclay, Alice J., LD, LA.....Prairie
 Barclay, Charles Paul, UD, Bus...Auburn
 Barclay, Elizabeth, UD, LA.....Tacoma
 Bartarson, Otto W., UD, Ed.....Blaine
 Bardon, Rardon, Unc, LA.....Seattle
 Bardon, Guy J, LD, LA.....Seattle
 Bardon, Norma, UD, LA.....Seattle
 Barker, Stuart D, Unc, Law.....Seattle
 Barkley, Catherine, Unc, Ed.....Aberdeen
 Barnecut, George D, LD, Bus.....Seattle
 Barnes, Beatrice, LD, Sci.....Seattle
 Barnes, C Ernest, LD, Bus.....Olympia
 Barnes, Frances Jane, LD, LA.....Seattle
 Barnes, Lois Nadine, LD, FA.....Chelan
 Barnes, Rex Scott, LD, CE.....Spokane
 Barnes, Ruth Mable, Unc, LA...Salem, Or
 Barnett, Nell Mary, Grad.....Bellingham
 Barnhill, Othiel, LD, FA.....Everett
 Barnhisel, A Howard, LD, For.....Seattle
 Barnhisel, Kathryn, UD, Ed.....Seattle
 Baron, Pearl, LD, Bus.....Portland, Or
 Barquist, Walter C, LD, Min.....Seattle
 Barrett, Ada La Rue, LD, Sci...Spokane
 Barrett, Marshall N, LD, Sci..Vancouver, Wn
 Barrett, Roy Irwin, LD, Phar...Bremerton

Barritt, Nan, LD, LA.....	Seattle	Bennett, Dudley Jerome, LD, Bus....	Seattle
Barron, Dale Herbert, Unc, Phar...	Sumner	Bennett, Marjorie, UD, Ed.....	Chehalis
Barron, Dorothy, Unc, LA.....	Seattle	Bennett, Raymond O, Sp, Bus.....	Everett
Barrow, Martha Mabel, LD, LA.....	Seattle	Bennett, Richard F, LD, LA.....	Kirkland
Bartels, Fred J, Unc, Min.....	Or	Benson, Clarence W, LD, LA.....	Spokane
Bartholomew, Wayne L, LD, Bus....	Puyallup	Benson, Louis, LD, Bus.....	Olympia
Bartoline, Wesley B, LD, LA.....	Seattle	Benson, Richard N, LD, LA.....	New York
Bartlett, Frederick A, LD, For.....	Boise, Ida	Bennett, Volney J, LL, Bus.....	Seattle
Bartlett, Iris Louise, LD, Sci.....	Marysville	Benson, Warren B, UD, Bus.....	Seattle
Basford, Chas. Edmund, Grad, Min.	Seattle	Benson, Willis C, UD, ChE.....	New York
Bashey, Elmer, LD, ME.....	Tacoma	Benton, Harold Morse, 2nd, Law.	Seattle
Rashor, Thurston C, LD, LA.....	Kelso	Benz, Ezra Emil, LD, Bus.....	Toppenish
Bassett, Charlotte A, UD, Sci.....	Hoquiam	Benz, Luke Lorenz, LD, Bus.....	Toppenish
Bassett, Samuel B, Sp, LA.....	Montesano	Berche, R. Leo, LD, Eng.....	Hillyard
Bateman, Winifred, LD, FA.....	Seattle	Berg, Alice Alma, LD, FA.....	Yakima
Bates, John M, LD, LA.....	Portland, Or	Berg, George F, Sp, Phar.....	Seattle
Bates, Kenneth Ogden, UD, Bus....	Tacoma	Berg, Gunnar Hanson, LD, Ed.....	Kelso
Bath, Clarence Paul, Unc, Bus....	Seattle	Berg, Henry Roy, LD, ME.....	Seattle
Bauer, Elsa Marie, Unc, LA.....	Ritzville	Berg, Lawrence R, UD, EE.....	Missoula, Mont
Bauer, Ruby Adele, LD, FA.....	Ritzville	Berggren, A J, LD, LA.....	Anaconda, Mont
Baumgartner, Alfred J, UD, Bus....	Okanogan	Bergh, Lillian G, Unc, FA.....	Seattle
Baumgartner, Frank, LD, Sci.....	Okanogan	Berglund, Myrtle Ivana UD, LA.....	Seattle
Bautista, Marceline, LD, Ed.....	Philippines	Berglund, Theos Henry, LD, Bus....	Seattle
Baxter, Harriet May, Unc, FA.....	Seattle	Bergman, Charlotte, LD, FA.....	Seattle
Baxter, Roscoe James, LD, Bus....	Walla Walla	Bergman, E E, UD, Sci.....	Breckenridge, Colo
Bay, Mrs. Bertha J, Grad.....	Bothell	Bergman, Margaret B, LD, Sci....	Colo
Bayler, Vera Kathryn, LD, Bus....	Wenatchee	Berggren, Evelyn, LD, Sci.....	Seattle
Bayless, Alexander O, LD, Bus....	Seattle	Bergstedt, Nestor B, LD, Bus....	Seattle
Bayley, Elizabeth P, LD, LA.....	Seattle	Bergstrom, Anna, Sp, Sci.....	Seattle
Bayley, Nancy, UD, Sci.....	The Dalles, Or	Bergstrom, Conrad Earl, LD, FA.	Hoquiam
Baylis, Charles A, LD, LA.....	Spokane	Bergstrom, Ruth, LD, Sci.....	Hoquiam
Bazzett, Hamilton S, LD, Bus....	Seattle	Bergstrom, Theodore, LD, EE.....	Seattle
Bazzett, Marian S, LD, LA.....	Seattle	Bernal, Frederico A, Unc, Sci.....	Philippines
Beach, Golda Hazel, Unc, Ed.....	Seattle	Bernheim, Martha J, UD, Phar....	Seattle
Beager, Irma F, LD, Ed.....	Seattle	Berry, Elsa LD, FA.....	Portland, Or
Beall, Harry Newell, LD, Bus....	Raymond	Berry, Helen, Unc, Bus.....	Seattle
Bean, Erma Lois, LD, LA.....	Spokane	Berry, James Jerome, LD, CE.....	Puyallup
Beard, Hawley W, Sp, Sci.....	Seattle	Berry, Roy Neil, LD, CE.....	Tacoma
Beard, L Irene, LD, LA.....	Seattle	Bersing, Edna M, Unc, Ed.....	Tacoma
Beardslee, Will G, Unc, Law.....	Bothell	Berst, Charles Ashton, LD, LA....	Portland, Or
Beatty, Mary E, LD, LA.....	Denver, Colo	Bert, Wilfred Korts, LD, EE.....	Seattle
Beaven, Grace M, Grad.....	Seattle	Berthold, Magdaline M, LD, LA.	Sherwood, Or
Bebb, Rose Anne, Grad.....	Seattle	Besner, Marie, Unc, Ed.....	Seattle
Bechen, Eleanor, UD, Bus.....	Hillsboro, Or	Best, Mary Elmyra, LD, LA.....	Yakima
Beck, Fred Wilson, LD, LA....	San Diego, Cal	Best, Eric Clifton, LD, LA.....	Grants Pass, Or
Beck, Harry George, Unc, Sci.....	Seattle	Best, Walter C, Sp, Bus.....	Seattle
Beck, Nemias B, Jr., LD, LA.....	Seattle	Beawick, Dolphine, Unc, Sci.....	Seattle
Beck, Ula, LD, FA.....	Seattle	Bethel, Frederick Bell, Unc, Bus.	Spokane
Beckerjeck, Rozella, LD, LA.....	Seattle	Bethel, Virginia R, LD, LA.....	Portland, Or
Beckwith, Edris Lucile, LD, FA....	Seattle	Bettner, Virgilio, LD, Sci.....	Anacortes
Beckwith, S Vilas Jr, UD, Bus....	Seattle	Bevans, Dee Lorenzo, LD, CE.	Mulberry, Kan
Beedon, Beulah Mary, LD, Bus....	Aberdeen	Beveridge, Alton Vere, LD, Bus....	Seattle
Beeler, Donald T, LD, Sci.....	Seattle	Bevis, Samuel Major, LD, Bus.	Lewiston, Ida
Beers, Norman A, Unc, Bus.....	Seattle	Bewley, Loyal V, LD, EE.....	Seattle
Beeser, Arnold R, LD, LA.....	Seattle	Bewley, Ruth Lynette, LD, LA....	Seattle
Beeser, Catherine M, LD, Sci....	Seattle	Beymer, Lily, LD, Ed.....	Seattle
Beeser, Raymond Lewis, UD, FA....	Seattle	Beymer, Ralph, LD, LA.....	Seattle
Bell, Bessie E, Unc, Sci.....	Logansport, Ind	Bidwell, Homer G, LD, Bus....	Portland, Or
Bell, Ellis Walter, LD, ME.....	Mt. Union, Ia	Bien, Henry H S, Unc, Bus.....	China
Bell, James Miller, LD, Fish....	Seattle	Blery, Almada Grace, LD, FA.....	Seattle
Bell, John Kard, 2d Law.....	Seattle	Bigelow, Alfred E, LD, LA.	New Hampton, Ia
Bell, Lela Mae, Unc, FA.....	Seattle	Bigelow, Edris, LD, Bus.....	Edmonds
Bell, Robin L, LD, Bus.....	Kallispell, Mont	Biggs, Mary Catherine, LD, FA....	Seattle
Bell, Ward Y, LD, EE.....	Port Angeles	Bigley, John LD, EE.....	Cle Elum
Bell, William R, Jr, LD, LA.....	Seattle	Bille, Margaret J, UD, Ed.....	Tacoma
Bell, Wyloha Helen, UD, LA.....	Seattle	Billings, Charles N, LD, ME.	Portland, Or
Bellingham, Norman, UD, Bus....	Tacoma	Billings, Rhea R, UD, FA.....	Ashford
Bellman, Vernon A, LD, Bus....	Aberdeen	Bindon, Leonard W S, LD, FA....	Bellingham
Bellosillo, Leon A, LD, Bus....	Philippines	Bingham, Blanche Irene, LD, LA....	Seattle
Belstad, Walter Cyrus, UD, Phar.	Seattle	Bingham, Selwyn A UD, CE.....	Portland, Or
Bender, Nathaniel B, LD, LA.....	Tacoma	Bircher, Mrs Donald Oliver, LD, FA.	Seattle
Bender, Robert W, UD, LA.....	Tacoma	Bird, Lester F, UD, EE.....	Seattle
Benecke, Clarence, LD, Bus.....	Seattle	Bird, Mrs Lucy P, Sp, Sci.....	Seattle
Benedum, M Darwin, Unc, Sci.....	Spokane	Birkholm, George J, LD, ME.....	Seattle
Benefiel, Grace J, LD, FA.....	Spokane	Birks, Margaret E, UD, LA.....	Tacoma
Benezra, Henry, UD, EE.....	Seattle	Birney, Fred Owen, SC, Min.....	Seattle
Bennjamin, G T, LD, Min.Pt	Alexander, Alas	Bisazza, Virginia, LD, FA.....	Seattle
Bennett, Albert Lee, Grad, Min....	Seattle	Bishop, Dorothy L, LD, LA.....	Everett
Bennett, Dwight G, Unc, EE.....	Seattle	Bishop, John Burton, Unc, LA....	Seattle
Bennett, Vivian Bruce, LD, Sci....	Seattle	Bishop, Nancie W, LD, Bus.....	Kennewick
Bennett, Constance, LD, LA.....	Seattle		

Bishop, Theodore, LD, LA.....Clarkston
 Bissett, Clark P Jr, LD, LA.....Seattle
 Bissett, Rudolf A, UD, Sci.....Vancouver
 Bither, Ella, LD, Sci.....Kellogg, Ida
 Bjorkquist, E Joseph, LD, LA.....Spokane
 Bjorn, Victor Arnold, Sp, Bus.....Seattle
 Black, Elizabeth, Unc, LA.....Ellensburg
 Black, John Albert, LD, EE.....Wenatchee
 Black, Myrow Watt, UD, CE.....Spokane
 Black, Ruth Ulyate, LD, Sco.....Port Angeles
 Blackinger, Frank J, UD, LA.....Boise, Ida
 Blaine, Edward L Jr, UD, Bus.....Seattle
 Blaine, James Arthur, LD, Sci.....Seattle
 Blair, Birdie, LD, Sci.....Spokane
 Blake, Emilie Isabelle, UD, LA.....Aberdeen
 Blake, Joseph Roy, Sp, For.....Seattle
 Blake, Martha Ellen, LD, Bus.....Seattle
 Blanchard, Bess E, LD, LA.....Port Orchard
 Blanchard, Leo Judson, LD, Sci.....Wapato
 Blenkinsop, George W, Unc, EE.....Seattle
 Blessing, L J, UD, CE, White Sulphur Sp, Mt
 Blogg, Ainsworth, LD, LA.....Seattle
 Blomquist, Louis Earl LD, Bus, Belt, Mont
 Blomquist, Roy W, LD, Bus.....Hoquiam
 Bloomfield, Irma E, LD, Bus, Nampa, Ida
 Blossom, Gerald Edward, Unc, Bus, Seattle
 Blum, Signor Wesley, Unc, LA.....Spokane
 Blumenfeld, Zipora, UD, Sci.....Seattle
 Blumfield, Lyle L, Unc, FA.....Ottumwa
 Bly, Allison, LD, Sci.....Victoria, B. C.
 Bock, Edna May, LD, Bus.....Seattle
 Boeckman, Jules H, LD, EE.....Granite Falls
 Bogardus, Helen E, UD, Sci.....Seattle
 Bogart, W Lois, Unc, LA, Kallispell, Mont
 Boggs, Ethel Elizabeth, LD, Bus.....Spokane
 Boggs, Thelma Viola, LD, Ed, Port Angeles
 Bogolavinsky, Boris, LD, CE.....Seattle
 Bogolavinsky, Gleb Unc, LA.....Seattle
 Bohart, Ruby May Sp, Sci, Bozeman, Mont
 Bohlander, Nadine L, LD, LA, Portland, Or
 Bolderston, Constance B, LD, LA, Portland
 Bole, John C, LD, Bus.....Seattle
 Bole, Mildred Hill, LD, Ed.....Seattle
 Bolinger, John Clayton, Unc, Law, Methow
 Bolinger, Morris A, LD, LA.....Methow
 Bollam, Darrell C, LD, Sci.....Portland, Or
 Bolman, James, UD, Ed.....Madagascar
 Bolsover, G Stanford, LD, Bus.....Seattle
 Bolstead, Archie Leonard, LD, EE.....Seattle
 Bolt, Ben Jr, LD, LA.....Frewater, Or
 Bolton, Edwin Latham, UD, ME.....Seattle
 Bomstead, Edward S, LD, ME.....Tacoma
 Bonar, Ellen Gertrude, LD, LA.....Enlat
 Bond, Charles Albert, LD, ChE, Bellingham
 Bond, Floyd King, LD, ChE.....Bellingham
 Bond, Fred Watson, Unc, ChE, Bellingham
 Bonelli, Helen M, LD, Sci.....Fall City
 Bonnell, Jenness Mildred, LD, LA, Tacoma
 Bonnell, Marguerite, LD, LA.....Tacoma
 Bonner, Gertrude, UD, LA.....Centralia
 Bonner, James F, Grad.....Columbus, Neb
 Bonner, Pearl, UD, Ed.....Centralia
 Bonnett, Howbert B, LD, ME.....Seattle
 Bonnewell, Kenneth, LD, PA, Portland, Or
 Booker, Matilda Fay, LD, Ed.....Othello
 Booker, Estie Paul, LD, EE.....Othello
 Boone, Julia Louise, LD, Sci.....Seattle
 Booth, Earl Le Roy, LD, Sci.....Burlington
 Borglin, Joseph N, LD, ChE.....Seattle
 Borgstedt, Dolly, LD, Bus.....Seattle
 Bormann, Ernest Ehrke, UD, EE.....Seattle
 Borrow, Martha Mabel, LD, LA.....Seattle
 Borrow, Robert, Unc, ME.....Seattle
 Borst, Sylvia, Sp, FA.....Seattle
 Boswell, Raymond Chester, LD, Phar, Seattle
 Both, Cecil, Unc, Bus.....Bellingham
 Bouck, Gordon M, UD, Fish.....Hillyard
 Boundy, Charles Milburn, LD, Ed, Seattle
 Bourgette, Edythe M, LD, Bus.....Pt. Angeles
 Bousfield, Winifred, LD, Bus.....Seattle

Bowden, Koble E, LD, EE.....Sandpoint, Ida
 Bowen, Albert, Sp, CE.....Seattle
 Bowen, Frank Herbert, UD, Ed.....Montesano
 Bowen, William Edward, LD, Bus.....Spokane
 Bower, Donald Duane, LD, Bus.....Centralia
 Bower, Phyllis Mildred, Unc, Ed, Butte, Mt.
 Bowles, Anna Laura, Grad.....Seattle
 Bowman, Beulah Marjorie, UD, Sci, Seattle
 Bowman, Donald, LD, For.....Seattle
 Bown, Robert Frederick, Grad.....Tacoma
 Boyd, Almira Patricia, LD, LA.....Seattle
 Boyd, Robert Jesse LD, ME.....Du Pont
 Boyd, Truman O, Sp, Law, Twin Falls, Ida
 Boyer, Margaret, LD, LA.....Portland, Or
 Boyer, Vera, LD, LA.....Portland, Or
 Boyer, Orel Walter, LD, FA.....Yakima
 Boyington, Jo Mae, UD, LA, Coeur d'Alene, Ida
 Boyington, Paul, LD, Bus.....Spokane
 Boyle, George Louis, UD, Bus.....Seattle
 Boyle, Gordon Lovett, LD, Bus.....Everett
 Boynton, Fred Richard, Unc, Bus, Seattle
 Bozarth, Richter, LD, Bus.....Lewiston, Ida
 Bracken, Harold A, LD, Eng.....Yakima
 Brackett, Leroy William, LD, EE, Yakima
 Brackett, A Wendell, UD, LA.....Seattle
 Bradley, Beatrice, UD, LA.....Selah
 Bradley, Florence, LD, Ed.....Selah
 Brady, Lee John, LD, Bus.....Montesano
 Brady, Margaret W, LD, LA.....Tacoma
 Brady, Robert A, Unc, LA, Marysville
 Bragdon, Elizabeth W, LD, Sci.....Olympia
 Bragg, George Tully, LD, Bus, Hood River, Or
 Braid, Frances Mae, LD, FA.....Seattle
 Bralnard, Silas Arthur, LD, Bus.....Seattle
 Brandenthaler, Anthony A, U D LA Seattle
 Brandenthaler, Rudolph R, Sp, Min, Seattle
 Bratcher, Gladys, LD, Ed.....Midvale, Ida
 Brattain, James William, LD, Sci, Seattle
 Brauer, Henry Herman, LD, LA.....Seattle
 Braun, Paul, LD, ME.....Edwall
 Bray, Frank Nathan LD, Bus.....Seattle
 Bray, Harold, LD, Bus.....Seattle
 Brayton, Annie C, Sp, Sci.....Seattle
 Brazier, Donald H, LD, Bus.....Seattle
 Brazier, John M, LD, Bus.....Seattle
 Bregg, Carl Willard, Unc, ME.....Seattle
 Bregg, Dorsey Audrin, LD, EE.....Seattle
 Brehm, Edward Eugene, Unc, For, Seattle
 Brehm, Gretchen, LD, LA.....Seattle
 Brengan, Samuel, UD, Eng.....Seattle
 Brennan, Robert Addison, LD, Bus, Seattle
 Bresee, Ethel June, LD, LA.....Seattle
 Bressler, Alice Marian, LD, LA.....Seattle
 Brethorst, Alice B, Sp, LA.....Seattle
 Brethorst, Marie, Grad.....Seattle
 Brickell, Charles Bruce, 2d Law.....Seattle
 Brickell, Duncan Walter, UD, Bus, Seattle
 Bricker, John Paul, LD, For.....Seattle
 Bricker, Lee UD, LA.....Seattle
 Bridgeman, Glenn H, LD, Bus, Harrison, Ida
 Bridston, Albertine Olga, UD, Ed, Valier, Mt
 Brigham, Lyle Duane, LD, Bus.....Seattle
 Briles, Gerald Emerson, LD, Bus.....Seattle
 Brill, Bertha, UD, Jour, Minneapolis, Minn
 Brindle, Alexander W, LD, CE, Ketchikan, A
 Bringham, Alice Constance, UD, LA, Seattle
 Brink, Earl Herbert, LD, Bus.....Tacoma
 Brisack, Floyd Raymond, UD, ME, Seattle
 Brockman, Blaine LD, Bus.....Weiser, Ida
 Brockman, Fred William, UD, Sci, Anacortes
 Brokaw, Charles A, UD, EE, Townsend, Mt
 Brokaw, Marion A, UD, Ed.....Tacoma
 Bronson, Ira Lloyd, LD, Sci.....Seattle
 Bronson, Phil, LD, For.....Seattle
 Bronson, Robert E, Grad.....Seattle
 Bronson, Robert U, LD, Sci.....Seattle
 Brooks, Evelyn Blanche, LD, LA.....Concrete
 Brooks, Marjorie H, LD, LA.....Seattle
 Brotnov, Marguerite, UD, Ed.....Bellingham
 Broulette, Marie, Sp, FA.....Yakima

- Broward, Ella, UD, LA..Jacksonville, Fla
 Browder, Bernardine, LD, LA.....Colfax
 Brown, G Adelaide, LD, Ed.....Seattle
 Brown, Alice May, LD, LA.....Portland, Or
 Brown, Barton Wright, LD, CE.....Seattle
 Brown, Charles Henry, Sp, Phar..Hoquiam
 Brown, Dorothea Madge, Unc, LA.....Seattle
 Brown, Dorothy G, LD, LA.....Seattle
 Brown, Earl Dwight, UD, ChE.....Custer
 Brown, Edda Virginia, LD, Sci.....Tacoma
 Brown, Edith Olivia, UD, Sci.Friday Harbor
 Brown, Eleanor, LD, LA.....Walla Walla
 Brown, Florida, LD, LA.....Tacoma
 Brown, Francis Lemon, UD, Bus.....Yakima
 Brown, Francis M, 1st Law.....Portland, Or
 Brown, Francis Stewart, Sp, Jour..Seattle
 Brown, Genevieve, LD, LA.....Portland, Or
 Brown, Harry A D, LD, Bus.....Tolt
 Brown, Kenneth, LD, LA.....Clackamas, Or
 Brown, Lorna B, LD, LA.....Portland, Or
 Brown, Lurline, LD, LA.....Seattle
 Brown, Marguerite Lillian, Sp, LA..Seattle
 Brown, Martha LD, Bus.....Seattle
 Brown, Minnie, LD, LA.....Yakima
 Brown, Orville Carrol, Sc, Min.....Seattle
 Brown, Ralph Nason, LD, Bus.....Seattle
 Brown, A Richard, LD, Bus..Wallace, Ida
 Brown, Sarah, UD, Bus.....Yakima
 Brown, Stewart H, LD, LA.....Port Angeles
 Brown, William Joseph, UD, Bus..Seattle
 Brown, William W, LD, LA.Great Falls,Mt
 Browne, Clarence Hamlin, LD, Bus..Seattle
 Browne, Paul, LD, EE.....Portland, Or
 Browning, George, LD, Bus.....Seattle
 Bruce, Clarascott, Grad.....Seattle
 Bruce, Irene F, UD, Ed.....Kallispell, Mont.
 Brueggeman, Kathryn, UD, Bus.....Seattle
 Brumbach, Vernon J, LD, EE.....Ilwaco
 Brunner, John Fredrich, LD, ChE.....Addy
 Bryan, Helen R, LD, LA.....Seattle
 Bryan, Clara Moody, Grad.....Seattle
 Bryan, Collis Charles, Unc, ChE.....Dayton
 Bryan, Elizabeth J, LD, Bus.....Seattle
 Bryan, Kathryn, LD, LA.....Seattle
 Bryan, James Wesley Jr, LD, LA..Seattle
 Bryan, Wilmer Davenport, LD, For. Olympia
 Bryant, Nellie Marie, LD, LA.Friday Harbor
 Bryant, Robert Curtiss, LD, EE..Clarkston
 Bryce, Gertrude Amy, LD, LA..Victoria, BC
 Buchanan, Iva Luella, Grad.....Seattle
 Buchanan, Lorna May, LD, LA..Clear Lake
 Buchanan, Marian B, Unc, FA.....Seattle
 Buchanan, Sara Gene, UD, Ed.....Cheney
 Buchet, Claude Louis, Sp, Bus.....Pomeroy
 Buck, Florence Margaret, LD, LA..Seattle
 Buckley, Harry Booth, LD, CE.....Seattle
 Budd, Irene Adair, LD, Phar..Helena, Mont
 Budden, Frank Wilfrid, UD, EE.....Seattle
 Budwin, Theodora Aileen, LD, LA..Spokane
 Buchrer, Cletus Earl, LD, Sci..Topeka,Kan
 Buendia, Juan, LD, Sci.....Seattle
 Buerk, Louise Carolyn, LD, LA.....Seattle
 Bukowsky, Harry W E UD, ME..Portland,Or
 Bullock, Cecil Frank, LD, Ed.....Seattle
 Bumgarner, C Grady, Unc, Bus..Nampa, Ida
 Bumgarner, H Helen, LD, Sci..Donnelly, Ida
 Bundy, Margaret M, LD, LA.....Seattle
 Bunnell, Bertha Clare, LD, LA.....Seattle
 Burch, Clara Catherine, UD, FA.Ellensburg
 Burcham, Marie A, UD, Jour.....Seattle
 Burdick, Don, UD, LA.....Seattle
 Burdick, Eitel, LD, ChE.....Seattle
 Burdick, Esther C, LD, Bus.....Seattle
 Burdick, Vesta, Unc, Sci.....Seattle
 Burfield, Helen S, LD, Ed.....Portland, Or
 Burford, Wilbur, Unc, Bus.....Juneau, Alaska
 Burgess, Madeline, LD, FA.....Pendleton, Or
 Burk, Clarence F, LD, EE..Carson City, Nev
 Burke, F Berenice, LD, LA.....Portland, Or
 Burke, Mrs. Edna L, Sp, LA.....Seattle
 Burke, Howard Mason, UD, Bus.Walla Walla
 Burkett, Benjamin S, LD, Ed.Groseclose, Va
 Burkheimer, William D, LD, Eng..Seattle
 Burkman, Joel Andrew, LD, Ed..Firth, Ida
 Burks, Charles Richard, LD, Bus.....Seattle
 Burlingame, George A, LD, Min..Montborne
 Burmeister, Edward Roy, Unc, LA..Seattle
 Burmeister, Elizabeth, LD, FA.Kellogg, Ida
 Burmeister, Harry L, UD, Min.....Tacoma
 Burnam, David Lincoln, Unc, FA.Anacortes
 Burnett, Charles Hugh, LD, LA.....Seattle
 Burnett, John Andrew, LD, EE.....Seattle
 Burnham, Constance O, Grad..Waupace, Wis.
 Burnham, Helen Marie, UD, L.....Spokane
 Burnie, Donald A, LD, Bus.....Yakima
 Burns, Barbara B, LD, LA.....Seattle
 Burns, Helen, LD, FA.....Spokane
 Burns, Irene Lillian, LD, LA.....Spokane
 Burns, Malcolm O, LD, Bus..Kallispell, Mont
 Burns, Nina May, LD, FA.....Seattle
 Burnside, Robert S, LD, Bus...Portland, Or
 Burpee, Margaret M, UD, Bus..Bellingham
 Burrough, Edward L, UD, EE.....Seattle
 Burroughs, Walter L, LD, LA.....Tacoma
 Burrows, Albert Warren, LD, Bus.....Seattle
 Burrows, Eleanor W, LD, LA.....Seattle
 Burrows, William J, LD, Sci.....Chehalis
 Burrus, McCune Thurlow, LD, Sci..Spokane
 Bursell, Frances Imogene, LD, LA....Seattle
 Burson, Clay Henry, Sp, Phar.....Seattle
 Burt, Cloye E, LD, LA..Mountainhome, Ida.
 Burtis, Lynn J, LD, Bus.....Portland, Or
 Burton, Clara B, LD, Sci.Mt. Vernon, N. Y.
 Burton, Nelle Aline, LD, Bus.....Seattle
 Bush, Elizabeth Pauline, LD, LA.....Seattle
 Bush, Lyle Kenneth, UD, LA.....Bay Center
 Busey, Sarah P Mrs, UD, For.....Seattle
 Busha, Joy, LD, Bus.....Mt. Vernon
 Busse, Arthur Emil, LD, ChE.....Seattle
 Butcher, Fred J, LD, Bus.....Seattle
 Butler, Judson Rea, UD, LA..Atlanta, Ga.
 Butler, Philbrick, UD, CE.....Seattle
 Butler, Robert, LD, CE.....Seattle
 Butt, Edward M, LD, Sci.....Seattle
 Butter, Madeleine, LD, FA.....Seattle
 Butts, Margaret Flynn, Unc, LA..Seattle
 Button, Malcolm P, Unc, Bus.Hood River, Or
 Byerly, Oliver Finley, UD, For.Portland, Or
 Byers, John R, LD, Sci.....Everett
 Byers, Ada Kathryn, UD, Sci.....Seattle
 Byers, Marshall Sumner, LD, ChE..Seattle
 Byers, Maryhelen, LD, FA.....Seattle
 Byrd, Evelyn L, LD, Bus.....Burns, Or
 Byrd, Mabel, UD, LA.....Portland, Or
 Byrne, William Gilman, LD, ME.....Seattle
 Byrne, Harry McDonald, LD, Bus.....Seattle
 Byrne, Laurin Thaddeus, LD, LA.....Seattle
 Byron, Robert Lee, LD, Bus.....Bellingham
 Caballero, Salvador S, LD, Bus..Philippines
 Cadigan, John Wilson, LD, Bus...Spokane
 Cahill, Bertha Frances, Unc, Bus.....Seattle
 Cain, Roy Carlyle, LD, Bus...Wenatchee
 Calder, Lester Edward, LD, For..Montesano
 Caldwell, Derrold V, Unc, Bus.....Seattle
 Calhoun, Alma, LD, LA.....Seattle
 Calhoun, Charles Eliot, LD, LA.....Tacoma
 Calkins, Howard Theodore, LD, Sci.Kirkland
 Calkins, Ione Janice, LD, Sci..Bremerton
 Calkins, Norman F, LD, Bus.....Suquamish
 Calkins, Sadie Mae, LD, Sci.....Kirkland
 Callahan, A H, LD, Bus.....Seattle
 Callahan, Lloyd F, Sp, Law..Casselman, N D
 Callender, James Asa, LD, CE....Colfax
 Callison, Cecil Putnam, LD, CE..Aberdeen
 Callison, Henry S, LD, Bus.....Aberdeen
 Callow, Doris, LD, Sci.....Seattle
 Calvert, H. Starr, Unc, Bus.....Seattle
 Calvin, John Thornton, LD, Bus...Seattle

- Calvin, Blanche Marie, LD, LA.....Pasco
 Calvin, Everett S, UD, ChE, Miles City, Mont
 Cameron, Marion P, UD, Bus.....Yakima
 Cameron, Walter Courtney, LD, Sci.....Tacoma
 Camp, Dorothy Foster, UD, Sci.....Seattle
 Campan, Clifton R, LD, Bus.....Seattle
 Campan, Marion Frances, LD, Ed.....Seattle
 Campbell, Addison J, UD, Eng.....Seattle
 Campbell, Alexander, LD, Bus.....Seattle
 Campbell, Alphonsus, LD, Sci.....Seattle
 Campbell, Carolyn Gage, Unc, LA.....Seattle
 Campbell, Donald M, UD, Phar.....Seattle
 Campbell, Don Stiles, LD, Eng.....Spokane
 Campbell, Earl Folgate, 1st Law.....Seattle
 Campbell, Edward L, LD, Bus.....Butte, Mont.
 Campbell, Elsie, LD, LA.....Seattle
 Campbell, Ernest William, Grad.....Seattle
 Campbell, Gertrude C, UD, LA.....Portland, Or
 Campbell, James Albert, LD, LA.....Seattle
 Campbell, Jean Allison, UD, LA.....Winslow
 Campbell, Lillian H Mrs, UD, LA.....Seattle
 Campbell, W H Lysle, Sp, Bus.....Bellingham
 Campbell, Morrison, LD, Bus.....Seattle
 Campbell, P Roderick, Unc, LA.....Kent
 Campbell, Robert A, LD, Bus.....Waverly
 Campbell, Roy Everett, UD, Min.....Bremerton
 Campbell, Mrs Roy H, LD, LA.....Seattle
 Campbell, Vivienne A, LD, FA.....Seattle
 Campbell, Willis L, LD, Bus.....Spokane
 Camperson, Helen Elizabeth, LD, LA.....Seattle
 Canfield, Iris Fern, LD, FA.....Seattle
 Canney, Frank Russel, UD, EE.....Seattle
 Cannon, James B, Sp, Fish.....Colby
 Canon, Don Moore, LD, Bus.....Seattle
 Capen, Donald Frank, LD, Bus.....Yelm
 Caples, Elwood D, LD, LA.....Vancouver, Wn
 Capps, Frank, LD, CE.....Doty
 Carabajosa, Vincent, LD, Bus.....Seattle
 Card, Mabel, UD, Ed.....Helena, Mont
 Carey, Robert L, Grad.....Seattle
 Carey, Ruth Isabelle, LD, Bus.....Seattle
 Carlander, Hazel, LD, Bus.....Seattle
 Carlander, Oswald R, UD, Phar.....Seattle
 Carlberg, Emily A, Unc, FA.....Seattle
 Carlsen, Aruthur George, UD, EE.....Tacoma
 Carlsen, Carter Juell, LD, Min.....Spokane
 Carlson, Anna E, Sp, Nurs.....Seattle
 Carlson, Cecilia C, LD, LA.....Aberdeen
 Carlson, Emil Gim, LD, Bus.....Cosmopolis
 Carlson, Floyd B, LD, ChE.....Mt Vernon
 Carlson, Gladys May, LD, Ed.....Mt Vernon
 Carlson, Iver W, UD, Bus.....Amber
 Carlson, Julia, LD, LA.....Everett
 Carlson, Julia Tecla, LD, LA.....Seattle
 Carlson, Leonard H, Sp, Phar.....Cosmopolis
 Carlson, Theodore D, LD, Bus.....Yakima
 Carlson, Victor Robert, LD, Sci.....Everett
 Carlson, Wilma A, LD, Bus.....Fairbanks, Aka
 Carlton, Harold Stevens, LD, EE.....Seattle
 Carman, Helen B, LD, FA.....Portland, Or
 Carman, Rufus W, LD, CE.....Seattle
 Carmichael, Chris C, LD, Bus.....Seattle
 Carmody, Walter R, LD, ChE.....Gt Falls, Mt
 Carney, Marjorie Elsie, LD, LA.....Seattle
 Carpenter, Edward L, Jr, LD, CE.....Aberdeen
 Carpenter, Mary Jane, LD, FA.....Seattle
 Carpenter, Paul Mansfield, LD, FA.....Tacoma
 Carpenter, W H, LD, Bus.....Pardeeville, Wis
 Carr, Alice R, Unc, FA.....Seattle
 Carr, Dugald MacDougall, LD, ChE.....Seattle
 Carr, Eva Sabine, UD, Phar.....Seattle
 Carr, George Watson, Unc, Min.....Seattle
 Carr, Mrs Margaret M, Grad.....Seattle
 Carrett, Edward Hunter, Unc, LA.....Seattle
 Carrier, William H, Jr, LD, Bus.....Seattle
 Carroll, Frank Samuel, LD, ME.....Seattle
 Carson, Catherine B, LD, Bus.....Livingston Mt
 Carson, Emma Louise, LD, Sci.....Seattle
 Carson, M Pearl, LD, LA.....Chewelah
 Carson, Robert H, UD, Bus.....Warren, Ill
 Carstens, Henry T, LD, Bus.....Payette, Ida
 Carter, Ben H, Unc, Eng.....Seattle
 Carter, M Burdette, LD, Bus.....Centralla
 Carter, Cathrine L, LD, Bus.....Hood River, Or
 Carter, Charles John, LD, Bus.....Seattle
 Carter, James F, LD, FA.....Hood River, Or
 Carter, L McKinley, LD, EE.....Friday Harbor
 Carter, Marian A, LD, FA.....Montesano
 Carter, Rachel Isabel, LD, FA.....Garfield
 Cartmell, Lucile Frances, LD, LA.....Buena
 Cartwright, I Dorothy, LD, LA.....Seattle
 Casaciang, Cornelio B, LD, ME.....Philippines
 Case, Austin Ford, LD, LA.....Seattle
 Case, Avenant Byron, LD, EE.....Seattle
 Case, Edson M, 3d Law.....Puyallup
 Case, Clara Madge, LD, LA.....Juneau, Alaska
 Casey, Harry Patrick, Sp, Bus.....Seattle
 Cassels, Harry Angus, LD, Bus.....Seattle
 Cassill, Charles Harvey, LD, Bus.....Spokane
 Castilo, Margaret, Sp, Nurs.....Molson
 Castner, Burton M, LD, LA.....Seattle
 Castner, Grace B, Sp, FA.....Seattle
 Cater, Ray F, Unc, Law.....Wenatchee
 Catlin, Josephine Florence, Unc, Ed.....Kelso
 Cattle, Edith Agnes, LD, Sci.....Colville
 Catton, Mildred W, LD, Sci.....Portland, Or
 Cauvel, Orvel S, LD, Eng.....Seattle
 Cavanaugh, Cecil, LD, Bus.....Tacoma
 Cave, Clinton Robert, LD, Bus.....Winslow
 Cave, Floyd A, LD, LA.....Seattle
 Cave, Roy Clinton, LD, LA.....Seattle
 Cavender, Doris Capelle, Unc, Bus.....Seattle
 Clayton, Madge Revels, LD, Bus.....Seattle
 Cekada, Emil Bogomir, LD, Sci.....Seattle
 Cekada, Martha Amalia, LD, Sci.....Seattle
 Chadbourne, Charles, LD, LA.....Cresote
 Chalaire, Donald, Unc, LA.....New York
 Chalfant, Frank Elgin, Grad.....Boise, Ida
 Chamberlain, Ewart, LD, Bus.....Spokane
 Chamberlain, Helen Duncan, Grad.....Seattle
 Chamberlain, Helen Paul, LD, LA.....Aberdeen
 Chamberlain, Howard W, Sp, Sci.....Kettiefalls
 Chamberlain, Isabel, LD, LA.....Seattle
 Chamberlain, Robert B, UD, Bus.....Seattle
 Chamberlin, Howard, Sp, Sci.....Seattle
 Chambers, Doris, Unc, Sci.....Grandview
 Chambers, Horace James, LD, LA.....Seattle
 Champlin, Winifred E, UD, Sci.....Manette
 Chan, Leung Shi-Prov, LD, CE.....China
 Chandler, Louise Cary, LD, FA.....Yakima
 Chapman, Aleta Elva, LD, LA.....Seattle
 Chapman, Edith Josephine, LD, LA.....Seattle
 Chapman, Hazel, LD, Bus.....Chewelah
 Charleston, William, LD, ChE.....Seattle
 Charlesworth, Grace, LD, Sci.....Bellingham
 Charneski, Lauf, Law.....Seattle
 Charnley, Charlotte, LD, LA.....Goshen, Ind
 Charnley, Mitchell V, Grad.....Goshen, Ind
 Chase, Wendell Corwin, LD, LA.....Seattle
 Chase, Philip Nye, LD, ME.....Seattle
 Chase, Shirley M, LD, LA.....Alderwood Manor
 Chase, Warren LeRoy, LD, Bus.....Tacoma
 Chastam, Charles Robert, LD, Bus.....Tacoma
 Chen, Suen, UD, LA.....China
 Chen, Tsan Tye, UD, Bus.....China
 Chen, Tung Pai, Unc, Fish.....China
 Cheney, Johnston Myers, UD, LA.....Seattle
 Cheng, Chien Feng, UD, Bus.....China
 Cheng, Chung Kuei, UD, Bus.....China
 Cheng, Pao-Yuan, Unc, Phar.....China
 Chesley, Dorothy Helen, UD, LA.....Seattle
 Chester, Elsie M, LD, Bus.....Kallispell, Mont
 Chibberg, Elmer, LD, EE.....Spokane
 Chibberg, Ernest Edwin, LD, EE.....Spokane
 Child, Helen Taylor, LD, LA.....Seattle
 Chin, Chun, Unc, Ed.....China
 Chinn, Harry Wing, LD, LA.....Seattle
 Chinn, Mary L, Unc, LA.....Seattle
 Chinn, Wing Sam, UD, FA.....Seattle
 Chisholm, Dorothy Mary, LD, FA.....Seattle

Chittenden, Theodore P, LD, For....Seattle
 Chittick, Edna Whitman, UD, FA....Seattle
 Chitty, Lyman M, LD, EE.....Everett
 Choy, Doo Whan, LD, Mn.....Hawaii
 Christensen, Clara Mabel, LD, LA....Parkland
 Christensen, Earl L, Unc, Bus.....Seattle
 Christensen, Vernon G, LD, Bus...Lisabeula
 Christian, Byron Hunter, UD, Jour..Spokane
 Christianson, Luella Fern, UD, Ed...Seattle
 Christianson, Victor C, LD, LA.....Everett
 Christoffersen, William G, LD, Sci..Seattle
 Christopher, Ian Wesley, LD, LA....Olympia
 Christophersen, Carl F, Unc, LA....Seattle
 Christophersen, Walter C, LD, LA....Seattle
 Church, Anna Edsall, LD, Sci.....Tacoma
 Church, Richard Arthur, LD, EE.....Seattle
 Churchill, Eunice E, LD, FA.....Ellensburg
 Churney, Otto L, LD, Sci.....Deming
 Chute, George Roger, UD, Bus..Two Rivers
 Chute, Harold Gordon, LD, LA..Two Rivers
 Clague, Ewan, Grad.....Dayton
 Clague, Marietta, LD, Sci..Anaconda, Mont
 Clancy, Margaret P, LD, FA.....Seattle
 Clark, Alta, LD, Sci.....Seattle
 Clark, Alvide Lee, UD, LA.....Seattle
 Clark, Bruce Dow, Unc, LA.....Seattle
 Clark, Donald L, LD, Bus....Denver, Colo
 Clark, Elizabeth R, UD, LA.....Ellensburg
 Clark, George Edgar, 1st Law.....Everett
 Clark, Gwendolen D, UD, Phar..Bremerton
 Clark, Helen Davis, LD, LA.....Seattle
 Clark, Howard Albert, LD, Bus.....Seattle
 Clark, Iri Bert, LD, Bus....Forest Grove, Or
 Clark, Max Henry, LD, Bus.....Cashmere
 Clark, Mildred W, LD, Bus.....Seattle
 Clark, Nelson Lee, LD, Bus....Portland, Or
 Clark, Newman Hall, LD, LA.....Everett
 Clark, Paul Blackburn, Unc, ME..Wenatchee
 Clark, Stanley Arthur, LD, EE....Centralia
 Clark, Thomas Stuart, LD, Bus..Dungeness
 Clark, Mrs William L, Sp, FA.....Seattle
 Clarke, Harold, LD, CE.....Portland, Or
 Clarke, Lillian, LD, LA.....Seattle
 Clarke, Loretta, LD, Sci.....Seattle
 Clarke, Richard Gorham, LD, For....Seattle
 Clarke, Richard K, UD, Bus.....Seattle
 Classic, Ralph F, LD, Fish....Portland, Or
 Clausen, Chester K, LD, CE.....Seattle
 Clausen, Elva, UD, LA.....Seattle
 Clausen, Wendell Herman, LD, Phar..Seattle
 Claussen, Francis, Unc, Sci.....Seattle
 Claussen, Jeanne, LD, Bus.....Tacoma
 Cleland, Louise, LD, LA.....Seattle
 Clemans, I Vivian, LD, LA....Lewiston, Ida
 Clement, Andrew Weir, LD, EE.....Seattle
 Clement, Frank J, LD, LA.....Puyallup
 Clendenin, Ed H, Unc, ME..Washington, D C
 Clifton, Clarence C, Grad.....Seattle
 Clifton, Mary Evelyn, LD, LA.....Seattle
 Clinch, Vernon, UD, LA.....Butte, Mont
 Clingan, Claire C, LD, LA.....Hubbard, O
 Clithero, Raymond, LD, Bus.....Yakima
 Clithero, Russell L, LD, Bus.....Yakima
 Close, Lillian Anetta, UD, Ed....Kalama
 Coats, George Franklin, UD, Min....Seattle
 Coates, William Russell, LD, Bus....Seattle
 Cobangbang, Jose, Unc, Sci.....Philippines
 Cobb, Genevieve Catherine, LD, Sci..Seattle
 Cobb, C Maurice, LD, Bus.....Wapato
 Coburn, Leonard, Unc, Bus....Sabetha, Kan
 Cochran, Catharyn, UD, LA.....Seattle
 Cochran, Lyall B, LD, EE.....Snohomish
 Cochrane, Henry Park, LD, ME.....Seattle
 Cochrane, Mavis Claire, UD, Sci.....Seattle
 Cochrane, Roy, Unc, Bus.....Seattle
 Coe, Constance Mary, LD, LA.....Seattle
 Coffman, Grace M, UD, LA.....Spokane
 Cohen, Philip, LD, ChE.....Tacoma
 Cohn, Maxine Amelia, LD, FA.....Spokane
 Cohoes, Orlando S, UD, LA.....Spokane
 Colner, Gladys, UD, LA.....Hansen, Ida
 Cole, Claudine, LD, Bus.....Spokane
 Cole, Clinton Forrest, LD, FA Port Townsend
 Cole, David E, LD, For.....Seattle
 Cole, Mrs Elva E, Grad.....Pt Townsend
 Cole, Cleo Gennett, LD, Sci.....Seattle
 Cole, Gladys G, Unc, FA.....Seattle
 Cole, Helen A, LD, LA.....Seattle
 Cole, Janice, LD, FA.....Seattle
 Cole, Kenneth Carey, Unc, Law....Seattle
 Coleman, Clarence J, Grad.....Everett
 Coleman, Fred W, UD, Bus.....Seattle
 Coleman, Irma, LD, LA.....Bickleton
 Coleman, Raymond W, LD, Bus.....Renton
 Coleman, Vera Faye, LD, FA.....Bickleton
 Coles, Paul D, Sp, Law.....Seattle
 Collard, Benjamin A, UD, Bus.....Spokane
 Collard, Eugene H, UD, Bus.....Spokane
 Collett, Arthur Eugene, LD, LA.....Seattle
 Collic, Ford Ross, LD, Sci....Hood River, Or
 Collier, William C, LD, Bus.....Seattle
 Collins, Audrey L, Unc, FA.....Seattle
 Collins, W Chapin, UD, LA.....Seattle
 Collins, Elsie Dorothy, LD, Ed....Seattle
 Collins, James B, LD, Bus.....Bellingham
 Collins, Lee Raymond, LD, Phar....Seattle
 Collinson, Gloria, LD, Sci....Portland, Or
 Colter, Mrs Josephine H, LD, LA....Seattle
 Colton, Jeannette, UD, FA.....Seattle
 Colvin, John, Unc, CE.....Seattle
 Compton, Harold, LD, Bus.....Yakima
 Compton, Henry J, LD, Bus..Idaho Falls, Ida
 Condit, Charlotte F, Unc, LA.....Bliss, Ida
 Condon, Marie Teresa, LD, Bus.....Seattle
 Cone, Dwight H, Unc, LA.....Bellingham
 Conger, John A, LA, EE.....Nepesee, Ida
 Conkey, Glen B, LD, Bus....La Grande, Or
 Conklin, Florence A, UD, LA.....Renton
 Conklin, Robert H, Sp, For.....Seattle
 Connell, Archie M, UD, Ed....Freewater, Or
 Connell, Joseph A, LD, Bus.....Seattle
 Conner, Antoinette G, LD, LA.....Seattle
 Connor, Garland D, LD, Bus.....Spokane
 Conrad, Frank H, LD, ChE.....Seattle
 Conroy, Edward W, UD, EE..Anaconda, Mont
 Consing, Ramon, Sp, Bus.....Philippines
 Cook, Doris, LD, FA.....Seattle
 Cook, Erving S, UD, Bus....San Diego, Cal
 Cook, Jennie N, UD, LA.....Burns, Or
 Cook, Jo Dudley, LD, LA.....Burns, Or
 Cook, Richard Hiram, LD, Phar....Tacoma
 Cooke, Chester Clare, Sp, Bus....Seattle
 Cooke, Margaret Isabel, LD, LA.....Seattle
 Cooke, Philetus, LD, LA.....Bellingham
 Cookingham, Merritt G, LD, EE....Tacoma
 Cooley, Zoe Lathrop, Unc, FA.....Seattle
 Coolidge, Elizabeth, LD, LA.....Seattle
 Coombs, Helen Harriett, Unc, Sci...Tacoma
 Cooney, Alta, UD, Ed....Seattle
 Cooney, Elsie Lawson, LD, LA.....Seattle
 Cooper, S Helen, LD, LA.....Charleston
 Cooper, Jess, LD, EE.....Seattle
 Cooper, Lee Jesse, LD, Bus.....Pateros
 Cooper, Mary Stearns, LD, LA.....Seattle
 Cooper, Rebecca, UD, LA.....Seattle
 Cootes, Sarah, UD, Bus....Latouche, Alaska
 Copeland, Joseph M, Sp, LA.....Albany, Or
 Coplen, George W, LD, ME.....Spokane
 Coppage, Catherine, LD, LA.....Seattle
 Coppage, Thomas R, LD, Bus.....Seattle
 Coppinger, Homer George, Unc, LA..Echo, Or
 Copps, Eugene M, LD, Sci.....Everett
 Corbett, A Hazen, UD, FA.....Yakima
 Corbin, Louise E, UD, Bus....Portland, Or
 Cordero, M Rosaria, UD, Phar..Philippines
 Cordes, Henry G, Grad.....Bremerton
 Cordova, Ceodomiro, Unc, ME.....Philippines
 Corlett, Thirza E, LD, Bus.....Seattle
 Corlies, Maude Fern, Unc, FA...Medford, Or

- Cornello, Celerino, LD, Sci. Philippines
 Cornett, Imogene Powell, LD, LA. Seattle
 Cornett, Jessie M, Unc, LA. White Salmon
 Cornue, Max Donald, 2d Law. Selah
 Corskie, Florence B, LD, Sci. Seattle
 Costello, Eleanor, LD, LA. Mt. Vernon
 Couterlik, Genevieve, Unc, Sci. Mullan, Ida
 Couterlik, Wm. John, Sp, Bus. Mullan, Ida
 Council, Hilary Bush, LD, Bus. Seattle
 Counts, Milton Irwin, LD, ChE. Seattle
 Coupe, Rhea Margaret, LD, Bus. Seattle
 Coupez, Louis A, LD, Sci. Seattle
 Courtney, Charles Edwin, 3d Law. Seattle
 Cousins, John Lincoln, Unc, ME. Seattle
 Coventry, Edwin James, LD, ChE. Everett
 Cover, Allen D, LD, Bus. Portland, Or
 Covey, Helen Agnes, UD, Ed. Toppenish
 Covey, Roland J, LD, EE. Auburn
 Cowan, Dorothy P, LD, LA. Vashon Heights
 Cowell, Ray Theodore, UD, Bus. Mt. Vernon
 Cowley, Francis Craig, Unc, EE. Seattle
 Cowling, Harriet, LD, Sci. Seattle
 Cowling, Owen Stewart, LD, LA. Spokane
 Cox, Bernadine E, LD, LA. Seattle
 Cox, Clifford G, UD, Bus. Pasadena, Cal
 Cox, Gladys Mable, LD, LA. Colfax
 Cox, Herbert L, UD, Bus. Kellogg, Ida
 Craig, Charlotte E, LD, FA. Seattle
 Craig, Miriam, UD, Sci. Seattle
 Craigen, Leslie Joseph, Sp, Phar. Seattle
 Crait, Laurence Albert, LD, Bus. Seattle
 Cramer, Dwight L, LD, Phar. Centralia
 Cramlet, Clyde Myron, Grad. Seattle
 Crandell, Mildred May, LD, Ed. Seattle
 Crane, Lillian A D, LD, LA. Seattle
 Crary, Marian, LD, LA. Aberdeen
 Craven, Leonard T, LD, LA. Seattle
 Crawford, Arthur Wallace, LD, Bus. Seattle
 Crawford, Dorothy E, LD, Sci. Seattle
 Crawford, Mary, UD, LA. Ellensburg
 Crawford, Randall, Jr, 1st Law. Seattle
 Crawford, Wilhelmina UD, LA. Walla Walla
 Crawshaw, Arthur Clyde, LD, ChE. Seattle
 Creamer, Evelyn M, LD, LA. Ferndale
 Creamer, Una Lillian, LD, LA. Ferndale
 Creech, George, LD, Min. New Westminster
 Creelman, C Eleanor, LD, Sci. Vancouver, BC
 Crilly, Paul Hoover, LD, Fish. Blaine
 Crim, Dorothy Marie, LD, Ed. Seattle
 Crim, Winnifred D, LD, LA. Seattle
 Crimmins, Florence, LD, Sci. Seattle
 Crippen, Nevil B, LD, LA. Tacoma
 Crisler, Roy Hamilton, LD, Bus. Spokane
 Crisman, William Harold, LD, Bus. Seattle
 Cristman, Martha Eliza, LD, Sci. Seattle
 Criswell, Lols, UD, LA. Tacoma
 Cromble, F Walter, LD, For. Olympia
 Cronin, Nona L, LD, Bus. Butte, Mont
 Croockewit, Alex P, LD, Bus. Spokane
 Crosby, Forrest T, LD, Bus. Seattle
 Crosby, Harold William, LD, Bus. Seattle
 Crosby, Miriam, LD, Sci. Pensacola, Fla
 Cross, Robert Neal, LD, Sci. Seattle
 Crouch, D Leone, Unc, Bus. Custer, Mont
 Crow, Eva Virginia, LD, Sci. Monroe
 Crowder, Harriet, LD, Sci. Seattle
 Crowe, F Malcolm, LD, ME. Seattle
 Crumb, Joseph A, LD, Bus. Morton
 Crump, Leonard Wade, LD, EE. Tacoma
 Cruz, Jose R, LD, ME. Philippines
 Cruzen, Edward A, LD, Bus. Boise, Ida
 Cullman, Nicholas C, LD, LA. Seattle
 Culliton, J Estelle, Unc, LA. Seattle
 Culliton, John, UD, EE. Seattle
 Cultum, Gordon L, LD, EE. Tacoma
 Culver, Leda G, UD LA. Friday Harbor
 Cummings, Ardyce H, UD, Ed. Seattle
 Cunningham, Caryl Dennis, Unc, EE. Tolt
 Cunningham, Creigh, UD, LA. Everett
 Cunningham, Dorsey A, LD, Bus. Olympia
 Cunningham, John Patrick, LD, Eng. Seattle
 Currie, Donald Campbell, LD, FA. Everett
 Currie, Mary E, UD, Sci. Cashmere
 Curry, Altha Perry, Grad. Seattle
 Curtis, Frank Lewis, LD, Bus. Seattle
 Curtis, Lloyd, Unc, ChE. Houghton
 Curtis, Maurice Edward, LD, Min. Houghton
 Curtis, Stanley W, Unc, Phar. Spokane
 Curtiss, Verne E, LD, LA. Grand Dalles
 Curzon, John James, LD, Min. Seattle
 Cushman, Edward Henry, Unc, Min. Tacoma
 Cushman, Thomas J, UD, Sci. Port Blakely
 Cuthbert, William A, Sp, For Victoria, B C
 Cutter, Julia Louise, UD, Sci. Sheridan, Wyo
 Cutting, Eleanor, LD, FA. Seattle
 Cutting, Julia Winifred, LD, LA. Seattle
 Cutts, Beatrice Tyler, UD, Jour. Seattle
 Cutts, Cecilia, LD, LA. Seattle
 Cutts, Laura Louise, UD, LA. Seattle
 Dagg, Harold Morehouse, LD, Bus. Seattle
 Daggett, Annie, LD, Sci. Pt Ludlow
 Dahl, Florence, Sp, FA. Seattle
 Dahlgreen, Evelyn, LD, LA. Tacoma
 Dahlin, Ebba, Grad. Seattle
 Dahmen, Fernando, Unc, Bus. Seattle
 Daigh, Margaret L, LD, LA. Seattle
 Dailey, Erwin F, 1st Law. Seattle
 Dailey, Grace O, 1st Law. Seattle
 Dailey, Clyde Vaughan, LD, Bus. Seattle
 Dakin, Helen Maud, Unc, Bus. Seattle
 Daily, Katherine, UD, LA. Seattle
 Dalton, Arch Grant, Bus. Yakima
 Dalton, John Clarke, LD, Bus. Yakima
 Dalton, Ralph E, LD, Sci. Seattle
 Daly, Milton J, LD, EE. Ketchikan, Alaska
 Daly, William Joseph, LD, LA. Pt Townsend
 Damm, Theodore Harold, Unc, FA. Seattle
 Damm, Hans Frederick V, Eng. Spokane
 Daniel, James Leland, LD, Bus. Spokane
 Daniels, Carrie Eleanor, Unc, LA. Yakima
 Daniels, Eve, LD, Sci. Puyallup
 Daniels, Raymond Eugene, LD, ChE. Chehalis
 Danielson, Ella Theodora, UD, LA. Parkland
 Danielson, Lillian C, LD, Ed. Tacoma
 Danner, Earl Young, LD, ME. Seattle
 Daquola, Sebastian, LD, Ed. Philippines
 Dare, Earl, LD, Bus. Seattle
 Dark, Carleton Willits, LD, Bus. Seattle
 Dark, Kathryn, LD, LA. Seattle
 Darling, Irene Frances, LD, LA. South Bend
 Daubenspeck, Marian, UD, Ed. Riggins, Ida
 Daughterty, Anna M, UD, Sci. Seattle
 Daugherty, Alice Iva, LD, Ed. Seattle
 Daugherty, Frank T, Sp, Jour. Seattle
 Dautoff, Victor, UD, ChE. Portland, Or
 David, Emerson E, UD, Bus. Seattle
 Davidson, Barbara, LD, Sci. Seattle
 Davidson, Dorothy Beatrice, LD, LA. Seattle
 Davidson, Beth, UD, Sci. Seattle
 Davidson, Frank, LD, Bus. Concrete
 Davidson, Jean Edwina, LD, LA. Seattle
 Davies, Harold Cory, LD, Min. Newcastle
 Davies, Mrs M Lenore, LD, Sci. Seattle
 Davies, Pearce G, LD, LA. Seattle
 Davies, Thomas Dayton, LD, Bus. Seattle
 Davies, Violet, UD, Sci. Tacoma
 Davis, Benjamin F, LD, Bus. Farmington
 Davis, Beryl Walsh, LD, Bus. Seattle
 Davis, Caleb F, LD, ME. Seattle
 Davis, Chauncey D, LD, Bus. Hamilton
 Davis, Dorothy Carvel, LD, Sci. Seattle
 Davis, Dorothy Ethel, LD, FA. Seattle
 Davis, Dwight E, UD, Min. Pt Orchard
 Davis, Ethel, LD, LA. Seattle
 Davis, Garnet Morrell, LD, Bus. Donald
 Davis, Harriet Ella, UD, FA. Seattle
 Davis, S Kathryn, LD, Sci. Seattle
 Davis, Lols Lillian, UD, FA. Seattle

- Davis, Marjorie, LD, FA.....Boise, Ida
 Davis, Stephen Marsh, UD, Bus.....Seattle
 Davis, Mrs Martelle E, Grad.....Seattle
 Davis, Mary Aleen, UD, Sci.....Bellingham
 Davis, Mercie Irene, LD, LA.....Wapato
 Davis, Paul B, LD, EE.....Endicott
 Davis, Mrs Tomine O, UD, Bus.....Kennewick
 Davis, Ralph J, Unc, Bus.....Boise, Ida
 Davis, Ruth Magdaline UD Phar Bellingham
 Davis, Thorton J, LD, Bus. Sandpoint, Id.
 Davis, Vera, LD, LA.....Renton
 Davis, Joel Vernon, LD, Bus.....Echo, Or
 Davis, William R, LD, Bus. Gt Falls, Mont
 Davison, Elmer E, LD, Bus.....Boise, Ida
 Davison, Mary Jane, LD, Phar. Sedro Wooley
 Dawe, E L, UD, MB. New Westminster, B C
 Daws, Ethel Leota, LD, Ed.....Seattle
 Dawson, Terence Thomas, Unc, ME. Seattle
 Dawson, Vincent, Unc, LA.....Seattle
 Day, Edwin J, LD, Phar.....Yakima
 Day, Irving F, LD, EE.....Portland, Or
 Day, Leta, LD, Bus.....Seattle
 Day, Margaret E, UD, Jour.....Clarkston
 Deaderick, Kelly Dent, LD, LA. Halfway, Or
 Dean, Edward S, LD, ME.....Olympia
 Dean, George M, LD, Sci.....Lewiston, Ida
 Dean, John Ralph, Sp, Bus.....Seattle
 Dean, Josephine, LD, Bus.....Seattle
 Dean, Floyd Merlin, LD, Sci.....Bellingham
 Dean, William Paul, LD, Bus.....Seattle
 Dearle, Albert Morris, LD, Bus.....Everett
 Dearle, Katherine, Unc, LA.....Everett
 DeBard, Bernice L, LD, Ed.....Seattle
 DeBelem, Melchor, LD, Sci.....Philippines
 DeCan, Lawrence Malon, UD, ME.....Seattle
 DeChenne, Homer Ray, UD, Bus.....Hilliard
 Decoto, Henry Oliver, LD, ME.....Naches
 Deer, Gladys F, UD, LA.....Franklin, Ind
 Deets, Walter George, UD, Bus.....Almira
 De Grief, Leroy, Sp, Law.....Colville
 DeGroote, Lawrence W, LD, For.....Auburn
 DeGroote, Lloyd Henry, LD, For.....Auburn
 DeHan, Leroy Maurice, LD, Bus.....Seattle
 Deierlein, Grace Margaret, UD, LA.....Everett
 DeJong, Dowa, LD, Phar.....Lynden
 DeJoy, Esteban, Unc, LA.....Philippines
 DeKay, Chas, Unc, CE.....Wolf Pt, Mont
 Dekker, Kate, LD, Ed.....Creston
 DeLancey, Margaret, LD, Bus.....Seattle
 Delaney, Margaret Lenore, LD, FA.....Seattle
 Delapena, Valentine A, Grad.....Seattle
 Delbridge, Doris Isabel, Unc, FA.....Seattle
 DeLeon, Esteban B, LD, Sci.....Philippines
 Dempsey, Thomas, LD, ChE.....Tacoma
 Demuth, Orin Anton, LD, EE.....Seattle
 Denhoff, Sherlie P, LD, Bus.....Chehalis
 Denney, Charles Roland, UD, Law.....Everett
 Dennis, Margaret, LD, LA.....Seattle
 Denny, David Thomas, LD, Min.....Seattle
 Denny, Marion K, LD, FA.....Williston, N D
 Dent, Harold H, LD, EE.....Centralia
 Deppman, Ida F, UD, Ed.....Seattle
 DeKiemer, Robert P, LD, Sci.....Spokane
 DeRosa, Florence Marie, UD, Ed.....Tacoma
 Deslata, Robert, LD, ChE.....Portland, Or
 De Soto, Alexander, LD, LA.....Seattle
 DeSpain, Harold S, UD, For. Bridal Veil, Or
 DesRosier, Lauretta Unc, FA. Browning, Mt
 Dever, Clarence, LD, Sci.....Laclede, Ida
 Dever, Paul, LD, Bus.....Laclede, Ida
 Devers, Izora DeEtte, LD, LA.....Seattle
 Devin, Paul, LD, For.....Seattle
 Devin, William F, 1st Law.....Seattle
 Devol, Lloyd Elsworth, UD, Bus. Marietta, O
 Dewhurst, Alice Janet, LD, Ed.....Seattle
 Dexter, George Thomas, LD, ME.....Seattle
 Day, Robert, Unc, Eng.....Newton, Kas
 Dezendorf, Doris L, LD, LA.....Portland, Or
 Dick, Elma, LD, FA.....Lewiston, Ida
 Dickerson, William Eugene, UD, Bus. Seattle
 Dickey, Dorothy, Sp, Jour.....Seattle
 Dickey, Heald Frank, LD, Bus.....Seattle
 Dickinson, Charlotte L, Unc, Sci.....Dayton
 Dickinson, Dean H, 2d Law.....Portland, Or
 Dickinson, Laura C, UD, LA.....Dayton
 Dickinson, Phillip, UD, ME.....Seattle
 Dickson, Elizabeth, LD, LA.....Buffalo, NY
 Dickson, Robert Wells, LD, LA.....Portland, Or
 Dickson, Virgil Paul, 3d Law.....Omak
 Dietrichs, Theodore Arthur, Sp, EE. Seattle
 Dietz, George H, LD, Sci.....Seattle
 Dillabough, Helen E, LD, Ed.....Okanogan
 Dillon, Roll Newell, LD, Sci.....Seattle
 Dills, Lucille, LD, FA.....Seattle
 Dimock, Everett Paul, LD, ChE.....Seattle
 Dimock, Stuart Marshall, UD, CE.....Seattle
 Dimond, Lois Edith, LD, FA.....Spokane
 Dinges, Violet M, LD, Ed.....Seattle
 Dingle, Helen, UD, Bus.....Yakima
 Dingley, Lois Mabel, LD, LA.....Seattle
 Dinsmore, Stephen S, Sp, Jour.....Yakima
 Dirks, Donald Clarence, UD, Fish. Spokane
 Dittelsen, Pearl Josephine, Sp, Sci. Seattle
 Dix, Ruth Edgerton, LD, Sci.....Seattle
 Dixon, Frank N, LD, Bus. Bartlesville, Okla
 Dixon, Sydney Lawrence.....Seattle
 Doane, Albert, LD, Sci.....Seattle
 Dobie, Joe Livesley, LD, ME.....Yakima
 Dobson, Evelyn, Unc, LA.....Renton
 Dobson, George, LD, EE.....Renton
 Dobson, Thomas S, LD, Bus.....Renton
 Dodd, Hamlet Porch, 1st Law.....Wapato
 Dodd, Harry LeRoy, LD, LA.....Seattle
 Dodd, Joseph, LD, EE.....Seattle
 Dodge, Estella G, UD, For.....Portland, Or
 Doell, William D, LD, LA.....Lind
 Doheny, Harriet Josephine, UD, LA. Seattle
 Doherty, Mary Doris, LD, LA. Townsend, Mt
 Dolph, Valentine, Unc, LA.....Portland, Or
 Domalanta, F A, Unc, Sci.....Philippines
 Donahoe, Eugene Francis, LD, Bus.....Elma
 Donald, John H, LD, Sci.....Tacoma
 Donaldson, Mary Wyman, UD, LA. Seattle
 Donatelli, Pardy D, LD, Eng.....Seattle
 Donley, Eleanor F, Unc, LA.....Seattle
 Donley, Mabel, LD, FA.....Seattle
 Donovan, Florence May, Unc, Bus.....Seattle
 Donovan, W McKinley, UD, EE.....Seattle
 Donworth, Mrs Charles T, Sp, FA. Seattle
 Donworth, Mary, LD, ME.....Seattle
 Dore, Esther Agnes, UD, Ed.....Seattle
 Doremus, Della Ellen, UD, Bus.....Seattle
 Dorman, George Robert, LD, EE.....Seattle
 Dorris, Wm. Washington, LD, Bus. Seattle
 Dose, Julia Louise, LD, Bus.....Seattle
 Dost, Fred William, Sp, Bus.....Seattle
 Doty, Wayne Lanning, LD, LA.....Seattle
 Doud, Agnes Ione, Unc, Ed.....Tacoma
 Dougherty, Beryl Lee, UD, LA.....Seattle
 Dougherty, Ollie, Unc, Bus.....Seattle
 Douglas, Donald Emery, LD, Bus.....Seattle
 Douglas, Lucille, UD, FA.....Seattle
 Douthitt, Dorothy, LD, LA.....Seattle
 Douthrich, Stephen V, LD, ChE.....Spokane
 Dove, Eva M, UD, LA.....Bickleton
 Dover, Leon D, LD, Bus.....Seattle
 Dover, Wm. Barney, LD, Bus.....Seattle
 Downey, Jeanette, Sp, Sci.....Tacoma
 Downie, Paul Leonard, LD, Bus.....Seattle
 Downie, Ruth Eleanor, LD, Sci.....Seattle
 Downing, Fred T, UD, ME.....Portland, Or
 Downing, Joseph Mont, Unc, Ed.....Spokane
 Doyle, Edna May, LD, Sci.....Seattle
 Doyle, James Cyril, LD, Sci.....Everett
 Doyle, Leona Marguerite, LD, Bus.....Seattle
 Doyle, Winifred, Unc, FA. Albuquerque, N M
 Drake, Edward F, LD, EE.....Tacoma
 Drake, Helen Hazel, LD, Ed.....Portland, Or

- Drake, Mildred, LD, Ed.....Portland, Or
 Drake, Ronald R, LD, Bus.....Owensboro, Ky
 Dranga, Albert Edward, LD, Bus.....Seattle
 Draper, Charles Donald, Unc, ME.....Seattle
 Draper, George Albert, LD, ME.....Seattle
 Draper, Isabel Margaret, LD, FA.....Seattle
 Draper, Ralph Marion, Sp, ME.....Seattle
 Draves, Carl Zeno, Grad.....Seattle
 Draves, Galen B, LD, Bus.....Seattle
 Dreltzler, Ralph F, UD, For.....Suquamish
 Drentwett, Louis, LD, FA.....Seattle
 Drew, Don Russell, UD, Bus.....Seattle
 Drischel, Frank Gordon, LD, Sci.....Spokane
 Driscoll, Edwin U, LD, Bus.....Payette, Ida
 Driscoll, John Francis, LD, Bus.....Stryker, Mt
 Driskell, J Mayo, LD, ChE.....Tacoma
 Driscoll, Pearl, LD, FA, San Luis Obispo, Cal
 Drumheller, Joseph, LD, ChE.....Spokane
 Drumm, Guy R, UD, LA, Richmond Hill, N Y
 Drus, Peter P, LD, FA.....Coeur d'Alene, Ida
 Dryden, Cecil P, UD, LA.....Peck, Ida
 Duckering, Ernest R, Sp, FA.....Seattle
 Duclayan, Pedro, LD, CE.....Philippines
 Dudley, Lila A, UD, Sci.....Mullan, Ida
 Dugdale, Harold Frances, LD, Bus Seattle
 Duke, Fred Alexis, LD, LA.....Seattle
 Duley, Loren W, LD, EE.....Okanogan
 Dumett, Clem Wallace, Unc, Bus.....Seattle
 Dunbar, Della B, LD, LA.....Yakima
 Dunbar, Wayne L, LD, LA.....Polson, Mont
 Duncan, Margaret, LD, LA.....Red Bluff, Cal
 Duncan, Mrs Pansy, LD, LA.....Toppenish
 Duncan, Preston H, LD, Bus.....Seattle
 Dunlap, Harry Vincent, Sp, Law.....Spokane
 Dunn, Alice Julia, LD, LA.....Sunnyside
 Dunn, Arthur George, LD, LA.....Seattle
 Dunn, Beatrice Bernice, UD, Bus.....Waterville
 Dunn, Charles Stevens, LD, For.....Seattle
 Dunn, Edward Albert, LD, For.....Seattle
 Dunn, Frank Clyde, UD, LA.....Seattle
 Dunn, Helen Marjory, LD, Sci.....Waterville
 Dunn, John Joseph, 1st Law.....Seattle
 Dunn, Margaret Carol, LD, Ed.....Seattle
 Dunn, Mary Barloe, UNC, LA.....Seattle
 Dunn, Ruth M, LD, LA.....Seattle
 Dunphy, Helen C, LD, LA.....Walla Walla
 Dupar, Paul, LD, Bus.....Monrovia, Cal
 Dupea, Eldred B, LD, EE.....Tacoma
 Dupuis, James J, LD, Bus N. Richmond, Wis
 Durand, W Raynor, LD, Bus.....Everett
 Durkee, Mary Ellen, LD, LA.....Tacoma
 Durrwachter, Ernest J, SC, Min.....Cle-Elum
 Dustan, Laura, LD, LA.....Clarkston
 Dutton, Gladys, LD, Bus.....Seattle
 Dwyer, Kathryn Rita, Unc, LA.....Rosalia
 Dwyer, Monica Margaret, LD, Sci.....Rosalia
 Dyar, Harold A, LD, Bus.....Wendell, Ida
 Dybwad, Peter F, SC, Fish.....Seattle
 Dyer, Robert Lawton, Unc, ME.....Seattle
 Dyke, Joe, LD, LA.....Seattle
 Dysart, Ada A, LD, Sci.....Mercer Island
 Eckmann, Ansel C, Unc, Law.....Seattle
 Eckmann, Ray L, LD, Bus.....Seattle
 Eckmann, Stella R, UD, Sci.....Yakima
 Eaton, Phebe Payne, UD, Ed.....Seattle
 Edades, Victorio, LD, FA.....Philippines
 Edberg, Wendell Earl, LD, Bus.....Bellingham
 Eddy, Mrs. Erma, LD, LA.....Seattle
 Eddy, Richard Hewes, LD, For.....Yelm
 Edgell, H Hurst, LD, Sci, Bowling Green, Mo
 Edgerton, Ernest Benjamin, LD, Sci.....Seattle
 Edinger, Carter W, LD, Bus.....Dillon, Mont
 Edmeades, Willard S, LD, Sci Portland, Or
 Edmonds, Robert H G, Grad.....Seattle
 Edmundson, Viola Maye, LD, LA.....Coupeville
 Edwards, Archie Campbell, LD, Bus.....Seattle
 Edwards, Arthur C, LD, EE, Sante Fe, N M
 Edwards, Douglas, Sp, ME.....Seattle
 Edwards, Eleanor B, LD, FA.....Yelm
 Edwards, E Evangeline, LD, LA.....Seattle
 Edwards, Elizabeth Mae, LD, LA.....Seattle
 Edwards, Esther Mary, LD, Sci.....Seattle
 Edwards, Frances Oliver, LD, FA.....Seattle
 Edwards, George Washington, LD, ME Seattle
 Edwards, Charles Grant, LD, Phar.....Wilbur
 Edwards, K Pauline, Unc, LA.....Seattle
 Edwards, K Pauline, Unc, LA.....Seattle
 Edwards, Robert S, LD, Sci.....Morris, Minn
 Edwards, Thelma Lillian, UD, LA.....Seattle
 Edfinger, Hazel Vivian, LD, FA.....Seattle
 Egan, Douglas, LD, Bus.....Seattle
 Eheim, Helen Ada, LD, Phar.....Seattle
 Ehlenbeck, Adella A, Unc, Sci.....Seattle
 Ehrke, Herbert, LD, Bus.....Seattle
 Ehrlich, Dorothy O, LD, LA.....Seattle
 Ehrlich, Louise O, LD, LA.....Seattle
 Eide, Agnes Isabel, Unc, LA.....Spokane
 Elkenberry, Willa H, LD, FA.....Seattle
 Elnarsen, Arthur S, LD, Sci.....Stanwood
 Eisenhower, Earl Dewey, LD, EE, Tacoma
 Elbersson, Ruth Mae, LD, LA.....Seattle
 Eide, Dagney Marie, LD, Ed.....Mt Vernon
 Elder, Frederick, LD, Sci.....Tacoma
 Elford, Marian Alberta, LD, LA.....Seattle
 Elgin, Etta D, UD, Bus.....Okanogan
 Elias, Frank Bourns, LD, For.....Seattle
 Ellert, William Herman, Grad.....Seattle
 Ellertson, Homer K, LD, ME.....Brush Prairie
 Ellinger, Emma Louise, Unc, FA.....Seattle
 Elliott, Clarence R, LD, Bus.....Kelso
 Elliott, John Delphus, LD, Bus.....Outlook
 Elliott, Lloyd C, Unc, Eng.....Everett
 Elliott, Maxine, LD, LA.....Seattle
 Elliott, Stanley Minto, LD, LA.....Seattle
 Ellis, Charles J H, LD, FA.....Seattle
 Ellis, Coral Edythe, LD, FA.....Seattle
 Ellis, James Land, Grad.....Seattle
 Ellis, Leon H, 3d, Law.....Spokane
 Ellis, Marion Frances, LD, Bus.....Tacoma
 Ellis, Overton G, LD, Bus.....Tacoma
 Ellis, Roberta, LD, FA.....Los Angeles, Cal
 Ellison, Herbert William, LD, EE, Aberdeen
 Ellis, Marion Vaughan, LD, FA.....Bellingham
 Elvidge, Charles Earle, UD, ME.....Seattle
 Elwell, Marion Maurine, LD, FA.....Seattle
 Ely, John Carl, UD, FA9.....Seattle
 Emanuel, Ellen, LD, FA.....Seattle
 Elwell, Talmage Fletcher, LD, Bus.....Seattle
 Embree, Harold, LD, Phar.....Seattle
 Emerson, Frances M B, UD, LA.....Butte, Mt
 Emery, Marianne, LD, FA.....Abbotsford, B C
 Emme, Margaret Jessie, Unc, LA.....Seattle
 Emmons, Harold, LD, LA.....Portland, Or
 Emory, Clare T, LD, LA.....Seattle
 Emory, De Wolfe, Unc, LA.....Seattle
 Encarnacion, Fidel P, LD, ME, Philippines
 Encarnacion, Marclano, LD, Phar.....Seattle
 Enertson, Leo L, Unc, Jour.....Puyallup
 Enger, Olive May, UD, LA.....Tacoma
 Englehorn, Ruth, UD, LA.....Portland, Or
 Engleken, Rudolph, LD, Bus.....Spokane
- Eades, Gleny Newuel, LD, ME.....Dayton
 Eades, Herbert W, Sp, For.....Vancouver, B C
 Eagan, Frances Marian, UD, Ed.....Bremerton
 Eagleson, Helen Elizabeth, Grad.....Seattle
 Eagleson, Margaret E, LD, LA.....Seattle
 Earnest, Robert Roy, Unc, Ed.....Bothell
 Easterbrook, Wilfred G, LD, ChE.....Seattle
 Eastland, Walton E, LD, ME.....Portland, Or
 Eastland, Thomas F, LD, Bus.....Seattle
 Eastman, Austin V, LD, EE.....Seattle
 Eaton, Dorothy T, LD, LA.....Seattle
 Ebblewhite, Charles Harry, LD, ME, Spokane
 Ebeling, Walter Wilford, LD, Sci, Burlington
 Eckart, Hulda, LD, LA.....Seattle
 Eckart, Roland William, LD, Bus.....Seattle
 Eckert, Viva M, LD, LA.....Vancouver, B C
 Eckhart, Robert Baker, LD, Bus.....Eauclaw

English, James Daniel, LD, EE....Seattle
 Englund, Adolf B, LD, Bus.....Enumclaw
 Englund, Cecil V, UD, Bus.....Enumclaw
 Engstrom, Eva Isabel, UD, FA....Seattle
 Engstrom, Fred R, LD, Bus.Coeur d'Alene, Ida
 Enochs, Adam Harry, LD, LA.....Burton
 Ensley, Tabitha Eldora, UD, Ed....Seattle
 Epperson, Gladys Maurine, LD, FA..Seattle
 Erickson, Genevieve Laila, LD, LA..Seattle
 Erickson, Carl Wesley, UD, Bus....Seattle
 Erickson, Elisabeth Evelyn, LD, LA..Kent
 Erickson, Esther E, LD, Sci.....Aberdeen
 Erickson, Orin H, Sp, Bus..Pocatello, Ida
 Erickson, Ruth, LD, LA.....Seattle
 Erickson, Samuel T, Sp, Bus.....Orting
 Erickson, Sylvia, LD, LA.....Astoria, Or
 Erickson, William Paul, UD, Bus....Seattle
 Erland, Gladys Marie, LD, FA.....Seattle
 Ernst, Clarence R, UD, Bus.....Seattle
 Ernst, Leroy Henry, Unc, Bus.....Seattle
 Erwin, Susan C, LD, LA.....Astoria, Or
 Erz, Avis Evelyn, LD, FA.....Seattle
 Esary, James D Jr, LD, Bus.....Seattle
 Espejo, Leandro, LD, Ed.....Philippines
 Espino, Felix V, LD, ME.....Philippines
 Espino, Mariano, LD, Sci.....Philippines
 Estes, Fred Jr, LD, Sci.....Seattle
 Eates, John Frank, UD, LA.....Bow
 Eatey, M Josephine, LD, LA.....Oroville
 Ethel, Garland O, LD, LA.....Oroville
 Etherington, Thomas John, LD, ME...Elma
 Evans, Catharine Louise, UD, FA..Canby, Or
 Evans, Miller, LD, EE.....Seattle
 Everett, Blanche, LD, LA.....South Bend
 Everett, Donna Aileen, LD, Bus....Seattle
 Everett, Walter Herbert, UD, LA....Seattle
 Everly, Myra Lois, Grad.....Seattle
 Everly, Walter, Grad.....Seattle
 Ewan, Vernelle, LD, Sci.....Seattle
 Ewell, Mansfield Mac, LD, EE.....Seattle
 Ewing, Henry Clarke, LD, Bus.....Seattle
 Ewing, Lucile Elliott, LD, LA..Portland, Or
 Ewing, Margaret, LD, LA.....Portland, Or
 Eymann, Lucile, LD, Bus.....Seattle
 Fahl, Jack Bernard, LD, For..Rupert, Ida
 Fahlstrom, Marshall E, Unc, EE....Everett
 Fahlstrom, Nels F, G, SC, Min Portland, Or
 Fairbanks, Adelaide, LD, LA.....Yakima
 Fairfield, Jack W, LD, Bus..Gt Falls, Mont
 Fairservice, Harry C, LD, Bus..Clallam Bay
 Falconer, Thomas T, LD, Bus....Monroe
 Faler, Philip, LD, Bus.....Tacoma
 Falk, Joshua G, Sc, Min.....Seattle
 Falk, Winona Moore, LD, LA.....Seattle
 Falkoff, Anna Lea, Grad.....Seattle
 Fall, James D, LD, Eng...Portland, Or
 Fargo, Marion, UD, LA.....Pocatello, Ida
 Faris, William Richard, Sp, Bus....Seattle
 Farley, Helen Maria, UD, Sci.....Seattle
 Farnsworth, Ruth, UD, LA.....Lindsay, Cal
 Farquharson, F Burt, LD, ME.....Seattle
 Farrar, Robert William, LD, Jour...Seattle
 Farrell, Phil Ralph, Unc, EE.....Bellingham
 Farrell, Thomas Eugene, LD, Bus.Ellensburg
 Fast, Lisette Emery, Grad, Bus Denver, Co
 Faubert, Florentine V, LD, LA.....Shelton
 Faucett, Robert I, UD, Bus..Stanfield, Or
 Faulk, Glenn, Unc, LA.....Aberdeen
 Faulk, Theodore E, UD, LA..Stromberg, Neb
 Faulkner, Donald R, LL, Sci....Olympia
 Faulkner, Relta E, UD, FA.....Bickleton
 Favre, Emma Rakey, LD, Bus.....Seattle
 Feek, Richard James, LD, Bus.....Seattle
 Feeney, Mae Helen, LD, Ed.....Seattle
 Felch, Lewis David, LD, EE.....Ellensburg
 Felipe, Nemesio, LD, LA.....Philippines
 Fellitz, Vernita C, UD, Ed.....Seattle
 Fellow, Fred D, Grad.....Windfall, Ind
 Fellow, Helen Israel, Unc, LA.....Seattle
 Fendel, Sam Louis, LD, Bus...Portland, Or

Fenimore, Billie F, Unc, FA....Portland, Or
 Fenton, Frank L, LD, LA..Santa Rosa, Cal
 Ferguson, Russell E, LD, For..Portland, Or
 Fernyhough, Harold S, Unc, Bus....Seattle
 Feroe, Gladys, LD, LA.....Kirkland
 Ferris, Ruth Merigold, Unc, LA.....Seattle
 Ferry, Edward Payson, LD, LA....Everett
 Ferryman, Henri, LD, EE.....Wenatchee
 Fey, Lester Paul, LD, FA.....Seattle
 Ficks, Amanda Ellen, LD, Bus.....Seattle
 Fiedler, Charles A Jr, LD, Bus....Newport
 Fiedler, Reginald H, UD, Fish....Seattle
 Field, William Edmund, LD, Bus..Tacoma
 Fields, Tom Earl, LD, Bus.....Woodland
 Filion, Fred, LD, LA.....Seattle
 Filz, Mildred E, UD, Ed.....Seattle
 Finke, Mabel Lerena, LD, LA.....Seattle
 Finke, Ralph William, LD, CE.....Seattle
 Finlay, Dreda D, LD, FA.....Butte, Mont
 Finlay, Maxine, LD, Jour.....Butte, Mont
 Finley, Mildred Martha, LD, LA....Seattle
 Finn, Elmer G, LD, ME.....Prosser
 Finnegan, Patrick R, LD, Bus....Anacortes
 Finney, Ottmer T, LD, ChE.....Issaquah
 Finnicum, Ruth Claire, UD, LA....Spokane
 Fischer, Jackson Alden, LD, Bus....Seattle
 Fischer, E Doris, LD, LA.....Seattle
 Fischer, Grace, Unc, LA.....Seattle
 Fischer, Marie, LD, LA.....Seattle
 Fish, Walter Harold, UD, For..Hollywood, Cal
 Fisher, Dewey Earl, Unc, Bus..Wendell, Ida
 Fisher, Frank P, Jr, LD, Phar..Port Angeles
 Fisher, Joy Grace, UD, FA....Wallace, Ida
 Fisher, Walter Clifford, LD, Bus....Spokane
 Fisher, William Gordon, UD, Bus..Edwall
 Flisken, Daisy G, Sp, FA.....Seattle
 Flisken, Marjorie, UD, Jour.....Seattle
 Flisken, Mary Lea, Unc, LA.....Seattle
 Fitch, John Manning, LD, ME....Tacoma
 Fitterer, Helen M, Sp, FA.....Ellensburg
 Fitzgerald, Florence Marie, Unc, Bus.Seattle
 Fitzgerald, Hattie May, LD, Sci....Seattle
 Fitzgerald, John Vernon, Unc, Bus..Spokane
 Fitzpatrick, G, LD, LA.....Ellsworth, Wis
 Fitzpatrick, George W, Unc, EE.....Seattle
 Fix, Lynwood W, UD, LA.....Lewiston, Ida
 Flack, Lena, LD, LA.....Seattle
 Flanagan, James H, Unc, LA..St Paul, Minn
 Flanley, Mabel Gertrude, LD, Sci..Seattle
 Fleenor, J B, UD, Ed.....Seattle
 Fleenor, Mrs Mame, UD, LA.....Seattle
 Fleming, Bessie Jean, LD, LA.....Seattle
 Fleming, John D, LD, LA.....Butte, Mont
 Fletcher, Frances, LD, Sci.....Tacoma
 Fletcher, Gerald Robert, LD, ChE...Seattle
 Fletcher, James Henry, LD, Bus..Tacoma
 Fletcher, Winnifred, Unc, LA.....Seattle
 Flindall, Gene M, Unc, Bus.....Seattle
 Flint, Gwen Monroe, Sp, Eng....Yakima
 Flood, George Edward, UD, Bus....Seattle
 Flood, Maude E, Sp, FA.....Seattle
 Flower, Alma Josephine, UD, Sci..Bickleton
 Floyd, Lucy Lena, Unc, Sci.....Kittitas
 Floyd, Ruth, LD, Sci.....Walla Walla
 Fluett, Russel H, Sp, LA.....Butte, Mont
 Flumerfelt, Lillian, LD, Ed.....Seattle
 Flury, Faustina Grace, LD, LA.....Seattle
 Flye, Meredith Guy, LD, Bus....Tacoma
 Fogelquist, Charles F, UD, For....Selah
 Fogelquist, Floyd W, LD, For....Selah
 Foley, John Richard, LD, LA..Victor, Mont
 Foley, Leonard S, LD, EE.....Portland, Or
 Folsom, Mrs Frances L, Grad.....Seattle
 Folsom, Robert Sp, CE.....Prosser
 Foo, Yao Cheng, LD, Bus.....China
 Foote, John Herbert, LD, Bus.....Seattle
 Foote, Leone L, LD, Bus.....Chelan
 Foote, Luanda, LD, Ed.....Portland, Or
 Foran, Leo Lester, Unc, Bus.....Seattle

- Foran, William, LD, Sci.....Seattle
 Forbes, Edith, LD, LA.....Portland, Or
 Forbes, Velma Ruth, UD, Sci.....Seattle
 Ford, George B, LD, Bus.....Pomona, Cal
 Ford, Harold E, LD, Bus.....Butte, Mont
 Ford, Lorane Albert, Unc, Ed.....Bellingham
 Ford, Perry Miers, UD, ME.....Seattle
 Ford, William Field, LD, Eng.....Seattle
 Foreman, Iona, LD, Sci.....Houghton
 Forrest, Ronald Cameron, UD, Bus.....Seattle
 Forrest, Veda, UD, LA.....Bellingham
 Forsyth, Mrs Frances W, LD, LA.....Seattle
 Forward, Charles H, LD, For.....Oregon City
 Fosdick, Helen W, UD, LA.....San Diego, Cal
 Foster, Charles J, Unc, Ed.....Seattle
 Foster, Dorothy Vaughan, LD, LA.....Seattle
 Foster, Eugene B, LD, ChE.....Bellingham
 Foster, Frank K, LD, Bus.....Hillyard
 Foster, Fred Stearn, LD, Bus.....Hoquiam
 Foster, Gilbert B, UD, LA.....Spokane
 Foster, Harry E, 2d Law.....Seattle
 Foster, Olive R, Grad.....Denver, Col
 Foster, Philip Robert, LD, Bus.....Coviche
 Foster, Waco Texas, LD, LA.....Seattle
 Foulke, Homes, Unc, LA.....Cory, Ind
 Fouts, John M, LD, LA.....Seattle
 Fouts, Marie, UD, Ed.....Seattle
 Foyler, Edna Elizabeth, LD, FA.....Seattle
 Fowler, Frances, LD, LA.....Seattle
 Fowler, Frederick C Jr, LD, LA.....Seattle
 Fox, Edna, UD, LA.....Seattle
 Fox, Fay, LD, Phar.....Seattle
 Foye, Mary Ellen, Sp, Sci.....Monroe
 Frahm, Lawrence W, LD, EE.....Seattle
 Frame, Howard A, LD, Bus.....Talent, Or
 Frame, Angel, LD, LA.....Philippines
 France, Madgil A, Unc, LA.....Montesano
 France, Rolland G, LD, Bus.....Montesano
 Francis, Annie E, LD, Sci.....Pateros
 Francis, Byron Franklin, LD, Sci.....Seattle
 Franck, Thomas George, UD, Bus.....Spokane
 Frank, Bertha, Unc, LA.....Grotan, S D
 Frankel, Ida Thelma, LD, LA.....Seattle
 Frankenfield, L, Grad.....Los Angeles, Cal
 Frankland, Chas F, LD, Bus.....Seattle
 Franklin, Charles H, LD, Eng.....Seattle
 Franklin, Martha, LD, Jour.....Seattle
 Franklin, Shadrach R, LD, Bus.....Seattle
 Fraser, Edmund S, LD, Bus.....Ontario, Or
 Frazier, Enid A, UD, LA.....Pocatello, Ida
 Frazier, George Gordon, LD, ME.....Seattle
 Frazier, Irma, Unc, LA.....Tacoma
 Frazier, Lewis R, UD, LA.....Pocatello, Ida
 Fredlund, Reynold, LD, EE.....Seattle
 Frederickson, Albert P, LD, Bus.....Seattle
 Free, Alonzo K, LD, ME.....Tacoma
 Freeman, Vivienne C, LD, LA.....Seattle
 Freidenrich, Harold I, LD, Bus.....Spokane
 Frein, Alice Virginia, UD, LA.....Seattle
 Frein, Horace H, UD, Bus.....Seattle
 French, Archie W, Sp, Bus.....Seattle
 French, Graham Malcolm, LD, FA.....Seattle
 French, Jasper J, LD, For.....Spokane
 French, Mahelle C, LD, Bus.....Seattle
 Frew, Donald Victor, LD, Sci.....Seattle
 Freyd, Greta, LD, LA.....Seattle
 Friberg, Louis W, LD, CE.....Portland, Or
 Friberg, Beatrice E, LD, Sci.....Seattle
 Fricke, Wesley Vernon, Unc, Bus.....Dayton
 Fried, Bertha Louise, Unc, FA.....Seattle
 Friedman, Samuel, LD, Bus.....Seattle
 Friend, Irma Leonne, LD, LA.....Seattle
 Friese, Ernestine, LD, Sci.....Snohomish
 Friese, Fran Henry, LD, Bus.....Snohomish
 Froude, Chester W, LD, Bus.....Portland, Or
 Fry, Bert Elwood, LD, Bus.....Seattle
 Fry, Don W, UD, Bus.....Anacortes
 Fry, Paul D, LD, LA.....Prosser
 Frye, Caxmen Unc, FA.....Seattle
 Frye, Else M, UD, Sci.....Seattle
- Fryer, Carl Elwood, Sp, ME.....Seattle
 Fulton, Amasa Eugene, LD, FA.....Ellensburg
 Fulton, Grace, UD, Sci.....Asotin
 Fulton, Helen Louise, UD, Sci.....Corvallis, Or
 Fulton, James Roy, UD, Sci.....Bremerton
 Fulton, Lois Mildred, LD, FA.....Asotin
 Fulton, Merdo Lee, Unc, Eng.....Ellensburg
 Funakush, Frank K, LD, EE.....Portland, Or
 Furber, George C, 2d Law.....Seattle
 Furgeson, Paul Fred, LD, LA.....Sumner
 Fursman, Oliver C, LD, ChE.....Seattle
 Furuye, William N, LD, Bus.....Seattle
 Fuson, Rose Pearl, LD, Bus.....Kalispell, Mont.
 Fussell, Carroll W, LD, LA.....Webster, Fla.
- Gaa, Jose, LD, Bus.....Philippines
 Gaffney, John H, LD, Bus.....Seattle
 Gahringer, John Edward, LD, Sci.....Wenatchee
 Galdick, George Harold, LD, Bus.....Seattle
 Galbraith, Harriet, LD, Sci.....Burnaby, B C
 Galbraith, Mary, LD, Sci.....Burnaby, B C
 Galeno, Eugene, LD, ChE.....Seattle
 Gallagher, Jas O, LD, LA.....Birmingham, Ala
 Galligan, Glendon, LD, Sci.....Everett
 Gambee, Elizabeth R, LD, FA.....Seattle
 Gambill, Thomas J, Grad.....Seattle
 Gambill, Cyril Howard, Unc, Bus.....Brewster
 Gamble, Mary Louise, LD, Bus.....Yakima
 Gamna, Irvin W O, Grad.....Watertown, Wis
 Gammon, Francis Dean, Unc, ME.....Tacoma
 Gammpp, Irene Charlotte, LD, Phar.....Seattle
 Gamwell, Gardner McC, LD, For.....Seattle
 Gander, MacLean T, LD, Bus.....Bellingham
 Ganders, Harry Stanley, Grad.....Seattle
 Ganders, Joseph James, LD, Sci.....Seattle
 Ganger, Herbert A, LD, Bus.....Edwall
 Gardner, Horace, LD, Bus.....Fruitland, Ida
 Gardner, Jack R, LD, LA.....Ft Madison, Ia
 Gardner, Osborne, LD, LA.....Nisqually
 Garin, Rene Gustave Sp, For.....Seattle
 Garred, Max F, LD, LA.....Coulee City
 Garred, Ward K, LD, Bus.....Coulee City
 Garrett, Eugene A, LD, LA.....Seattle
 Garretson, Helen, LD, LA.....Yakima
 Garrison, Lorine May, LD, Bus.....Sumas
 Garrison, Rupert, LD, Min.....Seattle
 Garrett, Jane (Mrs), Grad.....Seattle
 Gaskill, Ben, Jour.....Coupeville
 Gasser, William, Sp, Bus.....Seattle
 Gaston, Dorothy Ruth, LD, LA.....Seattle
 Gatewood, Joseph Strong, UD, CE.....Seattle
 Gathings, Walter William, Sp, Bus.....Seattle
 Geer, Bernice Lura, LD, Sci.....Seattle
 Gehlen, Vincent B, LD, Bus.....Ellensburg
 Geijsbeek, Samuel Henry, LD, EE.....Seattle
 Geisness, Evelyn, LD, LA.....Port Angeles
 Geist, Marian Eva, LD, LA.....Pasco
 Gellatly, Bernice I, UD, FA.....Wenatchee
 Gellermann, Mrs. William, UD, LA.....Seattle
 Gellermann, Louis Wanger, LD, LA.....Seattle
 Gellermann, William Sp, LA.....Seattle
 Gemmel, Winifred Unc, LA.....Seattle
 Geoghengan, John Herbert, LD, LA.....Seattle
 George, William S, LD, Jour.....Butte, Mont
 Gerbel, Arthur R T Jr, LD, Bus.....Seattle
 Gerboth, Marten Albert, LD, Sci.....Seattle
 Geri, Helen Lucretia, LD, FA.....Bellingham
 German, Cornelio, Unc, EE.....Philippines
 Germaey, Louise, LD, LA.....Seattle
 Gerow, Douglas Rowland, LD, LA.....Chinook
 Gerriets, Eva Alice, UD, LA.....Mt Vernon
 Gerry, Robert Jr, LD, Bus.....Seattle
 Getchell, Eleanor A, Unc, LA.....Seattle
 Getchell, Frances Susan, Unc, LA.....Seattle
 Ghiselin, Alexander D Jr, LD, Sci.....Spokane
 Ghiselin, Mrs. Marjorie A Sp, LA.....Spokane
 Gibney, Earl R, LD, Bus.....Vancouver, Wn
 Gibney, Eugene L, UD, EE.....Seattle
 Gibney, Margaret L, Unc, FA.....Seattle

Gibson, Blaine C, UD, Bus.....Nyssa, Or
 Gibson, Cora Eleanor, UD, Ed.....Seattle
 Gibson, Frederick O, LD, LA.....Davenport
 Gibson, Merrill G, LD, Bus.....Newberg, Or
 Gibson, Mildred F, LD, FA.....Seattle
 Giles, Nettie, Sp, LA.....Seattle
 Giesey, May Hulda, LD, LA.....Menlo
 Gilbert, Fay, LD, Sci.....Hoquiam
 Gilbert, Geraldine, UD, Phar.....Seattle
 Gilbert, Horace N, LD, LA.....Yakima
 Gilbert, Katherine E, LD, FA.....Seattle
 Gilbert, Margaret G, UD, LA.....Yakima
 Gilbert, M Margery, LD, LA.....Astoria, Or
 Gilbert, J Warren, 3d Law.....El Reno, Okla
 Gilbreath, Donald Dennis, LD, Bus.....Seattle
 Gilchrist, M Virginia, UD, Bus.....Seattle
 Giles, Walter Woodson, LD, FA.....Seattle
 Gilham, Freda Elvina Unc, Bus.....Renton
 Gilkey, Ruth Overton, LD, LA.....Seattle
 Gilkey, William E, Unc, ME.....Anacortes
 Gill, Margaret S, UD, Lib.....Vancouver, B C
 Gill, Marshall Walter, UD, FA.....Seattle
 Gilley, Beth M, UD, Bus.....Stony Creek, Conn
 Gilliland, William L, Grad.....Harrington
 Gillis, Constance Mary, LD, LA.....Spokane
 Gillman, Ethel Miriam, LD, LA.....Spokane
 Giluly, James, UD, Sci.....Seattle
 Gilmore, Reba June, LD, FA.....Seattle
 Gilroy, Helen Elizabeth, LD, Bus.....Seattle
 Gingrich, Pearl, LD, LA.....Olympia
 Girard, Joseph Eugene, LD, Bus.....Seattle
 Gisselberg, Victor E, LD, Min.....Mist, Or
 Gittelsohn, Jacob, UD, Bus.....Savannah, Ga
 Gitzen, Walter H, LD, EE.....Seattle
 Glus, Herman, LD, Bus.....Seattle
 Given, Pauline, LD, LA.....Seattle
 Givens, Arden, LD, Bus.....Chehalis
 Glaeser, Oscar Arthur, UD, Min.....Marrette
 Glass, John Francis, LD, Sci.....Seattle
 Glass, James MacNat, LD, Eng.....Seattle
 Glavin, Merle, LD, LA.....Twin Falls, Ida
 Gleason, Roger Wendell, LD, ME.....Seattle
 Glead, Thos F, LD, Bus.....Bonners Ferry, Ida
 Gleeson, Chas J Unc, Jour.....Butte, Mont
 Gleeson, Frank P, LD, Bus.....Butte, Mont
 Gleeson, Harold Martin, LD, Sci.....Spokane
 Glen, Harold V, UD, Fish.....Seattle
 Glen, Irving Philip, LD, Fish.....Seattle
 Glenn, Marlow, LD, Bus.....Seattle
 Glickden, Joseph H, UD, CE.....Ellensburg
 Glover, Marguerite J, LD, FA.....Seattle
 Gloyd, Mrs. Evadna G, LD, LA.....Seattle
 Glynn, William Bragdon, LD, FA.....Seattle
 Goble, Lucy E, UD, Bus.....Sunnyside
 Godefroy, William Henri, LD, Bus.....Spokane
 Goff, Maude Josephine, Grad.....Seattle
 Goldensmith, Russel V, LD, CE.....Wallace, Ida
 Goldman, Erwin F, Unc, Bus.....Seattle
 Goldman, Jack, LD, Bus.....Seattle
 Gollightly, George Unc, Bus.....Seattle
 Gologoyo, Vincente, LD, EE.....Philippines
 Good, Ernest Harold Unc, LA.....Mt Vernon
 Good, Josephine, UD, LA.....Sumner
 Good, Myrtle, UD, Bus.....Mt Vernon
 Goodfellow, Malcolm, LD, Bus.....Seattle
 Goodlick, Esther, Unc, FA.....Seattle
 Goodheart, M Katherine, UD, Bus.....Bellingham
 Goodman, Emma Unc, Bus.....Bellingham
 Goodman, Frank, LD, Sci.....Seattle
 Goodman, Ruth May, LD, Bus.....Seattle
 Goodner, Ernest Francis, Grad.....Seattle
 Goodrich, Ralph E, LD, ChE.....Bellingham
 Goodspeed, Harry Bancroft Sp, Bus.....Spokane
 Goodwin, Frank S, LD, LA.....Seattle
 Goodwin, Lang Miller, LD, EE.....Gresham, Or
 Goodwin, Louise, LD, LA.....Seattle
 Goodwin, Olive Irene, LD, FA.....Pt Angeles
 Goold, Clarissa L, UD, Lib.....Tacoma
 Goold, Howard Ralph, Grad.....Tacoma
 Gore, Thomas Mitchell, Sc, Min.....Seattle

Gortouitzky, Maurice, LD, EE.....Seattle
 Gordon, David Lowry, LD, ChE.....Seattle
 Gordon, Douglas Deway, LD, ChE.....Seattle
 Gordon, Harold Ford, LD, Bus.....Trall, B C
 Gordon, Johanna Marie, LD, LA.....Seattle
 Gorham, Marguerite, LD, LA.....Seattle
 Gorst, Howard Irving, LD, CE.....Seattle
 Gorton, Arthur C, Sp, Sci.....College Place
 Gose, John Newton, LD, EE.....Dixie
 Gose, Thomas P Jr., LD, LA.....Walla Walla
 Gose, Vera, LD, LA.....Walla Walla
 Goss, Ray Unc, CE.....Montesano
 Gosslee, Ned M, LD, Phar.....Seattle
 Gottstein, Burton, LD, Bus.....Seattle
 Gottstein, Pauline Frances, LD, LA.....Seattle
 Gould, Beatrice Avita, LD, FA.....Seattle
 Gould, Joel Francis, LD, Bus.....Seattle
 Gowen, Felicia Joyce, LD, LA.....Seattle
 Gowran, Dawn Vivian, UD, LA.....Seattle
 Graefe, Herbert Wm, LD, Bus.....Seattle
 Graff, Edward A, LD, ME.....Seattle
 Grafton, Arthur E, Unc, Bus.....Tacoma
 Graham, Charlotte, LD, Ed.....Mt Vernon
 Graham, Edmond E, LD, Bus.....Seattle
 Graham, Esther Kellner, LD, LA.....Seattle
 Graham, Glennis M, LD, Sci.....Cheyenne, Wyo
 Graham, Gordon C, LD, Bus.....Chicago, Ill
 Graham, Kenneth T, LD, Eng.....Seattle
 Graham, Helen E, LD, LA.....Ottumwa, Ia
 Graham, Lorenz, LD, EE.....Seattle
 Graham, Marie Edna, UD, LA.....Yakima
 Graham, Robert L Sp, Phar.....Bellingham
 Graham, Rozella, LD, LA.....Seattle
 Graham, Wayne Edw, Unc, ME.....Bellingham
 Graham, Wilda Sp, Sci.....Seattle
 Granis, Grace Lillian Unc, LA.....Seattle
 Granstrand, Elmer W, UD, FA.....Walla Walla
 Grant, Alan Gordon, LD, Bus.....Seattle
 Grant, Allyn Parsons, LD, Bus.....Seattle
 Grant, Clara Genevieve, LD, FA.....Seattle
 Grant, Donald F, LD, CE.....Seattle
 Grant, Eugene, LD, LA.....Seattle
 Grant, Gary G, UD, ChE.....Seattle
 Grant, Hugh McKay, Sp, FA.....Yakima
 Grant, James Sp, LA.....Seattle
 Grant, Margaret, LD, LA.....Wrangell, Alaska
 Grant, Muriel Unc, Lib.....Victoria, B C
 Grant, Thomas Selby, 2d Law.....Seattle
 Grant, Wilfred L, Unc, LA.....Seattle
 Graves, Francis D, LD, Bus.....Bellingham
 Graves, Jess Albert, Sp, FA.....Sunnyside
 Graves, Harding Dexter, LD, For.....Seattle
 Graves, Herschel D, LD, CE.....Seattle
 Graves, Lucile, LD, Sci.....Seattle
 Graves, Lucius E, LD, Bus.....Seattle
 Graves, Mary Emily, Unc, Sci.....Seattle
 Graves, Paul Hyde, 3d Law.....Spokane
 Graves, Ralph Alonzo Unc, Law.....Seattle
 Gray, Mrs. Beatrice W, LD, LA.....Seattle
 Gray, Helen Herbert, LD, Bus.....Chimacum
 Gray, Josephine, UD, Ed.....Arlington
 Gray, Lucile E, LD, Ed.....Seattle
 Gray, Max Leslie, LD, EE.....Seattle
 Gray, Millington E, LD, Sci.....Seattle
 Gray, Ruth Marie, LD, LA.....Seattle
 Gray, Wendella, LD, LA.....Grand Rapids, Minn
 Graybill, Anita Joan, LD, LA.....Tacoma
 Grebe, Louisa Edith, UD, LA.....Spokane
 Green, Agnes Naomi, Unc, Ed.....Seattle
 Green, Clarence C, LD, LA.....San Francisco, Cal
 Green, Clifton D, LD, Bus.....Sheridan, Wyo
 Green, Elmer Harold Unc, Bus.....Seattle
 Green, Floyd Cecil, LD, LA.....Tolt
 Green, Lester Charles, LD, FA.....Seattle
 Green, Theodore, LD, LA.....Seattle
 Green, Robert Ernest Unc, Bus.....Spokane
 Green, Stanley Harold Sp, Bus.....Seattle
 Greene, Florence M, LD, LA.....Portland, Or
 Greene, Willard J, LD, Eng.....Seattle
 Greenbank, Herbert Archer, LD, LA.....Seattle

Greenbank, Paul Raymer, LD, LA...Seattle
 Greenblatt, Ruby E. LD, LA...Seattle
 Greene, Hamilton Leach, LD, LA...Seattle
 Greene, James Martin, LD, Bus...Seattle
 Greenleaf, Joseph Tucker, LD, Bus...Seattle
 Greenlee, John F. LD, Bus...Boise, Ida
 Greenough, Roger Wm. LD, Bus...Spokane
 Greenwood, Lucile, Jour...Bellingham
 Gregg, Hester Carroll, LD, Bus...Chehalis
 Gregg, Ralph, UD, Sci...Coulee City
 Gregory, Catherine Unc, LA...Seattle
 Gregson, Judith, UD, Ed...Aberdeen
 Greider, Hallock F. LD, Bus...Coeber
 Greig, Elizabeth H. LD, Bus...Tacoma
 Greig, John Whittier, UD, EE...Bremerton
 Grewell, Vera E. LD, FA...Seattle
 Gribble, Frederick C. LD, LA...Seattle
 Griffen, Leah, LD, Sci...Seattle
 Griffin, Marcia Aleta, LD, Ed...Seattle
 Griffin, Robert Wetzel, UD, Bus...Astoria, Or
 Griffith, Charles H. Sp. Eng...Bremerton
 Griffiths, Lois Wilfred, UD, Sci...Seattle
 Griffiths, Stanley S (Mrs), Unc, LA...Seattle
 Griggs, Alexander, LD, Bus...Seattle
 Grimes, Margaret P. LD, Sci...Tacoma
 Grimshaw, Jean, UD, Sci...Anaconda, Mont
 Grism, Elizabeth, LD, Sci...Auburn
 Griswold, Francis West, LD, LA...Bellingham
 Groat, Mrs. Elva Belle Grad...Ferneliff
 Groce, Chas. Ernest Unc, LA...Kelso
 Grogan, William Ward, LD, For...Ames, Ia
 Gross, Clara Regina, Grad...Baltimore, Md
 Grossen, Matilda F. UD, LA...Hillsboro, Or
 Groth, Joyce, LD, LA...Seattle
 Guerin, Harriet, LD, Sci...Seattle
 Guilchon, Alfred L. LD, EE...Ladner, B C
 Gullford, Madeline, LD, LA...Westport
 Guillen, Filemon, Unc, Ed...Philippines
 Gullikson, Clarence A. LD, Eng...Seattle
 Guinn, Burrows, LD, Phar...Goldendale
 Gulliver, Ida Mae, LD, Sci...Seattle
 Gundlach, Ralph H. LD, LA...Wallace, Ida
 Gunlach, Wilford R. LD, LA...Seattle
 Gunn, Elizabeth, LD, Sci...Seattle
 Gunn, Thomas R. Grad...Seattle
 Gunnerson, Ellen I. Unc, FA...Seattle
 Gunston, George Tilley, LD, Bus...Tacoma
 Gustke, Arthur Carl Sp, Bus...Spokane
 Gustafson, Walter Tage, LD, EE...Seattle
 Gustavson, Emil G. LD, Bus...Seattle
 Guthrie, Iris B. LD, LA...Twin Falls, Ida
 Gutmann, Addis, LD, Bus...Seattle
 Guyst, Paul, UD, Ed...Seattle
 Gwilym, Herald, LD, EE...Seattle
 Gyde, Sally R. UD, LA...Wallace, Ida

Haack, David, LD, Bus...Seattle
 Haas, Olive Warner, Unc, FA...Gibson, Mont
 Haas, Selma, UD, Phar...Weiser, Ida
 Haas, Russell, LD, FA...Weiser, Ida
 Hackett, Marion, LD, FA...Walla Walla
 Haffen, John Edwin, LD, LA...New York, NY
 Hagen, Richard Otto, LD, EE...Seattle
 Hager, Dorothy, Unc, Sci...Vancouver, B C
 Hager, Morton Frank, Sp, Bus...Portland, Or
 Hagerman, Harle, LD, LA...Mandon, N D
 Haggert, Dorothy Gene, LD, LA...Seattle
 Hogler, Lawrence E. UD, Bus...Yakima
 Hague, Sigmund, LD, Phar...Livingston, Mont
 Hahl, Lydia Augusta, LD, Phar...Everett
 Hahn, Carl A. LD, EE...Seattle
 Halmer, Olive Margaret, UD, Sci...Spokane
 Halmo, Myron B. LD, Bus...Portland, Or
 Haines, Fred Smith, UD, Eng...Kila, Mont
 Halre, Thyl L. Unc, Bus...Seattle
 Halberg, Evar Alfred, Sp, Bus...Port Angeles
 Halberstadt, Elizabeth H. Unc, LA...Seattle
 Hale, William, LD, Bus...Bickleton
 Hale, Harry, LD, ChE...Seattle

Hale, Ruth Ellnor, LD, LA...Seattle
 Haleston, Chris, LD, Phar...Camas
 Haley, Dorothy E. LD, LA...Juneau, Alaska
 Haley, Herbert Huntington, LD, CE...Seattle
 Hale, Lief Oscar, LD, Bus...Puyallup
 Haley, Leon, UD, Bus...Seattle
 Haley, Louisa, UD, Sci...Seattle
 Hall, Albert Lyle, LD, Bus...Seattle
 Hall, Amy Violet, Grad...Vancouver, B C
 Hall, Dessie Alice, LD, FA...Seattle
 Hall, Edward Barton, Sp, Jour...Tacoma
 Hall, Edward, LD, ChE...Boise, Ida
 Hall, James R. LD, Bus...Gardiner, Mont
 Hall, Jeff M. UD, Bus...Sherman, Tex
 Hall, Mabel Martha, UD, LA...Seattle
 Hall, O Ingal Jr., LD, CE...Seattle
 Hall, Robert C B. Unc, Ed...Montesano
 Hall, Robert Worthing, LD, Bus...Seattle
 Hall, Russell G. LD, Bus...Seattle
 Hall, Vernon Knight, LD, Sci...Vancouver, B C
 Hall, Vesper Trevor, LD, Ed...Seattle
 Hall, Wayne Lee, LD, Bus...Spokane
 Hallgren, Beatrice, LD, Bus...Seattle
 Hallgren, Howard Lincoln, LD, Bus...Seattle
 Hallowell, Lionel E. UD, Bus...Roundup, Mont
 Halverson, Leonard A. Sp, Bus...Seattle
 Halverson, Clarence R. Unc, Phar...Custer
 Halverson, Edwin Oscar, Unc, Bus...Custer
 Halverson, Florence, LD, Sci...Kennewick
 Halverson, Helma Marvin, LD, Bus...Custer
 Hamada, Fred I. Unc, Bus...Seattle
 Hamel, Herbert, LD, FA...Bremerton
 Hamerly, Laurence R. LD, EE...Seattle
 Hamill, Margaret M. UD, Bus...Seattle
 Hamilton, Clark A. UD, Bus...Weiser, Ida
 Hamilton, R Clyde, LD, Bus...Seattle
 Hamilton, Dorothy, LD, Bus...Weiser, Ida
 Hamilton, Edna Victoria, LD, Bus...Tacoma
 Hamilton, Ethel Jean, LD, FA...Seattle
 Hamilton, Jas B. UD, CE...Seattle
 Hamilton, Marjorie L. UD, Sci...Weiser, Ida
 Hamilton, Rachel E. Grad...Umatilla, Or
 Hamilton, Rupert Lehn, UD, LA...Seattle
 Hamley, Gladys Jean, UD, LA...Pendleton, Or
 Hamlin, Phyllis Kathryn, UD, LA...Seattle
 Hammarberg, Agnes E. Grad...Seattle
 Hammer, Arnold F. Unc, Law...Spokane
 Hammer, Joyce, LD, LA...Sedro-Wooley
 Hammerlin, Roy Nels, LD, LA...Tacoma
 Hammond, Allen Odell, Grad...Seattle
 Hammond, Lester C. Unc, Sci...Seattle
 Hampson, Floyd, Unc, Bus...Seattle
 Handley, James W. LD, Bus...Hazelwood
 Handke, Goldie, LD, Bus...Seattle
 Haner, Victor, LD, CE...Wichersham
 Hanifen, James Lloyd, LD, Bus...Spokane
 Hankinson, Helen A. LD, LA...Moscow, Ida
 Hanify, Mabel V. Sp, Sci...Chehalis
 Hanna, Helen, Unc, Bus...Seattle
 Hanna, Mrs. Idella M. LD, LA...Edmonds
 Hansard, Bernard, LD, EE...McMinnville, Or
 Hansen, Carlyle, LD, Bus...Rose Lake, Ida
 Hansen, Emanuel, LD, Eng...Woodinville
 Hansen, Hannah Amolia, LD, Bus...Tacoma
 Hansen, Harry F. LD, Bus...Bellingham
 Hansen, Hilda, LD, FA...Puyallup
 Hansen, Lester K. LD, Eng...Renton
 Hansen, Ted A. N, LD, CE...Missoula, Mont
 Hansen, Thorwald A. Unc, ME...Snahomish
 Hansen, Reese D. LD, CE...Spokane
 Hansen, Viola, UD, Lib...Seattle
 Hanson, Bonnie Bessie, LD, Bus...Seattle
 Hanson, Emma Marie, Unc, FA...Uehling, Neb
 Hanson, Esther Annette, LD, LA...Seattle
 Hanson, Evadna, LD, Sci...Everett
 Hanson, Henry Ernest, LD, EE...Seattle
 Hanson, Marion Fay, UD, Bus...Seattle
 Hanson, Rainhardt S. LD, Bus...Bellingham
 Hanson, Russell Martin, LD, Bus...Bellingham
 Harada, Matsuro, LD, LA...Japan

Harbaugh, Charles W, UD, Bus.....	Hauschildt, Frank, LD, Bus.....	Seattle
..... Sedro-Woolley	Havennan, Albert, Unc, CE.....	Kent
Hardeman, Russell, LD, LA.....	Haverkamp, Delmar B, LD, Bus.....	Tacoma
Hardie, James Rogers, UD, Sci.....	Hawkins, Edward Kean, Unc, EE.....	Seattle
Harding, Bessie Irene, LD, FA.....	Hawkins, Harry Harlan, UD, CE.....	Seattle
Harding, Louretta, Unc, FA.....	Hawkins, W Lewis, LD, LA.....	Bellingham
Harding, Merwin C, LD, Bus.....	Hawkins, Natalie, LD, LA.....	Seattle
Hare, Madge Boyne, LD, LA.....	Hawkins, Robert A, Unc, Bus.....	Iwaco
Harford, Raymond, LD, Sci.....	Hawkins, Russell Jr., Unc, For. Ray City, Or	
Haritonoff, Samal K, UD, CE.....	Hawkins, J Walter, LD, EE.....	Mt. Vernon
Harkness, Arthur E, LD, Bus.....	Hawley, Clarence B, LD, ChE.....	Seattle
Harkness, Charles Robert, LD, Sci.....	Hawley, Dwight S, Sp, Bus.....	Seattle
Harley, Laura P (Mrs), Sp, Bus.....	Hawley, Lyle Trace, UD, Min.....	Seattle
Harlow, Francis H, Unc, ChE.....	Haworth, Elizabeth, LD, Sci.....	Seattle
Harm, Frank Donald, LD, Bus.....	Hay, Larry, LD, Bus.....	Sunnyside
Harnan, Helen Amber, UD, FA.....	Hay, Ray Hamilton, LD, Bus.....	Seattle
Harmon, Ingrid Louise, LD, Sci.....	Hayashi, Shigeda, UD, Bus.....	Osaka, Japan
Harmon, Irene Clara, Unc, FA.....	Hayden, Chauncey Reed, Sp, Bus.....	Seattle
Harn, Elizabeth, Unc, FA.....	Hayden, Henry Jr., LD, EE.....	Port Townsend
Harney, Eugene Edward, Unc, Bus.....	Hayden, Mary Dyer, Unc, LA.....	Seattle
Harnish, Margaret Alice, LD, LA.....	Hayden, Maxwell Cady, LD, For.....	Tacoma
Harold, Thelma, LD, FA.....	Haye, Chester William, LD, Bus.....	Spokane
Harper, Clarence P, LD, Bus.....	Hayes, Arlie Ben, LD, Bus.....	Grandview
Harper, Elbert Lewis, LD, Bus.....	Haynes, C Hanford, Unc, ME.....	Seattle
Harper, Paul Albert, LD, CE.....	Haynes, Charles Delano, LD, LA.....	Seattle
Harrington, Bernard J, LD, Bus.....	Haynes, Justin, LD, Bus.....	Seattle
Harrington, Florence, UD, LA.....	Haynes, Phyllis, LD, FA.....	Seattle
Harris, Alden Clarke, LD, Bus.....	Haynes, Stephen B, Unc, LA.....	Seattle
Harris, Benjamin Edward, LD, LA.....	Hayward, H D, UD, For.....	Ridgewood, N J
Harris, Benj, LD, Sci.....	Hayward, Mary, Unc, Bus.....	Walla Walla
Harris, Charles Leonard, 1st Law.....	Hazen, Claris Madalyn, LD, Ed.....	Seattle
Harris, Donald Silver, UD, LA.....	Hazleton, Olga Jane, LD, Sci.....	Spokane
Harris, Edna Prince, LD, Bus.....	Heacock, Jerald J, Sp, EE.....	Wenatchee
Harris, Edw W, LD, Bus.....	Heacock, Ward James, UD, EE.....	Seattle
Harris, Florence S, LD, Ed.....	Healy, Timothy, Unc, LA.....	Bellingham
Harris, O Frederick, LD, FA.....	Healy, Warren, LD, Sci.....	Seattle
Harris, George C, Sp, Bus.....	Heath, Dorothy Marian, LD, Bus.....	Yakima
Harris, C Hinman, LD, Bus.....	Heath, Fred Twicheel, UD, Min.....	Tacoma
Harris, Mary Prince, LD, LA.....	Heathman, Carl Melvin, LD, Bus.....	Hartline
Harris, Parker C, LD, Bus.....	Hebert, Marian Grad.....	Three Forks, Mont
Harris, Ralph H, LD, For.....	Hedding, Esther Mary, Unc, Sci.....	Entiat
Harris, Robert Gerald, LD, ME.....	Hedricks, Paul H, UD, LA.....	Seattle
Harris, Sarah Eleanor, UD, Bus.....	Hedwall, Edward, LD, Fish.....	Seattle
Harris, Violet Elizabeth, LD, Sci.....	Heermans, Donald, UD, LA.....	Olympia
Harrison, Everett F, LD, LA.....	Hegewald, Wilhelmina, Unc, Sci.....	Mt Vernon
Harrison, Frances, LD, LA.....	Heilmann, J S, Unc, EE.....	San Francisco, Cal
Harsch, Alfred Elmer, UD, Bus.....	Helly, Margaret, Unc, Ed.....	Spokane
Harschberger, Frank McC, LD, Sci.....	Helly, Raymond C, LD, Bus.....	Spokane
Harschberger, Robert P, LD, Min.....	Helly, Robert, LD, Bus.....	Spokane
Harstad, Ingvald T, UD, Min.....	Heinrich, Ruth V, LD, F.....	Portland, Or
Hart, Arlie Lee G, UD, LA.....	Heintz, Wallace P, UD, EE.....	Yakima
Hart, Lou Ella, LD, LA.....	Heiser, Leo Conrad, Sp, Bus.....	Howard, S D
Hart, Mildred Stanley, Unc, FA.....	Heitzman, John H, Sp, LA.....	Palouse
Hartge, Lena Armstrong, Grad.....	Hekel, Norris, LD, Sci.....	Independence, Ia
Harting, Raymond Dallas, LD, ChE.....	Hellens, Lawrence, LD, Bus.....	Seattle
Hartman, George Howard, LD, Bus.....	Helmich, Leone, UD, LA.....	Yakima
Hartman, Lou William, LD, Phar.....	Helmich, Merle, UD, Sci.....	Yakima
Hartman, Ward M, Unc, Bus.....	Hemphill, Harriet, LD, FA.....	Seattle
Hartung, Olive May, Unc, LA.....	Henderlite, Claude V, UD, LA.....	Seattle
Harvey, Allan Sawyer, LD, EE.....	Henderson, Bernice, Unc LA	Hot Spring Ark
Harvey, Beatrice, LD, Ed.....	Henderson, Glenn W, LD, Phar.....	Seattle
Harvey, Earle A, LD, Sci.....	Henderson, Lin, LD, Bu.....	Bellingham
Harvey, Helen, UD, LA.....	Henderson, Margaret V, LD, Bus.....	Hoquiam
Harvey, Joanna C, LD, Bus.....	Hendricks, Ruth Gladys, LD, Sci.....	Seattle
Harvey, John H, LD, Bus.....	Hendrickson, Doris, LD, Bus.....	Seattle
Harvey, S Margaret, LD, Ed.....	Hendrickson, Harold M, LD, ME.....	Seattle
Harvey, Walter Miles Jr., LD, LA.....	Hendrickson, Harvey F, LD, Bus.....	Seattle
Harwood, Carmen, Unc, LA.....	Hendrickson, Vera, LD, Bus.....	Belgrade, Minn
Haslop, E Louise, Unc, LA.....	Hennes, Albert F, UD, LA.....	Bellingham
Hassell, H. McDonald, Unc, EE.....	Hennes, Delbert P, UD, LA.....	Bellingham
Hassenmiller, Kenneth L, UD, Bus.....	Hennings, Lawrence R, LD, LA.....	Dubuque, Ia
Hatch, Ethel Sumner, Grad.....	Henricks, John Joseph, LD, Sci.....	Seattle
Hatheyaw, Ernest R, LD, Sci.....	Henricksen, Fred S, LD, LA.....	Tacoma
Hatlen, Charles B, LD, ME.....	Henricksen, Hans Otto, LD, Bus.....	Seattle
Hatlestad, Elmer, Unc, ME.....	Henry, Anna Ruth, LD, LA.....	Yakima
Hatton, Ruth G, LD, LA.....	Henry, Ruth H, Unc, LA.....	Tacoma
Hauan, M. Rine, Unc, EE.....	Hepler, Helen Harriet, LD, FA.....	Seattle
Hauck, Hazel Marie, UD, Sci.....	Herbert, Willis Need, LD, Bus.....	Tacoma
Haus, Andrew J, Lan, UD, EE.....	Hering, G E, LD, Jour.....	Fairbanks, Alaska
Hauschel, Robert, Unc, Sci.....	Hermans, Thomas Gerald, LD, Sci.....	Puyallup

- Hermans, Wayland D, UD, Bus. Pasadena, Cal
 Herner, Pauline, LD, Bus. Portland, Or
 Heron, Herbert A, LD, For. Seattle
 Herre, Kirk Taylor, Unc, LA. Everson
 Herren, Esther Mary, Unc, Bus. Harve, Mont
 Herren, William Albert, LD, Bus. Puyallup
 Herrett, Clarence H, LD, Bus. Seattle
 Herrick, Ellen, LD, LA. Seattle
 Herrick, Marion H, LD, Bus. Seattle
 Herrick, Maude A, Sp, LA. Seattle
 Hershberger, Emily M, UD, Ed. Lewiston, Ida
 Hess, Marie Elizabeth, LD, LA. Spokane
 Hesselgrave, Chas. E, Grad. Seattle
 Hesselstine, Lee F, LD, Bus. Seattle
 Heuver, Beulah, LD, Ed. Seattle
 Hewitt, Theodore, Grad. Los Angeles, Cal
 Heyes, Alice Dorothy, UD, LA. Seattle
 Heywood, Kathleen, LD, Bus. Seattle
 Hiatt, Amos, LD, Bus. Seattle
 Hiatt, Harlan, LD, For. Vancouver
 Hiatt, Louis B, 2d, Law. Vancouver
 Hibbard, Myra, UD, LA. Seattle
 Hick, Lawrence L, Unc, Fish. Seattle
 Hicker, Eugene, LD, ChE. Tacoma
 Hickey, Mrs Florence M, Unc, Law. Seattle
 Hicks, Joseph Winstead, LD, LA. Seattle
 Hicks, E Maynard, LD, Bus. Seattle
 Hielscher, Herbert H, LD, BA. Seattle
 Higashimura, G, Unc, Bus. Seattle
 Hildreth, Howard R, LD, Sci. Seattle
 Hildreth, Ralph, Sp, CE. Toppenish
 Hilen, Ethel Joan, LD, Sci. Seattle
 Hill, Bert, LD, Bus. Tacoma
 Hill, Charles Gillmann, LD, Bus. Spokane
 Hill, Chester F, LD, Bus. Seattle
 Hill, Cyril Dean, 1st Law. Seattle
 Hill, Dwight Reuben, LD, Bus. Seattle
 Hill, Glen G, UD, Ed. Roche Harbor
 Hill, Helen Maxine, UD, LA. Great Falls, Mt
 Hill, Helena, LD, LA. Seattle
 Hill, James Jerome, LD, Bus. Spokane
 Hill, Leila D, Unc, LA. Augusta, Ga
 Hill, Leon Albert, LD, ME. Spokane
 Hill, Ray Hayward, LD, ChE. Bellingham
 Hill, Sidney B, Sp, LA. Riverside
 Hillard, Thelma Edith, LD, Ed. Seattle
 Hillman, George K, LD, Bus. Seattle
 Hillman, Robert Kline, LD, LA. Seattle
 Hills, Chester W, UD, EE. Ellispport
 Hills, Elizabeth, UD, Ed. Ellispport
 Hills, Kenneth Maltman, LD, Bus. Seattle
 Hillson, Charles E, LD, For. Seattle
 Hilstrom, George D, UD, Bus. Vancouver, Wn
 Hilton, Omega, Grad, Phar. Marysville
 Himes, Hazel F, LD, Sci. Raymond
 Himmelsbach, Dora May, LD, Ed. Yakima
 Hindle, Stuart James, LD, Bus. Seattle
 Hines, George W, Grad. Washington, D C
 Hinman, Charles Lee, 2d Law. Yakima
 Hinman, Chester A, LD, Bus. Lewiston, Ida
 Hinman, Mary A, UD, FA. Everett
 Hinthorn, Gail I, LD, LA. Hartline
 Hinton, Paul, Sp, Eng. Pt. Townsend
 Hintze, Mrs Gertrude J, LD, FA. Seattle
 Hirata, Harry Manichl, LD, Bus. Spokane
 Hirose, Tadayuki, UD, Sci. Japan
 Hirota, Mrs Misuzu, Unc, FA. Japan
 Hitchings, Eben Godfrey, UD, CE. Seattle
 Hitchings, Esther Louise, UD, Lib. Seattle
 Hjaltalin, Gertrude, Unc, Jour. Bellingham
 Hjertoos, Blanche A, LD, LA. Tolt
 Hjertoos, Gurina Olive, UD, LA. Tolt
 Hjertoos, William M, LD, ME. Tolt
 Ho, Pao Jin, UD, LA. China
 Hoag, Clarice, LD, LA. Eureka Spgs, Ark
 Hoag, Edward Samuel, LD, Fish. Seattle
 Hoag, Ruth G, UD, Sci. Eureka Spgs, Ark
 Hoard, Bert Verne, LD, EE. Seattle
 Hoare, William Curtis, LD, Bus. Seaview
 Hobi, Edwin Anthony, LD, Bus. Aberdeen
 Hochfeld, Sophie, Unc, Bus. Portland, Or
 Hodecker, Fred J, LD, ChE. Portland, Or
 Hodge, Paul H, Grad, Bus. Seattle
 Hodges, Gilbert P, LD, LA. Thane, Alaska
 Hodges, Harold Blake, Unc, ME. Seattle
 Hodges, James F, LD, Bus. Seattle
 Hodges, John S, Sp, Museum. Edmonds
 Hodges, Robert Karl, Unc, Bus. Seattle
 Hoffer, J C, Unc, Fish. Chippewa Falls, Wis
 Hoffer, Paul E, LD, LA. Chippewa Falls, Wis
 Hoffman, Bessie Rose, LD, Bus. Seattle
 Hoffman, Ruth Marion, LD, Bus. Olympia
 Hogan, Elwood D, UD, For. Cosmopolis
 Hogan, Jeanette G, LD, FA. Aberdeen
 Hogan, Louis Bennett, LD, For. Cosmopolis
 Hogan, Mildred Anne, LD, FA. Aberdeen
 Hogan, William Clarence, LD, Phar. Pasco
 Hogg, Jack McHenry, UD, Bus. Seattle
 Hogue, Helen, UD, FA. Seattle
 Hohl, Lydia A, LD, Phar. Everett
 Hohmann, Susan C, 3d Law. St Paul, Minn
 Holbrook, Mrs Maud L, Sp, LA. Seattle
 Holden, Herman Harry, LD, LA. Seattle
 Holden, James H, LD, Ed. Seattle
 Holden, John H, LD, Bus. Chelan
 Holden, Roberta Dell, LD, LA. Brewster
 Holderman, O W, Sp, Min. Chambers Prairie
 Hoken, Olaf, Grad. Tacoma
 Holladay, Bonnie, LD, Jour. Baker City, Or
 Holland, Ruth, UD, LA. Seattle
 Hollander, Tyre H, 3d Law. Edgemont, N C
 Hollenbeck, D, UD, Bus. Mountain View, Cal
 Hollingworth, Thomas I, Sp, Bus. Seattle
 Hollister, Miles, Sp, Bus. Spokane
 Holman, Franklin, LD, Bus. Elma
 Holman, R Morris, LD, Bus. Oregon City, Or
 Holmes, Joseph D, Unc, LA. Seattle
 Holmes, Vernon P, Unc, ChE. Idaho Falls, Ida
 Holmstrom, Isaac Robert, Unc, LA. Seattle
 Holt, Florence C, Unc, FA. Seattle
 Hot, Lucy Minerva, UD, Sci. Seattle
 Holt, Marvin Greenwood, UD, ChE. Seattle
 Holton, Karl W, Sp, Bus. Port Alice, B C
 Holton, Maxine Mary, LD, LA. Seattle
 Holz, Eva Lucille, LD, LA. Kapowsin
 Holzheimer, Frank W, UD, Min. Seattle
 Homan, Marion, LD, Sci. Hoquiam
 Honey, Frederic Drake, UD, Bus. Gresham, Or
 Honeyman, Ronald J, LD, Bus. Portland, Or
 Hood, Ellen Belle, LD, Bus. Juneau, Alaska
 Hood, Helen Rowena, UD, FA. Puyallup
 Hooper, Eugene Francis, LD, LA. Seattle
 Hooper, Robert Sherman, LD, Bus. Seattle
 Hoover, Henry Browne, LD, FA. Boise, Ida
 Hoover, Oscar E, LD, Bus. Everett
 Hopkins, George F, LD, EE. Seattle
 Hopmann, Harry A G, LD, ChE. Puyallup
 Hopper, Charles Moody, LD, Bus. Spokane
 Hopper, C Galvin, LD, LA. Seattle
 Hopson, Eric Ernest, UD, CE. Portland, Or
 Hornberg, Jalmer T, Unc, Bus. New Castle
 Horning, Harold F, LD, Eng. Seattle
 Hornstra, Fred Harry, LD, EE. Auburn
 Horsley, Frank Sears, LD, Bus. Yakima
 Hoskins, Marion Janet, LD, Ed. Redmond, Or
 Hotelling Addison Harold, Grad. Seattle
 Hougau, Edward Olson, LD, Bus. Seattle
 Houghland, Robert I, LD, Phar. Stuber, Ida
 Houlahan, Virginia C, LD, Sci. Spokane
 House, James G, Min. Livingston, Mont
 Hove, Emma Klaren, LD, FA. Seattle
 Hove, Merna W, LD, LA. Seattle
 Hover, Ernest John, Unc, Law. Seattle
 Hovey, Dorothy, LD, Bus. Seattle
 Hovey, Joseph Chester, 1st Law. Ellensburg
 Hovey, Mary, LD, Bus. Seattle
 Howard, Isabell Doris, LD, LA. Everett
 Howard, Florence A, LD, FA. Seattle
 Howard, Frances H, LD, LA. Seattle
 Howard, Fred A, LD, Bus. Stanwood

Howard, Grace E, Grad.....Seattle
 Howard, Mabel Grace, LD, Sci.....Stanwood
 Howard, Rodney James, LD, Bus.....Seattle
 Howard, Walter J, LD, EE.....Lemmon, S D
 Howarth, Marie, LD, LA.....Portland, Or
 Howay, Thomas Cavan, LD, Bus.....Grandview
 Howe, Charles B, UD, Bus.....Minneapolis, Minn
 Howe, Helen Moses, UD, LA.....Seattle
 Howe, Kendall L, LD, EE.....Seattle
 Howe, Wilbur Almeron, LD, EE.....Seattle
 Howell, Ellene, LD, Jour.....Portland, Or
 Howell, Emma Louise, LD, Bus.....Portland, Or
 Howell, Helen, LD, FA.....Decatur
 Howell, W Eastman, Unc, EE.....Decatur
 Hower, Melba May, LD, Sci.....Decatur
 Hoynes, Jens Sundberg, SC, Fish.....Seattle
 Hoyt, Dorothy, LD, LA.....Woodinville
 Hoyt, Irene, Unc, FA.....Mt Vernon
 Hoyt, Verna Margaret, UD, LA.....Seattle
 Hruska, Michael, LD, LA.....Seattle
 Huang, Hua Pias, LD, LA.....China
 Hubbard, C Andresen, Grad.....Portland, Or
 Hubbell, Ruth, LD, LA.....Spokane
 Hucksins, Dwight, LD, For.....Seattle
 Hudson, Augustus H, LD, ChE.....Bremerton
 Hudson, Dorothy Wilma, LD, LA.....Seattle
 Hudson, George E, LD, LA.....Masset, Can
 Hudson, Mabel Catherine, UD, Bus.....Everett
 Hudson, Marjorie Merle, UD, LA.....Seattle
 Hudson, Neal, Unc, Bus.....Olympia
 Huelsdonk, Elizabeth, UD, Sci.....Spruce
 Hufford, Luzerne Edson, UD, Sci.....Seattle
 Huggett, Ralph A, UD, Bus.....Seattle
 Hughes, Anne Burke, LD, LA.....Seattle
 Hughes, Anna Mildred, LD, Bus.....Seattle
 Hughes, Cecil Leonard, UD, Ed.....Kennewick
 Hughes, Edwin A, Sp, CE.....Olympia
 Hughes, Fred Lewis, LD, Bus.....Yakima
 Hughes, Henry Helton, LD, Bus.....Yakima
 Hughes, Mary Elizabeth, LD, LA.....Seattle
 Hughes, Millicent, Unc, Bus.....Seattle
 Hughes, Owen P, Unc, EE.....Gig Harbor
 Hughes, Victor Arthur, Unc, Bus.....Sunnyside
 Huguleit, Zelline, LD, Ed.....Seattle
 Hull, Florence E, LD, Bus.....Yakima
 Hulshauser, Ruth A, LD, LA.....Selah
 Humes, Edmond T, Sp, Phar.....Seattle
 Hummel, Bertha Royce, Grad.....Olympia
 Hundal, Ikball Singh, Unc, EE.....Vancouver, BC
 Hunsaker, James W, LD, ChE.....Seattle
 Hunsaker, H C, UD, Jour.....White Salmon
 Hunt, Ernest Russell, LD, LA.....Leahy
 Hunt, Leonard, LD, Bus.....Colville
 Hunt, Phebe Alberta, LD, LA.....Seattle
 Hunt, Thomas Alvin, LD, CE.....Seattle
 Hunt, Wallace Daniel, LD, LD, Sci.....Seattle
 Hunter, Stanley, UD, EE.....Seattle
 Hunter, William B, LD, Bus.....Spokane
 Hunting, Lloyd Elmo, LD, ME.....Bellingham
 Huntington, LeRoy W, LD, For.....Kallispell, Mt
 Huntington, Walter L, LD, For.....Hoquiam
 Huntley, Elva Deane, UD, FA.....Spokane
 Huntworth, John Willard, LD, Bus.....Seattle
 Harburt, B, UD, Ed.....Thompson Falls, Mont
 Harburt, C M, LD, Min.....Thompson Falls, Mt
 Harley, Colla, Sp, Sci.....Seattle
 Harley, Dora, LD, LA.....Seattle
 Hurley, Gerald Victor, LD, Bus.....Seattle
 Husted, Berton Loran, Unc, CE.....Corona, Cal
 Huston, Taylor Eugene, LD, Jour.....Burns, Or
 Hutcheson, Elwood, UD, LA.....Montesano
 Hutchings, John P, LD, Bus.....Des Moines, Ia
 Hutchison, Robert P, LD, Eng H'd River Or
 Hutchison, Ruby, LD, Sci.....Mt. Vernon
 Hutchinson, William H, 1st Law.....Seattle
 Huth, Carlton, Unc, Law.....Tacoma
 Hyde, Claire Virginia, LD, LA.....Seattle
 Hyde, Marguerite R, UD, Ed.....Kallispell, Mt
 Hyman, Norton Beebe, LD, Bus.....Seattle
 Hyndman, William Lee, Unc, Law.....Spokane
 Hynes, Frank Wilbur, Sp, Fish.....Seattle

Ikeda, Jubel, Unc, Bus.....Seattle
 Ilman, Harold W, Unc, Bus.....Sultan
 Imus, Raymond K, UD, Bus.....Kalama
 Ingham, Harry DeWitt, LD, ME.....Seattle
 Inglis, James Allan, Sp, EE.....Seattle
 Inglis, Lloyd Lester, Sp, Bus.....Seattle
 Ingram, Robert Mortan, LD, Bus.....Hoquiam
 Inkster, Mrs Mary B, Grad.....Seattle
 Inman, Maurice C, LD, ME.....Portland, Or
 Inouye, Chohel, LD, LA.....Seattle
 Instrella, Angel M, UD, Ed.....Philippines
 Irving, Peggy Paige, LD, LA.....Everett
 Irving, Walt Matthew, LD, EE.....Seattle
 Irwin, Blanche V, LD, Bus.....Okanogan
 Irwin, John Ivan, LD, Bus.....Ionia, Mo
 Irwin, Mason, LD, EE.....Montesano
 Irwin, Murena Valetta, LD, Bus.....Seattle
 Isaacson, Henry, LD, ME.....Seattle
 Israel, Eli, LD, Bus.....Seattle
 Iverson, Oscar, Unc, Bus.....Kallispell, Mont
 Iverson, Warren Wesley, Unc, Bus.....Seattle
 Ives, Byron, LD, Bus.....Seattle
 Ives, Mae Elizabeth, UD, Bus.....Seattle
 Ives, Waldo Cleveland, LD, Bus.....Seattle
 Ivey, Eugene Dyke, 1st Law.....Davenport

Jackson, Betty, LD, Ed.....Seattle
 Jaskson, Elmer, LD, Min.....Tacoma
 Jackson, Jerry Tyler, LD, EE.....Kirkland
 Jackson, Mildred Helen, UD, Bus.....Seattle
 Jackson, Ralph C, Sp, Fish.....Winthrop, Me
 Jackson, Russell Carl, Unc, Fish.....Seattle
 Jacobi, Miller Francis, LD, ChE.....Seattle
 Jacobs, Bryan M, LD, ME.....Seattle
 Jacobs, Dorothy, LD, FA.....Carmichael, B C
 Jacobs, Harold Arnott, UD, ME.....Seattle
 Jacobs, Townsend H, LD, Bus.....Seattle
 Jacobsen, Agnes, LD, Sci.....Tacoma
 Jacobsen, Engman, LD, ChE.....Spokane
 Jacobsen, Karl Kenneth, LD, Bus.....Ellensburg
 Jacobsen, Amanda, LD, Sci Des Moines, Ia
 Jacobsen, Theodore J, LD, FA.....Des Moines
 Jacobsen, Paul M, UD, CE.....Ellensburg
 Jacobson, Anne Olive, Unc, FA.....Seattle
 James, Dorothy, LD, Sci.....Tacoma
 James, Gordon Maxwell, LD, Sci.....Tacoma
 James, Marjorie, UD, Sci.....Tacoma
 James, Milton C, LD, Fish.....Angusta, Me
 James, Thurston, LD, Bus.....Seattle
 Jamieson, Cecil Byron, UD, Bus.....Lynden
 Jamison, Julia Luetta, Unc, LA.....Tekoa
 Jamison, Willis S, Sp, Sci.....Seattle
 Janeck, Kenneth Newcomb, LD, Phar.....Yakima
 Janeck, Louis Fechter, LD, Bus.....Yakima
 Janeck, Marlon Delferna, LD, LA.....Yakima
 Janeway, Harold Lynn, LD, Bus.....Edmonds
 Janson, Gertrude Marie, LD, LA.....Seattle
 Jaqueth, Herbert H, UD, Eng Kallispell, Mt.
 Jarvis, Norman Donald, LD, Sci Pt Townsend
 Jaspersen, Agnes, UD, Sci.....Seattle
 Jee, Shinn-ghow Howard L, Unc, CE.....China
 Jefferson, Virginia, Unc, Sci.....Seattle
 Jellison, Arthur J, LD, For.....Baker, Or
 Jenkins, Margaret A, LD, Sci.....Seattle
 Jenkins, Will D, LD, For.....Rockport
 Jenks, Carol, LD, LA.....Seattle
 Jenne, Carl F, LD, Ed.....Coupeville
 Jenne, Gladys Evelyn, LD, Sci.....Coupeville
 Jenner, Earle Bagley, LD, ME.....Seattle
 Jenner, Robinson Crockett, LD, Bus.....Seattle
 Jenness, John C, LD, Bus.....Weiser, Ida
 Jensen, Alfred, LD, CE.....Seattle
 Jensen, Kal, LD, LA.....Seattle
 Jensen, Leo C, LD, CE.....Black Diamond
 Jensen, Marlan Guilette, LD, Sci.....Everett
 Jerbert, Arthur R, Grad.....Seattle
 Jessup, Corra M, LD, FA.....Bremerton
 Jessup, Wilford L, Sp, Jour.....Bremerton
 Jewett, Juliet Louise, UD, Sci.....Seattle
 Jewett, Velma, LD, LA.....Seattle

- John, Eugene Allen, LD, Bus.....Seattle
 Johnson, G Adolph, LD, Min.....Tacoma
 Johnson, Anna Elizabeth, LD, LA.....Seattle
 Johnson, Beatrice Havilla, LD, Bus.....Yakima
 Johnson, Bertil, LD, Bus.....Tacoma
 Johnson, Carl B, LD, Bus.....Seattle
 Johnson, Carl Emil, LD, Bus.....Newport
 Johnson, Charles Christy, LD, Phar.....Tacoma
 Johnson, Charles Morrison, LD, ME.....Tacoma
 Johnson, Clifford E, Sp, EE.....Tacoma
 Johnson, Dorothea E, LD, FA.....Seattle
 Johnson, Edwin, LD, LA.....Tacoma
 Johnson, Eva Jane, LD, LA.....Seattle
 Johnson, Evelyn Alice, UD, LA.....Seattle
 Johnson, Fletcher Ormond, LD, Bus.....Seattle
 Johnson, Florence A, Grad, Sci.....Puyallup
 Johnson, Florence B, LD, LA.....Bellingham
 Johnson, Frederick A, LD, Eng.....Seattle
 Johnson, Genevieve D, LD, LA.....Seattle
 Johnson, Gladys Irene, LD, LA.....Tacoma
 Johnson, Halton Julius, UD, ME.....Mt Vernon
 Johnson, Hilding Everett, LD, ChE.....Seattle
 Johnson, Howard A, LD, ME.....Pearson
 Johnson, Florence Isyl, LD, LA.....Tacoma
 Johnson, Jane Gregg, UD, LA.....Seattle
 Johnson, John L, Sp, Bus.....Coeur d'Alene, Ida
 Johnson, Katherine, LD, LA.....Seattle
 Johnson, Kathleen, LD, Phar.....Seattle
 Johnson, Kenneth A, LD, Sci.....Seattle
 Johnson, Kenneth Bruce, LD, Sci.....Seattle
 Johnson, Leonice Ackley, LD, LA.....Tacoma
 Johnson, Vivian LeRoy, LD, Bus.....Spokane
 Johnson, Marie, UD, LA.....Brush Prairie
 Johnson, Martin W, LD, FA.....Sylvania
 Johnson, Melvin Ernest, Unc, EE.....Spokane
 Johnson, Milton S, LD, Ed.....Seattle
 Johnson, Minnie C, LD, LA.....Weston, Or
 Johnson, Nora Howarth, LD, Sci.....Cle Elum
 Johnson, Norman Gardner, LD, ChE.....Seattle
 Johnson, Oscar Melvin, LD, Bus.....Redmond
 Johnson, Phillip, LD, Sci.....Yakima
 Johnson, Raymond L, Unc, LA.....Seattle
 Johnson, Richard Angus, LD, Bus.....Acme
 Johnson, Rudolph E, Unc, Sci.....Brainerd, Minn
 Johnson, Sylvia, LD, Phar.....Ilwaco
 Johnson, Ursula, UD, LA.....Seattle
 Johnson, Venus June, LD, Sci.....Seattle
 Johnson, Vernice, Unc, LA.....Boulder, Colo
 Johnson, Vernon B, UD, Sci.....Everett
 Johnson, Vernon Ford, LD, Bus.....Seattle
 Johnson, Victor Hugo, LD, EE.....Olympia
 Johnson, Victor Martin, Sp, Bus.....Spokane
 Johnson, Walter E, LD, Bus.....Spokane
 Johnson, Wesley Ray, LD, ME.....Bellingham
 Johnson, Wylie Adrian, Sp, CE.....Seattle
 Johnston, Fayetta G, LD, Ed.....Seattle
 Johnston, Ida, LD, Sci.....Coupeville
 Johnston, James G, LD, Min.....Yakima
 Johnston, Margaret H, LD, LA.....Portland, Or
 Johnston, Rae Lincoln, LD, ME.....Seattle
 Johnston, Carolyn Ruth, LD, Sci.....Seattle
 Johnston, Sidney L, UD, For.....Yakima
 Johnston, Theresa M, UD, Lib.....Seattle
 Lolliffe, Margaret J, LD, LA.....Tacoma
 Jolly, Esther N, LD, Ed.....Seattle
 Jonason, Raynor, LD, LA.....Almira
 Jones, Adile Camille, LD, LA.....Portland Or
 Jones, Almor Clyde, LD, Sci.....Seattle
 Jones, Paul Goon, LD, Sci.....Bremerton
 Jones, Evan M, LD, LA.....Sumner
 Jones, Hazel Elizabeth, UD, LA.....Yakima
 Jones, Howard LD, Bus.....Okanogan
 Jones, Howard R, LD, CE.....Missoula, Mont
 Jones, Margaret B, UD, LA.....Victoria, B C
 Jones, Margaret S, UD, Ed.....Bellingham
 Jones, Marjorie, UD, LA.....Seattle
 Jones, Marian Elizabeth, LD, Bus.....Hartline
 Jones, Marshall Henry, LD, Sci.....Cashmere
 Jones, Stephen Parr, LD, Bus.....Seattle
 Jones, Victor Noble, Unc, FA.....Seattle
 Jones, William John, UD, Bus.....Seattle
 Jones, Walter Richard, LD, ME.....Seattle
 Jones, Warren Worth, LD, LA.....Spokane
 Jones, Zenith Watkins, UD, LA.....Fresno, Cal
 Jordan, John Cecil, LD, FA.....Boise, Ida
 Jordan, Lucius Devant, LD, Bus.....Seattle
 Jordan, Ruth, LD, LA.....Columbus
 Jorgenson, H George, LD, Bus.....Seattle
 Joubert, Stanley Smith, LD, Bus.....Enumclaw
 Jower, Joseph A, LD, ChE.....Portland, Or
 Joy, Anderson Stickney, UD, ME.....Seattle
 Joy, Arnyess Ione, UD, LA.....Seattle
 Joy, Laura Frances, LD, LA.....Seattle
 Juan, Teofila, UD, Bus.....Philippines
 Judd, Elsie G, UD, Sci.....Seattle
 Judge, Frederick Byron, LD, LA.....Spokane
 Jule, Swanbild, LD, FA.....Seattle
 Jule, Walter W, Unc, LA.....Seattle
 Kaiser, Gladys Guernsey, LD, Sci.....Seattle
 Kalez, Marion Michael, LD, Bus.....Spokane
 Kallgren, Philip A, LD, Eng.....Hall
 Kamel, Richard S, LD, LA.....Seattle
 Kamholz, William Elmer, LD, EE.....Centerville
 Kamm, Edward John, Unc, LA.....Lynden
 Kane, Arthur Thomas, LD, ME.....Edison
 Kangley, Lucy, UD, LA.....Seattle
 Kappler, Helen Marie, LD, Sci.....Seattle
 Karr, Herbert Spencer, Unc, EE.....Seattle
 Kaseberg, Frankie, UD, Ed.....Walla Walla
 Kasuga, Yoshi, LD, Ed.....Seattle
 Kato, Mrs. Fuji, Unc, Ed.....Seattle
 Kaufman, Elsa, LD, FA.....Tacoma
 Kawai, Solchi, Grad.....Seattle
 Kaye, Helen Marjory, LD, LA.....Spokane
 Keator, Frederic W Jr, UD, ME.....Tacoma
 Keck, Helen Maude, LD, FA.....Seattle
 Kee, Sing Tah, LD, LA.....China
 Keebe, Andrew John, Unc, Eng.....Seattle
 Keefe, Robert M, LD, Bus.....Snohomish
 Keeler, Hammond George, LD, Bus.....Sequim
 Keeley, Ralph C, Sp, CE.....Richmond, Va
 Keelling, C Robert, LD, Bus.....Somers, Mont
 Keene, Elmer Lester, LD, EE.....Yakima
 Keene, Mildred Y (Mrs), Sp, Ed.....Seattle
 Keeney, Leo Delong, Unc, LA.....Bothell
 Kafer, L Beecher, LD, FA.....Wenatch
 Keith, Emily Hazlewood, UD, Lib.....Seattle
 Keith, Helen, Unc, Sci.....Kallispell, Mont
 Kellam, Vivian, UD, Ed.....Seattle
 Kelleher, John Emmett, Unc, Law.....Seattle
 Keller, Bertha Mae, LD, LA.....Spokane
 Keller, Hubert W, LD, Sci.....Coeur d'Alene, Ida
 Kelley, Barbara Rozella, LD, Bus.....Seattle
 Kelley, Cecil Starr, LD, ME.....Seattle
 Kelley, Eugene H, Unc, Sci.....Portland, Or
 Kelly, Eugene L, Sp, Bus.....Seattle
 Kelley, Francis Joseph, UD, ChE.....Tacoma
 Kelley, Gertrude Blanche, LD, FA.....Tacoma
 Kelley, Martha Eugene, LD, LA.....Seattle
 Kellner, Chester, LD, Bus.....Hamilton
 Kellner, H A, LD, Bus.....Coeur d'Alene, Ida
 Kellogg, Avis Marguerite, LD, Sci.....Seattle
 Kellogg, Jesse I, LD, LA.....Puyallup
 Kellogg, Orson Chester, LD, Bus.....Hoquiam
 Kellogg, Elizabeth, Unc, FA.....Seattle
 Kellogg, Harold E, LD, Bus.....Seattle
 Kellogg, Howard, LD, Bus.....Seattle
 Kellogg, Marion Colie, LD, FA.....Seattle
 Kelly, R Lester, Sp, Bus.....Seattle
 Kelly, Naomi Lucile, LD, FA.....Tacoma
 Kelly, Theodore, Unc, EE.....Pt Angeles
 Kelso, Kenneth Kay, LD, LA.....Seattle
 Kemp, James Ward, LD, EE.....Seattle
 Kendall, Ver T, Unc, Bus.....Seattle
 Kenin, Fannie, LD, Sci.....Seattle
 Kenin, Harry Marvin, UD, LA.....Long Beach
 Kennedy, Amabel E, LD, LA.....Seattle
 Kennedy, Arthur B, LD, Bus.....Tacoma

Kennedy, Katherine Bernice, LD, LA. Seattle
 Kennedy, Doreen, UD, Ed. Seattle
 Kennedy, Florence Rachel, Unc, Ed. Seattle
 Kennedy, Lottie Anne, LD, LA. Union
 Kennedy, S Marguerite, LD, Ed. Tacoma
 Kennedy, Russell, Unc, EE. Seattle
 Kennett, John Joseph, LD, LA. Seattle
 Kenney, Joel M, LD, Eng. Seattle
 Kenyon, Charles E, LD, Bus. Weiser, Ida
 Kenyon, George D, LD, Bus. Seattle
 Kenyon, Harry R, LD, EE. Toppenish
 Kepp, Karl, LD, CE. Seattle
 Kerr, Grace C, UD, FA. Seattle
 Kerrigan, Sylvia F, Grad, LA. Seattle
 Kershner, Vera L, LD, Sci. Raton, N M
 Kerschner, Vernon A, LD, Bus. Seattle
 Kersten, William Clinton, LD, Bus. Seattle
 Ketcham, Albert R Jr, Sp, Bus. Seattle
 Ketcham, Ernest James, LD, Bus. Seattle
 Ketcham, Florence, LD, Sci. Seattle
 Ketcham, Laura, LD, LA. Seattle
 Ketchum, Leland Hoskins, LD, Sci. Seattle
 Kettella, Claud Eugene, LD, LA. Seattle
 Kettingring, E E, LD, LA. Vancouver Wn
 Keyes, Chauncey C, LD, Bus. Anacortes
 Keyes, Donald C, LD, Sci. Bellingham
 Keyes, Harmon E, UD, Eng. Seattle
 Keyes, Howard C, LD, LA. Bellingham
 Keyes, Roswell Park, LD, Sci. Bellingham
 Keys, M Anna, LD, LA. Seattle
 Kiddle, Joy Douglas, Sp, Bus. Seattle
 Kidston, Walter Nelson, LD, FA. Seattle
 Kidunoto, Asa, Bus. Seattle
 Kiebertz, Gustave Harold, LD, EE. Seattle
 Kier, Caswell Ward, Sp, CE. Seattle
 Kienholz, Leon Edward, LD, Sci. Spokane
 Kienholz, Mabel Lucile, Unc, FA. Spokane
 Kimball, Jessie Mary, LD, FA. Seattle
 Kimball, Blanche, LD, LA. Seattle
 Kime, Francis W, Sp, EE. Tacoma
 Kimple, Emily Belle, UD, Sci. Seattle
 Kincaid, Frederick M, 2d Law. Seattle
 Kiner, Ruby Ethel, LD, Sci. Govan
 King, Dorothy, UD, Sci. Puyallup
 King, George E, SC, Min. Sumas
 King, John Lawrence, Unc, ME. Portal, N D
 King, Norris Gardner, Sp, Bus. Seattle
 King, Otis Schley, LD, EE. Seattle
 King, Robert William, LD, Bus. Seattle
 King, Vicai, LD, Min. China
 King, Virginia E, LD, Ed. Boise, Ida
 Kingman, Forrest R, Sp, Eng. Chelan
 Kingman, Kenneth William, Unc, LA. Chelan
 Kingsbury, Milford K, LD, FA. Seattle
 Kingsley, Frances, LD, Bus. Portland, Or
 Kinleyside, Antoinette, LD, Ed. Medford, Or
 Kinne, Frances Eleanor, LD, FA. Seattle
 Kinsey, Ronald Clark, Unc, Bus. Seattle
 Kipp, Letha Julia, Unc, Ed. Seattle
 Kipp, Pearl Velma, UD, Ed. Seattle
 Kipp, Lorine, LD, LA. Spokane
 Kirk, Douglas Garfield, LD, LA. Everett
 Kirkbride, James W, LD, Bus. Seattle
 Kirkham, Elva L, LD, LA. Douglas, Alaska
 Kirkpatrick, Cecile G, LD, Phar. Seattle
 Kirkwood, John Erdmann, LD, ChE. Seattle
 Kirry, Leslie H, LD, Bus. Forest Grove, Or
 Kisor, Orval, LD, Bus. Aberdeen
 Kitamura, Morimitsu, Grad. Japan
 Klaus, Charles Elwell, LD, ME. Seattle
 Kleber, Narcissa E, LD, LA. Seattle
 Kleinberg, Lester, LD, Bus. Seattle
 Kleck, Herman A, LD, LA. Libby, Mont
 Klemmand, John G, Unc, Eng. Tacoma
 Klingensmith, Clement E, LD, ChE. Yakima
 Klotz, Leo, LD, Bus. Seattle
 Klug, Vivian Childs, LD, Bus. Seattle
 Knapp, Ed Bradford, LD, Phar. Lynden
 Knapp, Eugene H. E., Sp, Bus. Davenport
 Knapp, Frank Roy, UD, For. Seattle

Knapp, Howard S, Sp, FA. Davenport
 Knapp, Joseph A, Unc, LA. Vancouver, Wn
 Knickrehm, Frederick A, LD, ME. Yakima
 Knickrehm, Marie M, LD, Sci. Yakima
 Knight, Charles William, LD, Bus. Spokane
 Knight, T Spencer, LD, Bus. Lewiston, Ida
 Knight, Viola Lee, LD, Ed. Bremerton
 Knisely, Malcolm B, LD, Bus. Seattle
 Knowles, Dorward, LD, FA. Nooksack
 Knox, Esther, Unc, FA. Cashmere
 Knox, Robert Walker, LD, CE. Portland, Or
 Knox, Rozella F, Unc, LA. Portland, Or
 Knudsen, Elinor M, UD, Bus. Seattle
 Knuppe, L M, LD, Min. Fairbanks, Alaska
 Knuppenburg, Irva C, ID, Bus. Seattle
 Koba, Tsuneyoshi, LD, Sci. Japan
 Kobayashi, Hedekichi, UD, Bus. Seattle
 Kobler, Anna H, UD, Ed. Austria
 Koche, I. Virgil, LD, Bus. Porter
 Koenig, John, LD, LA. Nisqually
 Koepke, Carolyn, LD, LA. Seattle
 Kohler, Kenneth E, LD, Bus. Seattle
 Kohne, Russell Avery, LD, Bus. Everett
 Kohner, Frank Francis, Sp, Bus. Spokane
 Koichi, Morisada, Grad, Bus. Seattle
 Kondo, Paul T, LD, EE. Seattle
 Kongsle, Edward, Sp, Bus. Pt Angeles
 Konishi, Jiro, Grad, Bus. Japan
 Koppe, Clifford, W, LD, Eng. Seattle
 Kopstern, Ethel, LD, Bus. Seattle
 Koren, Ralph W, Sp, Bus. Spokane
 Koroleff, Alexander M, Grad. Russia
 Korte, Doris, UD, Ed. Medical Lake
 Kotick, Ottmar, LD, Sci. Olympia
 Kracower, Rose, UD, Bus. Seattle
 Krafft, E T Gertrude, Grad. Seattle
 Kraft, Edwin Arnold, LD, EE. Seattle
 Kraft, Marjorie Gertrude, LD, Ed. Seattle
 Kraft, Warren Earl, LD, LA. Seattle
 Kramer, Karl W, LD, ME. Seattle
 Krankils, Caroline Milda, LD, LA. Seattle
 Kratz, Helen K, LD, FA. Klatskanie, Or
 Krause, Adolph O, Sp, Phar. Tacoma
 Kravik, Viola, LD, LA. Everett
 Kreamer, Lena, UD, Ed. Seattle
 Kreisher, Harold, Sp, Min. Bremerton
 Krenzel, Walter E, LD, LA. Seattle
 Kreiger, Bernice, LD, LA. Portland, Or
 Kreiger, George E, LD, EE. Seattle
 Kreigler, Joseph Edwin, UD, Bus. Spokane
 Kroetch, Mary Catherine, LD, Sci. Spokane
 Krogstad, Elva, UD, LA. Seattle
 Kromer, Sydney H, LD, LA. Boise, Ida
 Kronfield, Eugene, UD, Bus. Seattle
 Krouse, Leslie L, LD, Che. Pomeroy
 Krueger, Karl Francis, LD, Bus. Seattle
 Kruse, Henry Ross, UD, EE. Portland, Or
 Krum, Carolyn Russell, Unc, Bus. Spokane
 Kuebler, Dorothy Ada, LD, Sci. Seattle
 Kuehnert, Jasper F, LD, Eny. Seattle
 Kuhfuss, Mildred, LD, Bus. Wenatchee
 Kuhn, Jessie, UD, Ed. Seattle
 Kullberg, LeRoy George, LD, LA. Seattle
 Kuntz, Olive, Grad. Pomona, Cal
 Kunz, Samuel W, Sp, EE. Seattle
 Kunze, Helen, LD, LA. Stanwood
 Kuranish, Sabaro (Mrs), Grad. Seattle
 Kvindlog, Dorothy, Unc, FA. Seattle
 Kwok, Ping-Chui, UD, Bus. China
 Kwok, Tak Wa, UD, LA. China
 Kylastra, John, LD, CE. Yakima

LaBlance, Eva E, LD, Bus. Sandpoint, Ida
 Lafond, Elmer Joseph, LD, Sci. Doty
 LaFrance, Claude, LD, Bus. Hamilton, Mont
 Laigo, Pablo H, LD, Sci. Philippines
 Laird, Thelma Lucile, LD, LA. Seattle
 Lake, Florence, LD, Bus. Port Townsend
 La Marsh, Lenore, LD, Bus. Spokane

Lamb, Lowell R, LD, Eng.....	Seattle
Lamberson, Sarah B, LD, LA.....	Portland, Or
Lamborn, Frances Maude, LD, LA.....	Tacoma
Lamont, Ralph H, Sp, Bus.....	Seattle
Lamoureux, Harvey DeWitt, UD, Ed.....	Burton
Lamp, Raymond H, LD, Bus.....	Harrington
Lamp, Wallace Granville, Sp, Phar.....	Everett
Lamphere, William Max, LD, ME.....	Coupeville
Lampkin, Thomas, LD, Phar.....	Council, Ida
Lancaster, Kirk Glynn, LD, Phar.....	Seattle
Lancaster, Paul Edward, LD, Sci.....	Camas
Lance, Helen, LD, Sci.....	Seattle
Land, Perry, UD, Phar.....	Seattle
Landes, Kenneth K, UD, Sci.....	Seattle
Landsburg, Robert A, UD, EE.....	Seattle
Lane, Kathryn, LD, LA.....	Seattle
Lane, Ralph Belford, LD, ME.....	Bellingham
Lane, Robert Frederick, LD, Sci.....	Seattle
Lang, Miriam C, LD, Bus.....	Seattle
Lange, Dayma, UD, LA.....	Coulee City
Langhorne, Clifford M, LD, LA.....	Tacoma
Langle, Arthur Bernard, LD, LA.....	Seattle
Langlow, Wesley Arnold, Unc, LA.....	Tacoma
Lanich, Almee Lucretia, LD, FA.....	Renton
Lankenau, Walter Henry, UD, For.....	Seattle
Lansdon, Gladys Adela, LD, LA.....	Boise, Ida
Lanser, Martin Mathew, LD, Bus.....	Seattle
Lantz, Mrs. Helen Ross, Grad.....	Seattle
Large, George Elwyn, UD, CE.....	Seattle
Lark, Bert Webb, UD, Bus.....	Seattle
Larkin, Frances Emma, LD, LA.....	Everett
Larkin, Mae Ellen, Grad.....	Seattle
Laroco, Guillermo L, LD, Sci.....	Philippines
La Roque, Rene, LD, For.....	Kellogg, Ida
Larrabee, Mary Adele, LD, FA.....	Bellingham
Larse, Mona J, UD, Bus.....	Plains, Mont
Larsen, Leslie E, LD, Bus.....	Seattle
Larsen, Walter E, UD, CE.....	Port Townsend
Larson, Herbert Louis, LD, LA.....	Tacoma
Larson, Lou Clair, UD, LA.....	Seattle
Larson, Victor Byron, UD, CE.....	South Bend
Latham, Harold, LD, Bus.....	Minneapolis, Minn
Latimer, Allan Wallace, UD, LA.....	Seattle
Latimer, Walter B, LD, EE.....	Seattle
Latta, Susan Hyslop, LD, Sci.....	Seattle
Lau, Fook Tai, Sp, FA.....	China
Lauckhart, Alice D, LD, LA.....	Bellingham
Laudy, Henry Allen, LD, Bus.....	Everett
Lane, Ewart Scottie, LD, Min.....	Wapato
Laughlin, Raymond, UD, Bus.....	Ellensburg
Laurence, Frank E, Bus.....	Tacoma
Lautz, Fritz Arthur, LD, Bus.....	Buffalo, N Y
Lavansky, Eleanor, Unc, Bus.....	Seattle
La Violette, Doris W, LD, LA.....	Bremerton
Lawe, Margaret A C, LD, Bus.....	Seattle
Lawrence, Edna May, Grad.....	Everson
Lawrence, Henry, Unc, Phar.....	Seattle
Lawson, Thomas Strang, LD, LA.....	Spokane
Lawton, Winona May, LD, Bus.....	Seattle
Law Yow, Rose, LD, FA.....	Seattle
Laya, Gerardo, Unc, Bus.....	Philippines
Laymance, Bess, LD, FA.....	Waterville
Layton, Alice Glee, LD, Bus.....	Kalispell, Mont
Lazo, Marciano, Unc, Bus.....	Philippines
Lea, Dorothy M, LD, LA.....	Chinook, Mont
Lea, Margaret, UD, LA.....	Seattle
Leader, Mary, LD, Sci.....	Dowagiac, Mich
Lease, Howard S, LD, Bus.....	Great Falls, Mont
Leavitt, Darrell, LD, Sci.....	Sedro-Woolley
Leavitt, John Pierce, Unc, Bus.....	Puyallup
Leavitt, Marion C, UD, LA.....	Seattle
Leckenby, Dorothy, LD, Sci.....	Seattle
LeCocq, Charles Edward, LD, CE.....	Lynden
Ledesma, Honorato, Unc, Min.....	Philippines
Lee, Arturdo L, LD, LA.....	Seattle
Lee, Edith C, LD, LA.....	Portland, Or
Lee, Frank A, LD, Sci.....	Seattle
Lee, Hugh Seymour, LD, Sci.....	Seattle
Lee, Mrs. Judith, Unc, LA.....	Seattle
Lee, Juel Kuei Theodore, UD, Bus.....	China
Lee, Mayme S, LD, LA.....	Seattle
Lee, Richard Roy, UD, Phar.....	Seattle
Lee, Robert Edwin, Unc, EE.....	Puyallup
Lee, Robert James, LD, EE.....	Enumclaw
Lee, Victor M, LD, Bus.....	Everett
Leechman, John Douglas, UD, Lib.....	Seattle
Leeper, Agnes Ruth, Unc, Sci.....	Lewiston, Ida
Leeper, Helen, LD, LA.....	Lewiston, Ida
Lees, Gladys Lauretta, Unc, Sci.....	Tacoma
Lees, Robert Edward, Unc, LA.....	Ontario, Or
Leevy, Harold Dreile, LD, Bus.....	Seattle
Legg, Charles M, LD, Sci.....	Seattle
Leghorn, James Malcolm, Unc, CE.....	Olympia
Lehde, Raymond C, LD, Eng.....	Seattle
Leib, Mrs. Rachel Smith, Unc, Sci.....	Seattle
Leichhardt, Mildred I, LD, Ed.....	Kelso
Leighton, Elizabeth, LD, FA.....	Weiser, Ida
Leise, John Frederic, LD, Sci.....	Seattle
Leland, Wayne Robt, LD, Bus.....	Wendell, Ida
Lemon, Harry Edward, LD, For.....	Toit
Lemon, John Francis, Grad.....	Seattle
Lennie, Robert D, Sp, Min.....	Vancouver
Lennon, James, LD, Phar.....	Seattle
Lentz, Katherine Jane, Grad.....	Marietta, O
Leonard, Annette, UD, LA.....	Burns, Or
Leonard, Arthur Ralph, LD, Bus.....	Seattle
Leonard, Edward Watson, LD, FA.....	Winlock
Leonard, Richard, LD, Bus.....	Butte, Mont
Leonella, Slater Mary, Sp, Sci.....	Seattle
Lerdall, Floyd Alton, UD, For.....	Ames, Iowa
LeRoy, Hubert Wade, LD, CE.....	Gardiner, Or
Lesser, Kathryn, Unc, FA.....	Puyallup
Lesser, Margaret Helen, UD, Jour.....	Puyallup
Levin, Ben Zion, UD, Bus.....	Spokane
Levin, Myer, LD, Phar.....	Spokane
Levinson, Oscar, LD, Bus.....	Seattle
Levis, Edith Harriet, LD, Bus.....	Seattle
Levitin, Isaac, LD, Eng.....	Seattle
Levitin, Morris, LD, EE.....	Seattle
Levy, David, LD, LA.....	Seattle
Levy, Melvin P, LD, LA.....	Seattle
Lewis, Blodwen, LD, FA.....	Coulee City
Lewis, Clara, LD, Ed.....	Seattle
Lewis, Edna, Unc, Bus.....	Fairbanks, Alaska
Lewis, Elleen, LD, Sci.....	Twin Falls, Ida
Lewis, Elizabeth, LD, LA.....	Seattle
Lewis, Evan, LD, For.....	New Westminster, B C
Lewis, Fred Adrian, LL, LA.....	Ritzville
Lewis, James William, LD, EE.....	Seattle
Lewis, Glen L, LD, For.....	New Westminster
Lewis, Leon, LD, LA.....	Seattle
Lewis, Olin, LD, LA.....	Portland, Or
Lewis, Rubin, UD, ME.....	Seattle
Lewis, Ruth Anne, LD, Bus.....	Seattle
Lin, Chia-Ch'i, Unc, Fish.....	China
Libby, Annie Elizabeth, LD, Sci.....	Kelso
Lidstone, Irvine, LD, Sci.....	Bellingham
Lien, E Laura, UD, Bus.....	Bremerton
Lightie, Cuthbert Otto, LD, Bus.....	Seattle
Lillpop, Louise C, LL, LA.....	Sedro-Woolley
Lilly, Ruth Willard, LD, Sci.....	Seattle
Lilly, Stella, UD, LA.....	Tacoma
Lin, Fu, LD, LA.....	China
Lincoln, Roland, LD, EE.....	Seattle
Lind, Andrew William, LD, For.....	Seattle
Lindberg, Harry Albert, LD, LA.....	Seattle
Lindberg, Wilmer Hilding, UD, LA.....	Tacoma
Lindberg, Martha Evelyn, LD, LA.....	Tacoma
Lindberg, Roberta Jean, LD, Sci.....	Seattle
Lindberg, Ruby Charlotte, LD, Bus.....	Seattle
Lindblom, Roy Eric, UD, EE.....	Seattle
Lindburg, Russell S, UD, Bus.....	Seattle
Lindeman, Helen, LD, LA.....	Seattle
Lindholm, Arthur W, UD, Bus.....	St Louis, Mo
Lindley, Mrs. Alice B, UD, LA.....	Seattle
Lindsay, Margery, UD, LA.....	Seattle
Lindsay, Mable Palmer, LD, Bus.....	Seattle
Lindsay, Steele, Grad.....	Seattle
Lindsee, Charles Abbott, LD, Bus.....	Seattle
Lindstrom, Edmund, LD, ME.....	Seattle

Linklater, M Ruth, LD, LA...Hillsboro, Or
 Linn, Robert Donald, LD, Bus....Aberdeen
 Linn, Harold, LD, LA.....Princeton, Ill
 Linton, James Reginald, UD, Sci....Portage
 Linton, Robt Ritchie, UD, Sci....Portage
 Lisle, Mabel, Unc, Ed.....Seattle
 Lister, George V, LD, Bus....Prineville, Ir
 Lister, Violet, Unc, LA.....Paulina, Or
 Liston, Edward John, LD, LA.....Orillia
 Liston, James G, UD, LA.....Orillia
 Litchfield, William M, UD, Bus...Bellebus
 Little, Dorothy Vernon, UD, Sci....Seattle
 Little, Edward Milton, Grad.....Seattle
 Little, Gordon, LD, ChE...New Westminster, BC
 Little, Herbert S, UD, LA.....Seattle
 Littlefield, Dorothy I, LD, LA.....Seattle
 Littooy, Norma, UD, Ed.....Tacoma
 Lively, James Ward, LD, CE....Portland, Or
 Livengood, Mrs. Adelaide L, Grad...Seattle
 Livesay, Mrs Ruth, Grad.....Portland, Or
 Livesay, Thayne M, Grad.....Portland, Or
 Lloyd, Helen Agatha, LD, FA.....Seattle
 Lloyd, Horace, LD, Bus.....Seattle
 Lloyd, Katherine Mary, LD, ChE....Seattle
 Lloyd, Percy, Unc, Bus.....Everett
 Lochow, William, LD, EE.....Seattle
 Lockerby, Desiah, LD, LA.....Seattle
 Lockerby, Frank M, LD, LA.....Seattle
 Lockhart, Bert, LD, Bus.....Wapato
 Lockwood, Maude Shirley, LD, FA...Seattle
 Loc, Elsie, LD, LA.....Seattle
 Loe, Harvey Ralph, LD, Sci.....Seattle
 Loer, Lawrence Frank, LD, Bus....Seattle
 Loewer, Charles H, LD, Bus...Nanticoke, Pa
 Lofgren, Frederick V, UD, Phar....Seattle
 Logg, Charles P, UD, Bus.....Seattle
 Logg, Frank Stanley, LD, Bus....Seattle
 Lohrer, George Hartman, LD, EE....Seattle
 Loken, Leo Waldemar, Unc, ME...Everett
 Lombardine, Herbert, LD, Che....Seattle
 Lonseth, Herbert, LD, Sci.....Seattle
 Loeff, Adolph, LD, Fish.....Seattle
 Loomis, Glee Annette, LD, Bus....Spokane
 Loomis, Mrs. Minerva U, Grad...Portland, Or
 Lopp, Dwight Thomas, UD, FA.....Seattle
 Lorah, James Richard, UD, ChE....Seattle
 Lorbeer, Norma Emma, UD, Sci....Seattle
 Lorser, Joe Mathew, LD, FA.....Clarkston
 Lorrin, Way F, J, Sp, Eng.....Seattle
 Lorton, Dorothy Mida, LD, LA...Walla Walla
 Lorton, Mildred Ann, LD, LA...Walla Walla
 Louden, Russell, LD, Bus....Centralia
 Loughary, Jack B, LD, Bus...Sedro Woolley
 Loughlen, Paul Egbert, LD, Sci...Puyallup
 Love, Elizabeth Jean, UD, Sci....Tacoma
 Love, Lloyd Charles, LD, Bus....Spokane
 Low, Percy Warden, LD, Bus....Spokane
 Lowe, Ben Franklin, UD, Ed.....Tacoma
 Lowman, Vivien Guy, LD, LA.....Seattle
 Lucas, Florence Katherine, LD, FA...Everett
 Lucas, Martha, LD, LA.....Seattle
 Luckner, John Thomas Jr, LD, LA...Salem, Or
 Ludwig, Ernest M, LD, LA.....Seattle
 Ludwigs, Frank H, LD, Bus...Walla Walla
 Luft, Herman, UD, ME.....Bremerton
 Luft, Max, LD, ME.....Bremerton
 Luithle, Edmund Julius, LD, ME....Seattle
 Lund, Walter Williams, LD, FA.....Seattle
 Lundberg, Edwin Martin, Sp, Law...Seattle
 Lundberg, Vivian Madele, LD, LA...No Bend
 Lundell, Berger J O, UD, Lib....Issaquah
 Lundell, Signe A M, Unc, LA....Issaquah
 Lundstrom, Allan W, LD, EE.....Yakima
 Lundvall, Ralph E, SC, Min.....Alaska
 Lunge, George Scott, LD, EE.....Seattle
 Lungreen, Rolfe P, LD, For.....Seattle
 Lurie, David, Unc, EE.....Seattle
 Luther, Gordon D, LD, Eng.....Seattle
 Luthy, Marion, LD, LA.....Springfield, Ill
 Lutz, Edna Maud, LD, FA...Port Townsend

Lutz, Hugh Ward, 2d Law.....Seattle
 Lycette, John Phillip, LD, LA.....Spokane
 Lyman, Charles A, LD, For.....Olympia
 Lyman, Edwin B, LD, LA.....Portland, Or
 Lynch, Dorothy Sarah, Unc, LA.....Seattle
 Lynch, Florence M, Unc, FA...La Grande, Or
 Lynch, Isabel Reis, UD, Sci.....Yakima
 Lynch, Julia, LD, LA.....Seattle
 Lynch, Rose, LD, Sci.....Seattle
 Lyon, Henry Arthur, LD, LA.....Seattle
 Lyons, Harry Albert, LD, ChE....Seattle
 Lyter, Dorothy, Unc, LA.....Seattle

McAble, Earl Whatmore, LD, LA...Seattle
 MacAdams, Wm Bernard, Unc, Bus...Seattle
 MacAlmond, Daphne, Unc, Sci....Dungeness
 McAnally, Bonnie, LD, Sci.....Yakima
 MacArthur, Archibald A, LD, LA...Seattle
 McAulay, John Henry, LD, ME....Yakima
 McBee, Alfred, LD, LA...Cover d'Alene, Ida
 McBride, Wm C J, Unc, Sci....Portland, Or
 McCabe, Clair, LD, Bus.....Seattle
 McCraig, Grace Ralston, LD, Sci...Seattle
 McCane, Ames, UD, EE.....Seattle
 McCart, Ben Clair, Sp, Phar....Port Angeles
 McCarthy, O Barnard, UD, Sci...Anaconda, Mt
 McCarthy, Clara G, LD, LA.....Seattle
 McCarthy, Donal F, LD, ChE...Anaconda, Mt
 McCarthy, Joseph L, LD, Bus...Wallace, Ida
 McCarthy, Mary H, UD, LA...Butte, Mont
 McCarthy, D William, LD, Bus....Seattle
 McCartney, Jules, LD Phar....Seattle
 McCarty, Yale, LD, EE.....Hood River, Or
 McCarty, Marguerite Helen, LD, LA...Toit
 McCaughey, Douglas, LD, Bus....Seattle
 McCausland, Beth, Grad, LA.....Seattle
 McCausland, Lelon, UL, Ed.....Seattle
 MacClain, A Lewis, Grad.....Vancouver, Wn
 McClarren, Arthur Edward, LD, EE...Seattle
 McClintock, Sarah, LD, FA.....Spokane
 McClinton, Harold L, Sp, Jour....Seattle
 McClung, R Eugene, 1st Law...Portland, Or
 McClung, James Carl, LD, Bus....Seattle
 McClung, Lucile E, LD, LA...Portland, Or
 McClung, Olney, LD, ME.....Seattle
 McClure, Frank Baldwin, LD, Bus...Seattle
 McClure, Charles Willard, LD, LA...Yakima
 McClymont, Wallace O, Sp, Bus...Aberdeen
 McColey, Everett L, LD, Sci....Sumner
 McCulloch, Elizabeth Z, LD, LA...Seattle
 McComb, George E, LD, LA...Calvin, N D
 McConihe, Marguerite C, UD, Sci....Seattle
 McConihe, Ruth Noyes, Unc, Sci...Seattle
 McCord, W Bennett, 2d Law.....Seattle
 McCorple, Agnes, LD, LA.....Sumner
 McCormick, Eleanor J, Grad, LA...Seattle
 McCormick, George, LD, Min....Portage
 McCormick, Helen, UD, LA...Hubbard, Or
 McCormick, James H, Unc, EE....Seattle
 McCormick, Lewis M, Sp, Sci....Mansfield, O
 McCoy, Fred Burton, LD, For.....Seattle
 McCoy, John Wyman, LL, Phar....Seattle
 McCoy, William M, Unc, Bus....Oakesdale
 McCracken, Willis F, LD, Eng....Seattle
 McCray, Jane, LD, LA.....Seattle
 McCrea, William S, LD, ME....Spokane
 McCredy, Noble Flower, UD, Bus...Seattle
 McCredy, Harold F, UD, LA.....Seattle
 McCredy, Rosamond P, UD, LA....Seattle
 McCroskey, Robert M, UD, Bus....Colfax
 McCroskey, Wendell H, LD, Bus...Spokane
 McCulloch, Mrs. G. B, Sp, Sci....Seattle
 McCulloch, Flora M, UD, LA....Darrington
 McCullough, Charles J, LD, Eng....Seattle
 McCush, George, LD, Bus....Bellingham
 McDonach, William J, Unc, Bus...Seattle
 McDonald, Alice G, UD, LA.....Seattle
 McDonald, Alice Louise, LD, Sci...Seattle
 McDonald, Clive W, LD, Bus....Spokane

McDonald, Darrel Wesely, LD, Sci.	Spokane
McDonald, Donald, UD, LA.	Eugene, O
McDonald, Donald T, LD, ME.	Seattle
MacDonald, Eora, LD, Bus.	Seattle
MacDonald, Jack, Unc, Eng.	Vancouver
MacDonald, Lamora, LD, LA.	Spokane
MacDonald, Louise Isabel, LD, LA.	Seattle
McDonald, Margaret F, LD, LA.	Pasco
McDonald, Mary K, UD, Bus.	Pocatello, Ida
McDonald, Raymond, Unc, Bus.	Wilson Cr
McDonald, William L, LD, CE.	Seattle
MacDonald, Sadie Belle, LD, Ed.	Seattle
MacDonald, Vernon E, LD, CE.	Somers, Mont
McDonnell, Donald, LD, Bus.	Seattle
MacDougall, W. Archie, Unc, Bus.	Sequim
MacDougall, Maude E, Unc, FA.	Seattle
McDougall, Stanley, LD, Min.	Kellogg, Ida
McDowell, John W, LD, Sci.	Bellevue
McDowell, Marie S, LD, LA.	Portland, Or
McEachern, Bernard W, LD, Bus.	Latah
McEachern, Gertrude E, LD, LA.	Seattle
McEachern, Meda M, LD, Ed.	Latah
McElroy, Elizabeth, LD, Sci.	Olympia
McElroy, Katherine M, Unc, Sci.	Boise, Ida
McElroy, William C, Unc, Bus.	Gordon, Neb
McElwain, Mabel E, Sp, FA.	Seattle
McElwain, Mont Monroe, LD, Bus.	Seattle
McEwen, Marshall Lee, UD, Bus.	Seattle
McFaddin, Wm R, Unc, Bus.	Billings, Mont
McFarland, Alma Louise, LD, FA.	Kelso
MacFarlane, Don A, UD, Sci.	Seattle
MacFarlane, Margaret B, LD, LA.	Seattle
MacFarlane, Robert S, 2d Law.	Seattle
McGaffey, Wesley F, UD, For.	Everett
McGahn, Ellen, UD, Phar.	Seattle
McGill, Eleanor, LD, LA.	Seattle
McGill, Vivian Jerald, UD, LA.	Seattle
McGill, Wayne E, LD, Bus.	Portland, Or
McGirr, Horace D, Grad.	Boise, Ida
McGirr, Thelma, LD, Bus.	Boise, Ida
McGirr, Wilma, LD, Bus.	Boise, Ida
McGlaughlin, Hugh E, LD, EE.	Seattle
McGovern, Florence, LD, LA.	Spokane
McGrath, Doris Katherine, LD, LA	Pomeroy
McGrew, Eleanor P, UD, Jour.	Seattle
McGrotry, Theodore J, LD, EE.	Seattle
McGuinness, Ellen, LD, LA.	Snohomish
McGuire, Louis H, Unc, ME.	Seattle
McHale, Anne L, LD, Sci.	Seattle
McHarrie, Lindsay, LD, Bus.	Seattle
McHugh, John Joseph, LD, Bus.	Seattle
McHugh, Ruth, UD, LA.	Seattle
McIlraith, Mervyn C, LD, EE.	Seattle
McIndoe, William C, Grad.	Portland, Or
McInnes, Elizabeth A, LD, LA.	Wallace, Ida
McInnes, John S, Unc, Law.	Wallace, Ida
McInnes, Merville W, UD, Bus.	Spokane
McInroe, Lloyd G, LD, Bus.	Walla Walla
McIntyre, Cora May.	Seattle
McKay, Francis Howard, LD, Bus.	Spokane
McKay, George F, LD, Bus.	Spokane
McKay, John A, UD, Sci.	Seattle
McKay, Laurie Annie, LD, LA.	Seattle
McKay, Z Lorraine, LD, LA.	Seattle
McKay, Mary H Isabel, Grad.	Seattle
McKay, Preston F, LD, LA.	Seattle
McKee, J Alden, Unc, EE.	Gig Harbor
McKellips, Herald, Sp, Eng.	Wenatchee
McKennett, Robt C, Unc, Bus.	Vancouver, Wn
McKenney, Ruth Eleanor, LD, Bus.	Hoquiam
McKenzie, Cedric, Sp, Bus	Minneapolis Minn
Mackenzie, Don H, LD, Bus.	Rossland, B C
McKenzie, Edward G, Unc, Ed.	Seattle
McKenzie, Frank, LD, ME.	Seattle
Mackenzie, Harold Austin, LD, EE.	Hoquiam
Mackenzie, J H, LD, Min.	New Westminster
Mackenzie, R L, Unc, EE.	Vancouver, B C
Mackenzie, Robert G, LD, Eng.	Everett
McKenzie, William A, LD, EE.	Seattle
MacKey, Arthur Arvid, LD, Sci.	Satsop
McKillop, Marjorie L, Grad.	Seattle
McKin, James, UD, Min.	Puyallup
McKinley, John Edward, LD, ME.	Touche
McKinney, Clifford T, Unc, Law.	Wawawai
McKinney, Grace K, (Mrs), Sp, Sci	Seattle
MacKinnon, Dr. Goff, Grad.	Seattle
McKinnon, Marion G, Grad, Sci.	Seattle
McKinstry, Cecil H, LD, Bus.	Seattle
McKissick, Joe C, LD, Bus.	Wallace, Ida
McKnight, E. L. Thor, LD, Sci.	Seattle
McKnight, John T, LD, Sci.	CleElum
McLaren, Harold E, LD, Bus.	Seattle
McLaughlin, Gay E, UD, LA.	Seattle
McLaughlin, Margaret, LD, Sci.]	Seattle
McLean, Allan Gilbert, LD, LA.	Seattle
McLean, Cyrus E, For.	Hoquiam
McLean, Gilbert D, Unc, LA.	Tacoma
McLean, John Boyd, LD, Bus.	Seattle
McLean, Kenneth David, Sp, Bus.	Boise, Ida
McLean, Margaret C, UD, Ed.	Seattle
McLellan, Maxine K, LD, FA.	Seattle
McLennan, E May, Unc, Ed.	Estacada, Or
McLeod, Annabel J, LD, Ed.	Athens, Or
McLeod, Beatrice, Unc, Ed.	Seattle
McLeod, Gladys I, UD, Bus.	Athens, Or
McLeod, Jean K, LD, LA.	Portland, Or
McLeod, Mildred, LD, LA.	Seattle
McMahon, Julia M, LD, Bus.	Longmire
McMahon, Gordon, Unc, Bus.	Vancouver, B C
McManus, Hugh H, Unc, Law.	Seattle
McMillan, David Elliot, LD, Bus.	Orin
McMillan, Gregor M, LD, Bus.	Butte, Mont
McMillan, Frederick A, Grad.	Seattle
McMillan, Harvey Clay, Sp, Fish.	Seattle
McMorrin, Jean Pauline, UD, FA.	Seattle
McMurry, Edith Tempy, Unc, LA.	Puyallup
McMurtrey, Nellie, UD, Ed.	Seattle
McNamara, Mary, LD, Bus.	Edmonds
MacNaughton, Ellen, LD, Bus.	Waukesha, Ws
MacNaughton, E Leslie, Sp, Min.	Victoria, BC
McNeil, Rose, LD, Ed.	Seattle
McNeill, Ben Karr, LD, Bus.	Seattle
McNeill, Harold E, LD, EE.	Tacoma
MacNicol, Jane, LD, Phar.	Buckley
McPhee, Alexander S, LD, EE.	Auburn
McPherson, Dorothy C, Unc, Sci.	Seattle
McPherson, Dorothy Vesta, LD, FA.	Seattle
McPerson, Josephine, Grad.	Seattle
Macpherson, Kathryn F, UD, Bus.	Pysht
McPherson, Lenore, Unc, FA.	Seattle
McQuaid, Alice Evelyn, LD, LA.	Hawaii
McQuaid, Thelma Aileen, LD, Sci.	Hawaii
McRae, Edwin, Unc, ME.	Sedro Woolley
McRae, Florence E M, LD, Ed.	Spokane
McRae, Florence E, LD, Ed.	Spokane
McRae, Isabel Reid, LD, FA.	Seattle
McRae, Margaret, Sp, Nurs.	Seattle
McTall, Clifford B, LD, Sci.	Everett
McVay, Vilo C, LD, LA.	Seattle
McVeagh, Rebecca C, Unc, LA.	Hawaii
McWaters, Walter R, Unc, Bus.	Portland, Or
McWatters, Dorothy, LD, LA.	Vancouver, BC
MacWhinnie, Arthur B, LD, Sci.	Seattle
MacDonald, Gordon, LD, LA.	Hoquiam
Machin, Geo. Louis, LD, Bus.	Bellingham
Madden, Ned Dodd, LD, Bus.	Caldwell, Ida
Mades, Allen, Unc, Bus.	Seattle
Mades, Margaret, Unc, Sci.	Seattle
Madison, Viola, UD, LA.	Osborne, Kan
Madsen, Elizabeth M, Unc, Sci.	Seattle
Mades, Munyo, LD, EE.	Seattle
Maerdlan, Frank R, Unc, EE.	Seattle
Maetzold, Henry A, Unc, FA,	Litchfield Min
Magill, Fulton, UD, Min.	Tacoma
Magill, Marion Roberta, UD, Ed.	Tacoma
Maglalang, Gil, LD, Sci.	Philippines
Magnuson, Carl Walter, Unc, EE.	Seattle
Magnuson, Clarence Edwin, LD, Bus.	Tacoma
Magowan, Thomas Ross, UD, Bus.	Vashon
Mahaffey, Rudley Fleming, LD, LA.	Tacoma

Mahl, Alvina, Unc, FA.....	Seattle	Mason, Lloyd, LD, Bus.....	Bellingham
Mahnken, Henry H C, LD, Sci.....	Seattle	Mason, Muriel, LD, LA.....	Seattle
Mahoney, Ethel Cecilia, UD, Sci.....	Bremerton	Mason, Irma Ruth, UD, LA.....	Seattle
Mahoney, Vera, UD, Bus.....	Hippner, Or	Masul, Leonard G, Grad.....	Seattle
Malakoff, Abe, LD, Phar.....	Seattle	Masunosko, Kasama, LD, Fish.....	Japan
Malakoff, Milton Samuel, LD, LA.....	Seattle	Matheson, Roy, UD, Bus.....	Granum, B C
Mallge, Marcel E, UD, Bus.....	Lapwai	Mathews, Elizabeth J, LD, Sci.....	Seattle
Mallory, Angus, LD, ME.....	Seattle	Mathews, L Scott, LD, ME.....	Portland, Or
Malmo, Prescott Clark, LD, For.....	Seattle	Mathis, Clinton, LD, ChE.....	Seattle
Malone, Walter W, LD, LA.....	Worley, Ida	Mathis, Madge, LD, LA.....	Seattle
Maloney, Gilbert M, LD, Sci.....	Everett	Matsen, John P, Unc, Law.....	Bickleton
Maloney, Harry P, LD, EE.....	Missoula, Mont	Matsen, Mary G, Sp, Phar.....	Seattle
Maloney, Margaret, Unc, Sci.....	Missoula, Mont	Matsen, Roy, LD, Sci.....	Bickleton
Maloney, Patricia, LD, LA.....	Seattle	Matson, Eleveda O, UD, Bus.....	Edison
Maloney, Percy Owen, LD, Bus.....	Everett	Matthes, Rudolph, LD, Bus.....	Bellingham
Maloy, Patrick Henry, LD, Bus.....	Mt Vernon	Matthews, Charles W, LD, EE.....	Seattle
Maltby, Addie E, LD, Ed.....	Cutbank, Mont	Matthews, Dorothy H, LD, FA.....	Seattle
Manard, Lucille A, LD, LA.....	Seattle	Matthews, John Gill Jr, LD, LA.....	Seattle
Manchester, Arlo Rev, LD, Bus.....	Almira	Matthews, Julian O, LD, LA.....	Seattle
Mandley, Wilfred J, Unc, EE.....	Chelan Falls	Matthis, William E, LD, Bus.....	Bellingham
Maney, Wallace Lincoln, UD, EE.....	Yakima	Mattice, Menzo Jr, Unc, Bus.....	Anacortes
Manluco, Alfonso, LD, EE.....	Philippines	Mattson, Nels E, UD, EE.....	Redmond
Mann, Harold N, LD, LA.....	Concordia, Kan	Mattson, Ulrika, LD, Phar.....	Seattle
Mann, Harold W, LD, Bus.....	Portland, Or	Matzdorf, Herbert M, LD, Bus.....	Seattle
Mapes, Carl Herbert, UD, LA.....	Seattle	Matzinger, Andrew W, LD, Eng.....	Seattle
Mapes, Joseph H, LD, Bus.....	Helena, Mont	Matzinger, Walter T, Sp, EE.....	Seattle
Mapes, Minnee E, Unc, LA.....	Seattle	Mauzer, Margaret M, Unc.....	Pe Ell
Marchand, Leslie A, UD, LA.....	Seattle	Mauger, George L, Unc, Min.....	Reading, Pa
Mardon, T Allen, LD, EE.....	Seattle	Maughan, Wilbur M, LD, Bus.....	Spokane
Marling, Helen Emma, LD, LA.....	Seattle	Mauren, Signe, Unc, Ed.....	Seattle
Marino, Frank, Unc, Fish.....	Seattle	Maxfield, Alice Emily, LD, Bus.....	Seattle
Marion, Isabel Helen, UD, LA.....	Yakima	Maxfield, Charles I, Grad.....	Seattle
Marion, Lucille, LD, Bus.....	Seattle	Maxson, Evelyn J, Unc, Ed.....	Washington, D C
Maris, Dorothy, LD, Bus.....	Seattle	Maxwell, James W Jr, LD, Bus.....	Seattle
Markham, Mrs. B E, LD, Ed.....	Seattle	Maxwell, Nellie, Sp, Sci.....	Shelton
Markusen, Grace Kathleen, LD, LA.....	Seattle	May, Martha Letcher, LD, LA.....	Seattle
Marling, Samuel, LD, For.....	Victoria, B O	May, Mary Jane, LD, LA.....	Okanogan
Marmont, Nan Hilles, LD, Bus.....	Seattle	Mayer, Herbert E, LD, ME.....	Seattle
Marot, Mrs. Ada B, Grad.....	Kirkland	Mayes, Evelyn, LD, Sci.....	Seattle
Marquette, Elizabeth, Grad.....	Seattle	Mayfield, Lola M, Unc, Bus.....	Portland, Or
Marquis, James M, LD, LA.....	Everett	Mayne, Catherine, LD, Sci.....	Livingston, Mont
Marquis, Harold Holliday, LD, LA.....	Everett	Mazma, J George, LD, Bus.....	Spokane
Marquis, Ralph W, LD, Sci.....	Everett	Meacham, Burton Wallace, Sp, Min.....	Tacoma
Marriott, George Thomas, Unc, Bus.....	Seattle	Mead, Lawrence, LD, ChE.....	Wenatchee
Marsh, Earl Rand, LD, LA.....	Vancouver, Wn	Meaker, Marian Esther, LD, Ed.....	Seattle
Marsh, Eugene E, Unc, Law.....	Metollus, Or	Means, James Leland, LD, LA.....	Stanfield, Or
Marsh, Frances E, Unc, Law.....	Metollus, Or	Meckstroth, Carl W, LD, Bus.....	Seattle
Marsh, Gordon Wesley, LD, For.....	Dryad	Medin, Rita B, UD, FA.....	Seattle
Marsh, Lillian A, LD, Phar.....	Arlington	Medici de Solenni, Gino, Grad.....	Tacoma
Marsh, Urrna L, LD, FA.....	Seattle	Medler, Dan M, LD, Bus.....	Seattle
Marshall, Dorothy E, UD, LA.....	Missoula, Mt	Medler, Louisa A, LD, Bus.....	Seattle
Marshall, Roy Stevens, LD, Bus.....	Seattle	Meehan, Lyle James, UD, Bus.....	Spokane
Marshall, Thomas, Unc, Law.....	Deming	Mehan, Edgar Shirley, Sp, CE.....	Roy
Marshaly, Wayne, Sp, EE.....	Seattle	Mehner, Margaret T, LD, Ed.....	Bremerton
Martel, Henry, Sp, Bus.....	Pt Townscnd	Melge, Jerusha G, UD, Lib.....	Yakima
Martin, Alvord B, LD, Bus.....	Seattle	Mels, Girard Fred, Sp, Phar.....	Seattle
Martin, Carroll V, LD, Bus.....	Seattle	Melnsnest, Frederick H, LD, Fish.....	Seattle
Martin, Connie E, UD, FA.....	Seattle	Meissner, Adolph, LD, Bus.....	Seattle
Martin, Earle V, UD, ChE.....	Portland, Or	Melby, Esther Muriel, UD, LA.....	Seattle
Martin, Frances Lora, UD, Sci.....	Bellvue	Melcher, Joy M, Unc, ME.....	Camas
Martin, Francis William, UD, Bus.....	Doty	Meneely, A Howard, UD, LA.....	Seattle
Martin, Harold M, UD, Bus.....	Spokane	Mentzer, Cyrus Joseph, LD, LA.....	Tacoma
Martin, Lenore, UD, LA.....	Mabton	Mercier, Jeanne Aimee, Grad.....	Marseille Fran
Martin, Mary Geneva, UD, LA.....	Mabton	Merilla, Marie, Sp, LA.....	Seattle
Martin, Mayne Doris, LD, Sci.....	Orcas	Merriam, Clair V, UD, EE.....	Nooksack
Martin, Otto Wilhelm, Unc, Law.....	Parkland	Merriam, Sherman L, UD, Ed.....	Nooksack
Martin, Paul Morgan, LD, ME.....	Puyallup	Merrick, Donald G, LD, Unc, Eng.....	Seattle
Martin, Perle F, LD, Bus.....	Woodland	Merrihew, Mrs. H J, Unc, FA.....	Seattle
Martin, Rowland J, Sp, EE.....	Roundup, Mont	Merrill, Ella R, LD, LA.....	Seattle
Martin, Samuel E, Eng.....	Seattle	Merrill, Frances Elizabeth, Unc, LA.....	Seattle
Martin, Sanford, Unc, Bus.....	Tacoma	Merrill, Grant Warren, LD, LA.....	Seattle
Martin, Sarah S, LD, FA.....	Hollywood, Cal	Merrill, Lent Jasper, UD, Min.....	Seattle
Martin, Thomas D, LD, Sci.....	Quincy	Merrill, Levi J, UD, Min.....	Anoka, Minn
Martz, Harry Lee, Sp, Phar.....	Seattle	Merrill, Marion Stuart, LD, FA.....	Seattle
Mastomi, Emile, UD, LA.....	Spokane	Merritt, Fred S, UD, LA.....	Seattle
Mason, Dwight, Allyn, LD, Bus.....	Tacoma	Merritt, Hattie, Unc, Sci.....	Falmouth, Ky
Mason, Earl Clifton, LD, EE.....	Seattle	Mershon, Lester Odell, LD, EE.....	Seattle
Mason, Frank Douglas, LD, CE.....	Seattle	Meserve, Kenneth A, LD, Bus.....	Portland, Ir
Mason, Lela E, UD, FA.....	Seattle	Messer, Elizabeth B, UD, Sci.....	Rolling Bay
		Metcalf, Kenneth Allen, LD, Bus.....	Tacoma

- Metlen, David Warner, UD, Bus...Seattle
 Metsker, Edith Evans, LD, FA.....Seattle
 Metsker, Margaret R, UD, Sci.....Seattle
 Metz, Ernest, LD, Bus.... Post Falls, Ida
 Metz, William Willard, LD, Bus.....Hatton
 Meyer, Flora, LD, Ed.....San Leandro, Cal
 Meyer, Hermann H, LD, LA.....Seattle
 Meyer, Paul Eugene, LD, Min....Quincy, Ill
 Meyer, Rita, UD, LA.....Seattle
 Meyers, Leo Edward, LD, Bus....Colfax
 Michael, Gladys, LD, Ed.....Tacoma
 Michaud, Cecilia, Unc, FA.....Seattle
 Mickelson, Earl Lewis, LD, Sci.....Seattle
 Mickelson, John, LD, Bus....St Maries, Ida
 Middendorf, Roger A, LD, For...Quincy, Ill
 Middlebrook, Curtis, LD, Bus.....Seattle
 Middleton, C M, LD, Min....Vancouver, B C
 Middleton, Eldorn Edson, UD, Phar...Yakima
 Middleton, Howard N, LD, Bus.....Seattle
 Middleton, Hugh, LD, Bus.....Seattle
 Middleton, Keith, LD, Bus.....Seattle
 Mielke, Helen Evelyn, LD, FA.....Spokane
 Mielke, Marie Elizabeth, LD, Bus....Spokane
 Miescke, Paul F, UD, Bus.....Mabton
 Miffelin, Wesley John, LD, LA.....Seattle
 Miglavacca, Sero, LD, Bus.....Bremerton
 Miguel, Lazarte, Unc, ME.....Philippines
 Milby, Arthur Harold, Unc, LA.....Milton
 Miles, Arthur S, LD, Bus.....Seattle
 Miles, John Hunter, LD, For....Chehalis
 Miles, Norris A, Unc, Bus.....Seattle
 Milley, Alfred Wesley, LD, Bus....Everett
 Miller, Alfred, LD, EE.....Seattle
 Miller, Carl Adam, LD, LA.....Seattle
 Miller, Catherine, M, LD, Ed....Aberdeen
 Miller, Charles Edw, LD, CE....Portland, Or
 Miller, Charles John, LD, Bus.....Seattle
 Miller, Edcltrud, Grad, LA.....Seattle
 Miller, Elveta, Leon, LD, Ed.....Seattle
 Miller, George Cleo, LD, EE.....Seattle
 Miller, Donald J, Unc, Bus.....Dalkena
 Miller, Mrs. Elsie, UD, Sci.....Seattle
 Miller, Esther, UD, LA.....McMinnville, Or
 Miller, Ethel Adella, UD, Bus....Yakima
 Miller, Ethel Palmer, LD, FA....Cle Elum
 Miller, Eugene Francis, LD, Bus....Seattle
 Miller, Gilbert, LD, For....Kallispell, Mont
 Miller, Helene Louise, LD, LA.....Seattle
 Miller, Herman Erich, UD, Bus....Spokane
 Miller, Hope Elizabeth, LD, LA.....Seattle
 Miller, Isador, Unc, Bus.....Seattle
 Miller, John Kerr, Jr, LD, ME....Seattle
 Miller, Joseph Anthony, UD, Bus....Seattle
 Miller, Katherine F, LD, LA....Portland, Or
 Miller, Laura Adella, Unc, LA....Seattle
 Miller, Margaret E, LD, LA.....Tacoma
 Miller, Max Carlton, LD, LA.....Everett
 Miller, Mervyn Bernard, LD, For....Seattle
 Miller, Raymond Sylvester, LD, Bus....Tacoma
 Miller, Robert Earl, LD, ME....Puyallup
 Miller, Roy Charles, 2d Law....Seattle
 Miller, Vera Winona, LD, LA.....Seattle
 Miller, Zelma B, LD, Ed.....Goldendale
 Millett, Walter Edward, LD, Bus....Seattle
 Millett, Willard T, LD, For....Seattle
 Millican, Charles Wesley, Grad....Seattle
 Milliman, Leonard Gilbert, LD, LA.....Seattle
 Milliman, Loren H, UD, LA.....Seattle
 Mills, Myrtle Elizabeth, LD, LA.....Seattle
 Mills, James Russell, UD, For....Seattle
 Milne, Donald James, LD, Bus....Seattle
 Milot, Anthony J, LD, LA....Stockett, Mont
 Minahan, Campbell C, LD, Sci.....Seattle
 Miner, Eva Lee, Unc, LA.....Boise, Ida
 Mines, Henry Walker, Unc, LA.....Seattle
 Minch, John McMillan, LD, LA....Seattle
 Minkler, Bird D, LD, CE.....Lyman
 Minshall, Robert James, LD, CE....Tacoma
 Minshall, Mildred Ethel, LD, Sci...Seattle
 Minter, Donald A, LD, Bus.....Tacoma
 Minton, Harriet L, Unc, LA...Los Angeles, Cal
 Mischler, James J, LD, LA....Georgetown, O
 Misra, Beni Madhav, Unc, LA.....India
 Mitchell, Constance, LD, LA....Portland, Or
 Mitchell, John Henry, Sp, For....England
 Mitchell, L Lillian, UD, Ed....Corwith, Ia
 Mitchell, Mrs Lucile H, Unc, FA....Seattle
 Mitchell, Mary Louise, LD, LA.....Seattle
 Mitchell, Mordecai J, Unc, LA.....Seattle
 Mitchell, Verne Henry, LD, Bus...Kennewick
 Mitchell, Walter L, Unc, Bus....Seattle
 Mithong, Otis Julian, LD, EE....Rockford
 Mitsunago, Taiya, Grad....Japan
 Mittelberger Marion C, LD, LA....Seattle
 Miyamoto, Eiji, Sp, Sci.....Japan
 Mock, James G, LD, Bus....Portland, Ir
 Modisett, Loren E, LD, Bus....Kallispell, Mont
 Moeller, Ernest H, Sp, Bus....El Paso, Tex
 Moen, Oley James, Sp, Bus....Bellingham
 Moffat, Thomas Joseph, LD, Phar...Seattle
 Mohr, Esther, UD, LA.....Seattle
 Mohr, Jennie, LD, LA.....Seattle
 Moldstad, H Alphonse, LD, LA....Mt Vernon
 Moldstad, H Corrinne, LD, LA....Mt Vernon
 Moll, Gertrude Celeste, LD, LA....Arlington
 Moll, Cyril A, LD, For....South Bend
 Moncrief, Lester, LD, For....Seattle
 Monroe, George Henry, LD, LA....Ferndale
 Monson, Catherine M, LD, LA....Dungeness
 Monson, McKinley George, LD, Bus...Almira
 Monteagle, Gwendolyn A, UD, LA....Seattle
 Monteagle, Vera Marie, UD, Ed....Seattle
 Montgomery, Florence E, LD, FA....Puyallup
 Montilla, F, Unc, Sci.....Philippines
 Montilla, Jose R, Unc, Sci.....Philippines
 Moody, Clark W, LD, Bus....Vancouver, Wn
 Moody, A Kenneth, UD, For....Sherwood, Or
 Moore, Allan King, LD, Bus.....Spokane
 Moore, Byron Carr, LD, Sci.....Seattle
 Moore, Genevieve, LD, Bus.....Spokane
 Moore, George Edward Jr, Unc, ME...Seattle
 Moore, Gerald Edward, UD, Min.Oakland, Or
 Moore, Geraldine, LD, Bus.....Spokane
 Moore, Harold Edward, Unc, CE....Mt Vernon
 Moore, Kenneth Alexander, LD, Sci.Hoquiam
 Moore, Lillienne, LD, FA.....Seattle
 Moore, Lynn C, LD, Sci.....Wenatchee
 Moran, Charles Gilbert, Unc, Law....Seattle
 Moran, Jean Mildred, UD, Sci....Seattle
 Morash, Marion Nelson, Sp, Phar...Puyallup
 Morcom, Herbert Tolman, LD, LA....Seattle
 Moreland, Mildred, UD, LA....Portland, Or
 Morford, Harold Warren, Unc, EE....Seattle
 Morford, Helen Irene, UD, Ed....Seattle
 Morgan, Alvin Quentin, LD, For....Seattle
 Morgan, Frances, LD, LA.....Hoquiam
 Morgan, Fay Leila, LD, Ed.....Seattle
 Morgan, Gwen, Sp, Sci.....Seattle
 Morgan, Mary Inez, LD, LA.Anaconda, Mont
 Morgan, Ruth Helen, LD, LA.....Seattle
 Morgan, Verona, LD, Bus.....Everett
 Morhous, Delbert, LD, EE.....Seattle
 Moriarty, Francis, LD, Bus....Spokane
 Morimoto, Takaji, Unc, Ed....Seattle
 Morrill, Grace, LD, CE.....Coupeville
 Morris, Alvin S, LD, Bus.....Seattle
 Morrie, Edna Mae, LD, Sci....Kettle Falls
 Morris, Emmet L, Unc, Bus.....Seattle
 Morris, Eunice Florence, LD, Bus....Seattle
 Morris, John Harwood, LD, Bus....Seattle
 Morris, John Robert, Su, Bus....Spokane
 Morris, Katherine Waldron, LD, LA...Seattle
 Morris, Maude E, Sp, LA.....Seattle
 Morris, Morrill J, UD, Sci.....Seattle
 Morris, Ruby, LD, Sci.....Seattle
 Morrison, Anna Kathryn, LD, LA....Seattle
 Morrison, Mary, UD, LA....Frankfort, Ind
 Morrison, Millar A, LD, Bus....Spokane
 Morrison, C, Unc, Law....Frankfort, Ind
 Morrison, Pliny Grant, LD, EE....Seattle

Morrison, Robert, LD, Bus.....Bellingham
 Morrison, Ruth, UD, LA...Frankfort, Ind
 Morrison, Wendell Wallace, LD, Bus.....Buenos
 Morrow, Cecil L, LD, Sci.....Wenatchee
 Morrow, Leona Marie, UD, LA.....Seattle
 Morrow, Ralph, LD, Bus...Long Beach, Cal
 Morrow, Velda Stella, LD, Bus.....Seattle
 Morse, Glenn Erwin, UD, Bus.....Chelan
 Morse, Laura Jeanette, LD, Sci.....Seattle
 Morton, Della G, Sp, FA.....White Salmon
 Morton, Robin, LD, LA.....Seattle
 Moseley, Maud Louise, LD, LA...East Seattle
 Moses, Curtiss Jackson, Sp, ME...Langley
 Mosier, Harry J, Unc, Law.....Tehoa
 Mosler, Nate, LD, Bus.....Seattle
 Mott, Ava Francella, LD, LA...St John
 Mott, Nevlin, LD, ME.....St John
 Motteler, Deryl L, LD, Bus...Leavenworth
 Motz, August J, UD, EE.....Seattle
 Mowan, George William, LD, Bus...Tonasket
 Muckleston, Stanley M, UD, Fish...Seattle
 Mudge, John Samuel, Unc, Bus.....Orencia
 Mueller, Marguerite E, LD, Sci.....Seattle
 Mulhern, Frances Adella, UD, Sci...Seattle
 Mulhern, Jack W, LD, Sci.....Seattle
 Mulkey, Lowene, LD, LA.....Seattle
 Mullen, Doris Fertrude, LD, Sci...Seattle
 Mullin, Samuel Eugene Jr, Sp, LA...Seattle
 Mullin, Samuel Eugene, Sp, LA...Bellingham
 Mullennix, Eleanor A, LD, LA.....Seattle
 Mulvey, Charles R, UD, ME.....Seattle
 Mumby, Mildred, Unc, Sci.....Olympia
 Munoz, Vedasto, LD, Bus.....Philippines
 Munsen, Richard, UD, Bus.....Seattle
 Munson, James Ernest, LD, Fish...Seattle
 Murchlson, Mary, LD, Sci.....Tacoma
 Murphy, Thomas Cowan, LD, LA...Seattle
 Murphy, Ethel, LD, Bus.....Kapaowai
 Murphy, George Daniel, LD, Bus...Seattle
 Murphy, George W, LD, Bus.....Seattle
 Murphy, Harold Morris, LD, Bus...Arlington
 Murphy, Mary E, LD, Sci.....Philippines
 Murphy, Marry Charles, Sp, Bus.....Seattle
 Murphy, Judith Elizabeth, LD, Sci...Kirkland
 Murphy, Julie, LD, Bus.....Portland, Or
 Murphy, Matthew, LD, EE.....Portland, Or
 Murphy, Mildred Pauline, UD, Bus...Seattle
 Murphy, Virgil A, LD, LA...Black Diamond
 Murray, Ann Maude, LD, Bus...Butte, Mont
 Murray, Catherine D, LD, Ed.....Seattle
 Murray, Charles Joseph, LD, Sci...Tacoma
 Murray, J Bryan, Unc, Bus...Sandpoint, Ida
 Murray, Maurice, LD, Bus.....Roy
 Murray, Millard, LD, Bus.....Roy
 Murray, Valois Agnes, LD, Bus.....Seattle
 Murton, Clarence C, LD, LA...Portland, Or
 Muth, R Lawrence, Unc, EE.....Seattle
 Myers, Elmer W, LD, Eng.....Vashon
 Myers, Dicie Mildred, UD, Bus...Sumas
 Myers, Abe, LD, ME.....Seattle
 Myers, Dallas Harold, Unc, LA.....Outlook
 Myers, Donald Pope, LD, Bus.....Seattle
 Myers, Evelyn, LD, LA.....Seattle
 Myers, Jack Wallace, LD, LA.....Seattle
 Myers, Margaret Esther, UD, Sci...Sumas
 Myers, Wendell B, LD, Bus.....Seattle

Nadeau, Mrs. Eleanore, LD, FA.....Seattle
 Nadeau, George F, LD, ME.....Seattle
 Nadeau, Madeline, SC, Fish.....Seattle
 Nager, Pastor P, Jr, LD, Sci...Philippines
 Nagle, Paul Daniel, LD, Phar.....Seattle
 Nagler, Russell A, LD, Sci.....Yakima
 Nagley, Lois Muriel, LD, Ed.....Tacoma
 Nash, Mary Katherine, LD, LA.....Seattle
 Nathan, Kenneth R, LD, EE.....Seattle
 Naugle, Fern Elizabeth, Grad.....Seattle
 Navidad, Jose, Unc, ME.....Philippines
 Neal, Albert Horace, Unc, Bus...Boise, Ida

Neal, Edith, LD, LA.....Anuburn, Neb
 Neal, W Edwin, LD, Bus.....Boise, Ida
 Nederlee, A Louis, UD, CE.....Bryant
 Needham, George Herbert, UD, Phar...Seattle
 Neely, Charles B, UD, LA.....Seattle
 Neely, Sue, LD, Sci.....Tacoma
 Neer, Harry, LD, ChE.....Seattle
 Neer, Margaret Ryta, UD, FA.....Seattle
 Neff, Anna Esther, LD, Sci.....Seattle
 Neff, M L, Unc, LA...Colorado Springs, Colo
 Neft, Fannie D, UD, FA.....Seattle
 Neil, Deloras, LD, LA.....Pendleton, Or
 Neil, Vera Rebecca, UD, Ed...Oak Harbor
 Nelson, Arvid Julius, LD, For...Montborne
 Nelson, Beatrice, LD, FA.....Seattle
 Nelson, Beulah, UD, Sci.....Cashmere
 Nelson, Clarence, Unc, EE.....Kent
 Nelson, Clarence Roy, LD, Fish...Seattle
 Nelson, Commodore M, LD, Eng...Peach
 Nelson, Dwight O, LD.....Peach
 Nelson, Ellen, UD, LA.....Dillon, Mont
 Nelson, Ernest William, LD, Bus...Bickleton
 Nelson, Esther Olive, LD, Sci...Mt Vernon
 Nelson, Everett John, LD, LA...Rolling Bay
 Nelson, Frances Marie, LD, LA.....Seattle
 Nelson, Gertrude E, Unc, Bus...Seattle
 Nelson, Hilding LD, Bus.....Seattle
 Nelson, James B, LD, Min...Seattle
 Nelson, Laura E, UD, LA.....Seattle
 Nelson, Leone, UD, Bus.....Seattle
 Nelson, Minnie Marie, UD, Jour...Seattle
 Nelson, Ned Hillard, LD, ChE...Seattle
 Nelson, Valley Lily, LD, Sci...Tacoma
 Nelson, Victor, UD, CE.....Winslow
 Nelson, Walter Abraham, Unc, EE...Seattle
 Nemerovsky, Lena L, UD, Sci...Long Beach
 Nemiro, Margaret, LD, LA...Portland, Or
 Nerland, Arthur Leslie, LD, Bus...Seattle
 Nesbitt, Herbert C, UD, For...Goldendale
 Nettleton, Alice Marie, LD, LA...Tacoma
 Nettleton, Emily, UD, LA.....Tacoma
 Neubauer, Herbert F, LD, Sci...Tacoma
 Neumann, Eleanor, LD, LA.....Seattle
 Neumann, Russell Alfred, LD, ME...Seattle
 Neville, J Adrian, LD, CE.....Seattle
 Nevins, C Stewart, LD, Bus.....Seattle
 Newbury, Earl P, LD, FA...Portland, Or
 Newcomb, Muriel R, Unc, FA...Olympia
 Newcomb, Wallace R, Sp, Fish...Olympia
 Newdall, Clifford Olaf, LD, FA...Leavenworth
 Newdall, Merritt, LD, Bus...Leavenworth
 Newell, Laura Evangeline, UD, Sci...Everett
 Newell, Robert Louis, UD, Phar...Everett
 Newlove, Gwendolyn G, LD, LA...Ft Lawton
 Newman, Andrew William, Unc, Law...Elma
 Newman, Anne, LD, LA.....Everett
 Newman, Leo Lewis, Sp, Bus...Gt Falls, Mont
 Newton, Mary Howe, LD, LA...Portland, Or
 Newton, Paul S, LD, Bus...Bellingham
 Newton, Stanley Edward, Unc, Bus...Spokane
 Ney, Marie Esther, LD, Ed.....Seattle
 Niblock, Rachel Elizabeth, LD, LA...Seattle
 Nicholson, Bjorn, LD, Bus.....Seattle
 Nicholls, Clyde, Unc, ME...Wilson Creek
 Nichols, Harold, LD, Sci.....Seattle
 Nichols, Howard B, LD, ME...Seattle
 Nichols, Lucile E, LD, FA.....Seattle
 Nicholson, Catherine, Unc, FA...Chicago, Ill
 Nicholson, Lee Roy, Unc, Bus...Ellensburg
 Nicholson, Leo Stanley, LD, LA...Heppner, Or
 Nicholson, Marjorie, UD, Ed.....Seattle
 Nicholson, Robert Sinclair, LD, Bus...Seattle
 Nickel, Lucille Fredericka, LD, LA...Monroe
 Nickerson, Priscilla, LD, Bus...Seattle
 Nicol, Mildred E, Unc, Bus...Garden Home, Or
 Nicolai, Florice, LD, Bus...Sunnyside
 Nieder, David Lewis, LD, LA...Seattle
 Nielson, William, LD, Bus...Spokane
 Niemela, Jennie Marie, LD, Sci...Kent
 Niemela, Lorens W, LA, LA...Centerville

- Nievinski, Joseph, LD, LA.....Seattle
 Niles, Carson Perry, Unc, Bus.....Everett
 Nisho, Frank, LD, EE.....Seattle
 Nissirios, Philip, UD, LA.....Portland, Or
 Nitschke, Paul H, LD, Sci.....The Dalles, Or
 Nix, Martha, UD, LA.....Dresden, Tenn
 Noble, Alvord, D, LD, ME.....Seattle
 Noel, Lionel Samuel, LD, EE.....Snohomish
 Nolan, Michael John, LD, ChE.....Seattle
 Nolan, Vincent A, Su, Bus.....Seattle
 Noll, Mark Daniel, LD, Bus.....Seattle
 Nordahl, John Gustafson, LD, EE.....Seattle
 Nordale, Alton G, LD, Bus.....Alaska
 Nordale, Anita M, LD, En.....Seattle
 Noebdy, Gladys, LD, LA.....Pt Orchard
 Nordby, Margaret Anna, LD, Bus.....Seattle
 Nordholm, Olga Eleanor, LD, LA.....Yakima
 Nordlie, Glenn Justin, LD, EE.....Seattle
 Nordquist, Elsie E, LD, LA.....Gt Falls, Mont
 Norquist, Melvin A, LD, Bus.....Seattle
 Nordstrom, Esther, LD, FA.....Tacoma
 Nordstrom, Everett, LD, Bus.....Seattle
 Norgaard, Adolph, LD, LA.....Fargo, N D
 Norgore, Martin, UD, Fish.....Seattle
 Norlen, Esther Theresa, LD, LA.....Riverton
 Norlie, James Lester Jr, LD, ME.....Seattle
 Norling, Mrs. Josephine S, Grad.....Seattle
 Norman, Carl August, LD, ME.....Chico
 Norman, Evelyn, UD, Sci.....Seattle
 Norris, Guy James, LD, LA.....Burlington
 Norris, Ralph, LD, Bus.....Medford, Or
 North, Charles Quay, Grad.....Seattle
 Northfield, Donald J, LD, Bus.....Seattle
 Northfield, Walter Daniel, UD, Bus.....Seattle
 Northquist, Oscar Eaver, UD, ME.....Seattle
 Norton, Alice J, LD, Bus.....Deer Harbor
 Norton, Mamie Belle, UD, Ed.....Seattle
 Norton, Robert, Unc, Law.....Olympia
 Norton, Theodore Eli, LD, LA.....Tacoma
 Norway, Charis Julia, LD, LA.....Seattle
 Norwood, Helen E, Unc, GA.....Seattle
 Nottingham, William, Unc, Bus.....Seattle
 Novlan, E Patricia, LD, LA.....Seattle
 Norwak, Helen M, LD, Ed.....Seattle
 Nuelsen, Harry Edward, LD, Bus.....Spokane
 Nuguld, P Alfonso, LD, ME.....Philippines
 Null, John Edward Jr, LD, LA.....Seattle
 Null, Dr M M, Grad.....Seattle
 Nusbaum, Dean, LD, LA.....Nampa, Ida
 Nusbaum, Emory F, LD, ChE.....Tacoma
 Nutley, Cyril Arthur, LD, Bus.....Seattle
 Nutley, Lucile, Sp, FA.....Seattle
 Nydin, Alf Clarence, LD, Bus.....Seattle
 Nygard, Erik, LD, EE.....Seattle
 Nyman, Andrew Dewey, LD, EE.....Custer
 Nyquist, Marie, LD, Phar.....Seattle
- Oakes, Ruth Elise, LD, Sci.....Seattle
 Oakley, Mary, Grad.....Seattle
 O'Brien, John Jennings, Sp, Law.....Seattle
 O'Brien, Margaret H, LD, LA.....Seattle
 O'Brien, Paul, UD, Bus.....Conrad, Mont
 O'Brien, Stephen James, Unc, LA.....Tacoma
 Obye, Herschel, LD, Bus.....Yamhill, Or
 O'Callaghan, V, UD, Bus. Bonners Ferry, Ida
 Ochao, Eusebio, Unc, CE.....Philippines
 Ochs, Martha, LD, Sci.....Harrington
 O'Connell C W, LD, Bus.....Kallispell, Mont
 O'Connell, Helen M, LD, FA.....Kallispell, Mont
 O'Connell, John W, SC, Min.....Seattle
 O'Connell, A, Unc, For.....Westminster, B C
 O'Connor, Frank M, LD, Bus.....Seattle
 O'Connor, J Matthew, UD, LA.....Seattle
 O'Connor, Joseph Anthony, LD, LA.....Seattle
 Odegard, Paul, LD, ME.....Kallispell, Mont
 Odegard, Peter H, LD, LA.....Kallispell, Mont
 Odenrider, Edith M, LD, FA.....Govan
 Oederl, Dan T, Unc, Law.....Blaine
 O'Farrell, Kathleen, UD, Ed.....Seattle
- O'Flynn, Margaret, LD, Bus.....Butte, Mont
 Ogata, Kokichi, Unc, Bus.....Japan
 Ogden, Edwin Liles, LD, Sci.....Hoquiam
 Ogden, Melba L, LD, FA.....Chelan
 Ogilvie, Lillian Marie, LD, LA.....Tolt
 Ohtaguro, Toshio, Grad.....Japan
 Okajima, Thelma, Unc, Ed.....Seattle
 O'Keefe, Jessie V, LD, Sci.....Seattle
 O'Keefe, Marie E, LD, Sci.....Seattle
 O'Leary, John Emmett, LD, CE.....Mt Vernon
 Oleson, Mildred Elizabeth, LD, LA.....Seattle
 Oleson, Thomas Reginald, LD, Bus.....Seattle
 Olin, Thomas Hamilton, LD, Bus.....Seattle
 Oliver, J, LD, Min.....Douglas, Alaska
 Oliver, Egbert Samuel, LD, Ed.....Aberdeen
 Oliver, Roneta, LD, LA.....Seattle
 Olmstead, Esie Veda, LD, FA.....Enterprise, Or
 Olmsted, Fred M, LD, LA.....Coeur d'Alene, Ida
 Olsen, Alf Edwin, LD, Eng.....Redmond
 Olsen, Amos, Sp, Bus.....Coeur d'Alene, Ida
 Olsen, Beatrice Agnes, LD, LA.....Tacoma
 Olsen, Carl, LD, CE.....Stanwood
 Olsen, Esther Olinda, LD, LA.....La Center
 Olsen, Helen Marie, LD, LA.....Seattle
 Olsen, Harold L, Sp, Eng.....Seattle
 Olsen, Orville, LD, EE.....Seattle
 Olsen, Thomas L, LD, LA.....Seattle
 Olson, Beatrice, LD, Sci.....Madras, Or
 Olson, Carl, LD, LA.....Seattle
 Olson, Doris, LD, LA.....Tacoma
 Olson, Helen Frances, UD, Ed.....Seattle
 Olson, Lillian, UD, Sci.....Mt Vernon
 Olson, Marguerite, UD, Ed.....Tacoma
 Olson, Norma Lucille, LD, FA.....Seattle
 Olson, Olga, LD, LA.....Madras, Or
 Olson, Sigurd John, LD, Bus.....Blaine
 Olson, Theodore L, LD, Bus.....Rolling Bay
 Olson, William J, Grad.....Seattle
 Olwell, Eugene Edward, LD, Bus.....Seattle
 Olwell, Murray M, LD, Bus.....Seattle
 O'Neal, Harold, Elmo, LD, Sci.....Yakima
 O'Neil Albert, LD, Min.....Portland, Or
 O'Neill, Muriel Rita, LD, Bus.....Spokane
 O'Neill, Agnes Virginia, UD, Ed.....Spokane
 O'Neill, Allen L, Unc, Bus.....Mt Home, Ida
 O'Neill, Hilbert E, Unc, ChE.....Castle Rock
 O'Neill, Larkin A, LD, Mus.....Mt Home, Ida
 O'Neill, Thomas R, LD, Bus.....Shelton
 O'Neill, Wm Thos, Unc, Bus.....Mt Home, Ida
 Ong, Emma Zella, LD, FA.....Seattle
 Onsum, Elizabeth Estelle, LD, FA.....Seattle
 O'Rear, Clyde Shaw, UD, ME.....Seattle
 Orne, Stanley, UD, LA.....Seattle
 Orosa, Jose, Unc, Bus.....Philippines
 Orosa, Maria Y, Grad.....Philippines
 Orr, Alfonso Dwight, LD, Bus.....Tacoma
 Orr, Dwight, LD, Bus.....Tacoma
 Orr, Edna Gladys, LD, Ed.....Centralia
 Orr, Gilbert M, LD, For. So Brownville, Pa
 Orr, Paul J, UD, Ed.....Redmond
 Orr, Robert L, Sp, Eng.....Portland, Or
 Orr, Sumner Emmert, Unc, EE.....Tacoma
 Orrell, Jessie, UD, Ed.....Seattle
 Orrett, Barbara Prentiss, LD, Bus.....Tacoma
 Orth, Maurice William, LD, LA.....Seattle
 Osa, Lorens August, LD, Sci.....Tacoma
 Oscar, Orland Albert, LD, Bus.....Seattle
 Osgood, Ernest Wilkins, LD, FA.....Seattle
 O'Shea, Daniel George, LD, ME.....Spokane
 Ostensen, Floyd Clifford, LD, Sci.....Bremerton
 Ostensen, Harold B, UD, LA.....Bremerton
 Osterud, Nena Dorothea, UD, Sci.....Seattle
 Ostrand, Hildur W, UD, LA.....Seattle
 Ostrander, Ruth E, UD, Sci.....Seattle
 Ostrom, Cyrus Warren, UD, EE.....Seattle
 Otis, Kenneth DeLong, LD, Bus.....Seattle
 Otis, Leota Beatrice, UD, LA.....Olympia
 Otis, Virgil Bruce, Unc, Bus.....Olympia
 Ouellette, Margaret, Unc, LA.....Olympia
 Ouellette, Victor Robert, LD, LA.....Olympia

Overguard, Julia O, Sp, Sci...Turner, Or
Overman, Marion Gray, Grad.....Spokane
Overton, Hubert E, LD, Bus.....Olympia
Owen, Mrs. Elizabeth, Sp, Ed.....India
Owen, Evelyn, Grad.....Seattle
Owen, William C, Sp, LA.....Seattle
Owsley, Joseph, UD, EE.....Seattle
Oxman, J Donald, Unc, Bus...Jamleson, Or

Pace, George La F, LD, CE.....Tacoma
Pacey, John George, LD, Bus.....Seattle
Packard, Augustus H, Grad.....Seattle
Packard, Dexter R, LD, ChE.....LaConner
Packard, Edmund, LD, LA.....Seattle
Packard, Marjorie M, LD, LA.....Seattle
Packer, Florence M, LD, Ed.....Seattle
Padden, Mildred F, LD, LA.....Seattle
Padden, Peggy Emily, LD, FA.....E Seattle
Paddock, Faith E, UD, LA.....Nordland
Padelford, Morgan G, LD, FA.....Seattle
Page, Celeste, LD, FA.....Matsqui
Page, Elvie B, Grad.....Olympia
Page, Harold Edwin, LD, Bus.....Seattle
Page, Russell G, LD, Bus.....Sunnyside
Pagett, Stuart M, LD, ChE.....Portland
Paine, Carol M, UD, LA.....Boise, Ida
Paine, Lawrence C, Unc, LA.....Spokane
Palapac, Juan, LD, CE.....Philippines
Palmborn, Elmer J, Unc, Bus.....Kirkland
Palmer, Burton E, LD, Min...Portland
Palmer, Carolyn R, LD.....LA Grande, Or
Palmer, David B, Sp, EE.....Seattle
Palmer, James H, Sp, Law.....Seattle
Palmer, Stuart C, Unc, Bus.....Ellensburg
Palmquist, Albert J, LD, Phar..Enumclaw
Panchot, Dwight H, LD, Bus.....Seattle
Pardo, Jess Allen, LD, ME.....Seattle
Parent, Amand, LD, CE.....Tacoma
Parish, Herbert I, LD, Bus.....Seattle
Park, Arthur Brock, LD, CE.....Seattle
Park, Etta Madge, LD, Ed.....Seattle
Parker, Lester T, LD, LA.....Elma
Parker, Marie N, LD, Ed.....Seattle
Parker, Nancy B (Mrs), LD, Ed.....Seattle
Parker, Sam, UD, Sci.....Seattle
Parkins, Wright A, LD, ME.....Seattle
Parks, Clarence, LD, Fish.....Pt Angeles
Parks, Edith K, LD, FA.....Daisy
Parks, John F, LD, Min.....Seattle
Parks, Wallace G, LD, LA.....Seattle
Farr, James Floyd, LD, EE..Platte City, Mo
Parrington, Elizabeth, LD, LA.....Seattle
Parrish, Faith R, Unc, Bus.....Seattle
Parris, Hazel (Mrs), LD, Bus.....Seattle
Parrish, Frank Jr, LD, Bus.....Seattle
Parrish, Karl Britton, LD, Bus...Seattle
Parrish, J. Roscoe, LD, Phar.....Seattle
Parrott, Edith Marie, LD, Ed.....Seattle
Parry, George Stanley, LD, Bus..Coulee City
Parsons, Elvey Tillman, Grad.....Seattle
Partlow, Katherine, LD, Sci.....Olympia
Partridge, Ruth E, LD, FA.....Seattle
Pascual, Felix, LD, Ed.....Seattle
Patchett, Glenn Albert, UncFor..Ellensburg
Pattin, Wilbur Harmon, Grad.....Seattle
Patek, Ralph Carroll, Unc, Law.....Seattle
Paterson, Charles Raff, UD, For...Australia
Paterson, Robert Arden, LD, Bus...Spokane
Paton, Donald Grant, LD, Bus...Cashmere
Patrick, Ellen Kearney, LD, Bus.....Seattle
Patten, Ethel Mae, UD, LA.....Seattle
Patterson, W Albert, LD, LA.....Bellingham
Patterson, George, LD, LA.....Hollywood, Cal
Patterson, Hiram Scofield, Grad.....Seattle
Pattison, Evelyn, UD, FA.....Seattle
Pattison, Everett, LD, Bus.....Heppner, Or
Patton, Richard Will, LD, CE.....Yakima
Patty, Frank Arthur, Grad.....Seattle
Patzold, Oswald E, LD, Ed.....Seattle

Paul, Mrs. Alice Paine, Grad.....Seattle
Paulik, Andrew, LD, EE.....Carbonado
Paulsen, Mary Angeline, LD, Phar...Seattle
Paulsen, Pauline A, LD, Sci.....Seattle
Paulson, Harry Winfred, Unc, Sci...Seattle
Paup, Everett, LD, Bus...Ketchikan, Alaska
Peake, Roswell B, LD, Bus.....Seattle
Pearce, John Kenneth, UD, For...Yamhill, Or
Pearson, Della M, Sp, Sci.....Entiat
Pearson, Grace Isabel, LD, LA.....Seattle
Pease, Myrle Elverd, LD, EE...Marysville
Pease, Paul, LD, Bus.....Tacoma
Peaslee, George Monroe, LD, Min...Seattle
Peden, Barton Edward, UD, Sci...Yakima
Pederson, Marie Ethel, Sp, Sci...South Bend
Pederson, Myrtle Florence, Unc, LA...Seattle
Peebles, Orville Edward, LD, LA...Hoquiam
Peek, Loyd A, Unc, Bus.....Seattle
Pelton, Lester Albert, LD, Bus...Spokane
Pelz, Freda, UD, Bus.....Seattle
Pelz, Irma, LD, Sci.....Seattle
Penas, Nazario, Sp, For...Philippines
Pendleton, Francis Stanley, LD, Bus..Everett
Pendleton, Helen E, LD, LA.....Everett
Penewell, Marion Frances, LD, Sci...Seattle
Penland, Elledge Randolph, LD, Law..Seattle
Penn, Joe, LD, Bus.....Seattle
Pennell, Dorothy W, LD, LA.....Seattle
Pennell, Geneva Estora, LD, FA.....Seattle
Pentzer, Kathryn, LD, FA.....Seattle
Pepper, Echo, Grad.....Seattle
Pepper, Leah H E, UD, LA.....Seattle
Perego, William H, LD, Ed...Nehalem, Or
Perelle, Emma May, LD, Ed..Jumeau, Alaska
Perkins, Frank Raymond, LD, LA..Montesano
Perkins, Georgia, LD, Ed.....Seattle
Perkins, Julian F, LD, Bus.....Tacoma
Perkins, Melville F, LD, Che..Pt Stellacomo
Perkins, Sam Houston, Unc, Bus...Montesano
Perlin, Solomon, LD, CE.....Seattle
Perrine, Charles S, LD, LA..Twin Falls, Ida
Perry, Gladys H, LD, Bus.....Portland, Or
Perry, Mary Bishop, LD, LA.....Tacoma
Perry, Warren L, LD, LA.....Tacoma
Persons, George Allan, LD, EE...Clarkston
Pessemier, Claire, LD, FA.....Tacoma
Peters, John A, Unc, ChE...Sandpoint, Ida
Peters, C Louis, LD, Bus...Sandpoint Ida
Petersen, Allen, LD, Bus..Coeur d'Alene, Ida
Peterson, Agnes, LD, LA.....Moscow, Ida
Peterson, Anita Mary, UD, Ed...Tacoma
Peterson, Carrie H, UD, Ed...Wardner, Ida
Peterson, Eldon, Unc, Bus.....Granger
Peterson, Elvera, Unc, Sci...Jackson, Mont
Peterson, Estella C, Unc, Sci.....Seattle
Peterson, Gladys L, UD, Sci.....Seattle
Peterson, Grace H Sp LA.....Seattle
Peterson, Harold Kenneth, Sp, ME...Seattle
Peterson, Howard H, LD, ME...Walla Walla
Peterson, John Howard LD, EE...Sunnyside
Peterson, Ivor August, LD, For...Seattle
Peterson, Jennie, Grad.....Moscow, Ida
Peterson, Edward Jennings, LD, LA..Seattle
Peterson, Katherine W, LD, Bus..Spokane
Peterson, Nelson Richard, LD, Phar..Everett
Peterson, Ornette, LD, LA...Leavenworth
Peterson, Thelma Ruble, Unc, FA...Granger
Peterson, Trumond, LD, EE...Portland, Or
Peterson, Wallace C, UD, Bus.....Seattle
Peterson, Walter Robert, LD, Sci..Pt Blakely
Peterson, Wendell Floyd, LD, Bus...Seattle
Peterson, William, LD, Bus.....Clarkston
Petit, Thomas A, LD, LA.....Ilwaco
Petley, Dorothy Louise, Unc, FA.....Seattle
Petrie, James, LD, LD, Eng.....Seattle
Petty, Gladys, UD, Jour.....Centralla
Pettit, Helen, LD, Sci.....Seattle
Pettitt, Ruth, LD, LA.....Kent
Pettyjohn, Carrie, LD, Sci.....Prescott
Peycke, Gertrude C, LD, LA.....Seattle

Peyser, Ethan Allen, 2d Law..Cedarhurst	Porter, Dott, LD, Sci.....Seattle
Praefter, Carolyn, LD, LA.....Boise, Ida	Porter, Edith Margaret, LD, LA.....Seattle
Pfeuffer, Philip, LD, Sci.....Grangeville, Ida	Porter, John C, LD, Bus.....Seattle
Pfeuffer, Rosa K, LD, Bus.....Grangeville, Ida	Porter, Marie Clara, LD, Ed.....Seattle
Philan, Edward Newhall, LD, Bus.....Everett	Porter, Mary Elizabeth, LD, LA.....Seattle
Phelps, Grace Marie, UD, Sci.....Dryad	Portmann, Frieda B A, Unc, LA.....Tacoma
Phelps, Howard Rodney, LD, EE.....Tacoma	Posadas, Saturnino B, Unc, ME..Philippines
Phillips, Beth, LD, Sci.....Seattle	Potter, Claude Arthur, LD, ME..Ridgefield
Phillips, Philip Marquis, UD, Bus.....Yakima	Potter, Paul Stevens, LD, Min.Lake Crescent
Phillips, J Clarence, LD, Bus.....Almira	Potter, Ray Marley, LD, Bus.....Seattle
Phillips, Constance, LD, LA.....Seattle	Powell, Annie T, Sp, Sci.....Roslyn
Phillips, Herbert, LD, Eng.....Seattle	Powell, Charles Lawrence, LD, LA.....Selah
Phillips, Jack William, LD, Phar.....Haddock	Powell, Charles Edward, LD, Sci.Bellingham
Phillips, Kenneth G, LD, Fish.....Kelso	Powell, Emmogene, LD, Bus.....Chehalis
Phillips, Opal C, LD, LA.....Seattle	Powell, Frederick Jr. LD, ChE.....Tacoma
Phillips, Phyllis, LD, FA.....Seattle	Powell, Howard E, LD, LA.....Eugene, Or
Phillips, Ruth Irene, LD, LA.....Seattle	Powell, Josephine, Unc, Bus.....Chehalis
Phillips, Samuel, LD, LA.....Seattle	Powell, William R, LD, LA..Kamloops, B C
Phippis, Guy Francis, LD, LA.....Tekoa	Powers, Anna M, UD, Ed.....Seattle
Platt, Genevieve Mary, UD, LA.....Seattle	Powers, Francis Fountain, LD, LA..Tacoma
Platt, Patricia M, LD, LA.....Seattle	Powers, Francis Joseph, LD, Bus.....Seattle
Pickard, Burt Wellington, LD, Bus.....Seattle	Powers, Marie Kraft, LD, LA.....Seattle
Pickard, Geneva C, LD, LA..Ekalaka, Mont	Powley, Louise Wilmot, LD, Sci.....Seattle
Pickering, Charles J, LD, Ed.....Seattle	Poy, Clarence W, LD, EE.....Portland, Or
Pickrell, Lenore, LD, Sci.....Spokane	Poyasky, Eva Sophia, LD, Sci.....Astoria, Or
Pidduck, Marjorie K, LD, LA.....Seattle	Poyasky, Tyne Christine, UD, LA..Astoria, Or
Pidduck, Stella Victoria, LD, FA.....Seattle	Prager, William Abram, LD, LA.....Seattle
Pierce, Ansley Francis, LD, Bus.....Puyallup	Pratt, Helen Van Ness, UD, Bus.....Seattle
Pierce, Clarence, LD, LA.....Portland, Or	Pratt, James Weidon, LD, ME.....Tacoma
Pierce, Florence Barbara, LD, Sci.....Seattle	Pratt, Reginald, LD, ME.....Spokane
Pierce, Warren David, LD, Bus.....Seattle	Preppernau, Charles Waldron, LD, For.Kent
Pierson, Helen G, LD, LA..Billings, Mont	Presley, Grace, Unc, FA.....Newport, Or
Pierson, Ivan Frithjof, LD, Bus.....Seattle	Prescott, Daniel Corbin, LD, ME..Spokane
Pigott, R Stephen, LD, EE.....Seattle	Prescott, John Edward, LD, EE.....Seattle
Pigott, Thomas W, Sp, Eng..Port Angeles	Preston, Dorothy A, LD, Sci.....Everett
Pigott, William, UD, Min.....Seattle	Preston, Morris E, LD, Eng.....Seattle
Pihlgren, Freda, LD, FA.....Seattle	Preston, Louisa Byrne, UD, Sci.Portland, O.
Pilgerrim, Arthur, LD, Sci..Twin Falls, Ida	Price, Arthur F, LD, For.....Duncan, B C
Pinnott, Keith, LD, EE.....Rossland, B C	Price, Elma Faye, LD, FA.....Milton, Or
Pinkerton, J Lloyd, Unc, CE..Fairbanks, A	Price, Harry, Unc, Eng..Miles City, Mont
Pinkerton, Ralph Willis, LD, LA.....Tacoma	Price, Hobart McKinley, Unc, Phar..Seattle
Pinney, Marcus J, LD, Bus.....Ontario, Or	Price, Lloyd D, Sp, Eng.....Scappoose, Or
Piscitelli, Angeline, LD, Sci.....Seattle	Price, Miles, Sp, Bus.....Seattle
Piscitelli, Mary, Unc, FA.....Seattle	Price, S Marjorie, Unc, FA.....Seattle
Pitcher, Helen D, LD, FA.....Port Madison	Price, Ruth, LD, LA.....Seattle
Pitcher, Susannah C, LD, Bus..Centralia	Price, Vera La Ville, Unc, LA..Scappoose, Or
Piterson, Palmer, LD, CE.....Silverdale	Priest, Constance, LD, Bus.....Seattle
Pittmann, William Henry, UD, LA..Latah	Prigmore, Robert Hart, LD, LA.....Seattle
Pitka, Arthur J, LD, Bus.....Oakland, Cal	Prim, Earl Burton, LD, EE.....Sequim
Pittwood, Loula, LD, Bus.....Seattle	Prim, John Edmondson, LD, LA.....Seattle
Pitzer, Carl August, LD, FA.....Tacoma	Pritchett, Charles S, LD, Sci.Freewater, Or
Pizarro, Orsino, LD, Sci.....Philippines	Priteca, Esther A, LD, LA.....Seattle
Place, Lester Howard, LD, EE.....Tacoma	Prottas, Sam, LD, Phar.....Seattle
Plank, Alta Mae, LD, LA.....Yakima	Protzman, George P, LD, Law.....Seattle
Platt, Ruth Elizabeth, LD, Sci.....Seattle	Provan, Olive E, UD, Sci.....Woodinville
Plummer, Frank M, LD, Bus..Pt Townsend	Fugh, Anne Clough, UD, Ed.....Seattle
Pochert, Arthur Dean, LD, Sci.....Tacoma	Pugsley, Walter Herbert, UD, Fish.....Seattle
Pole, Gordon R, LD, ChE.....Tacoma	Purcell, William, Unc, Min..Rossland, B C
Polley, Lewis Welch, Unc, Bus.....Edmonds	Purdy, Eugene H, Unc, ME.....Seattle
Pollock, Barbara, LD, LA.....Seattle	Purvis, Lois Freda, UD, Sci.....Sumner
Pollock, Dorothea, UD, LA.....Spokane	Putnam, L Edmond, LD.....Winslow, Min
Pollock, Maxwell, LD, EE.....Seattle	Putnam, Marguerite E, UD, Lib.....Seattle
Pollom, Arthur Devere, Unc, LA.....Seattle	Puymbroeck, Lena, LD, FA.....Oswego, Or
Pollom, Raymond E, LD, Bus.....Chehalis	
Polson, Charles Stuart, LD, For..Hoquiam	
Pond, Elizabeth Bradford, LD, LA.....Seattle	
Ponder, Russell Lee, LD, LA.....Chehalis	
Pool, Esson Jacob, LD, Bus.....Wenatchee	
Pool, William Franklin, LD, LA.....Seattle	
Poole, Bonnie Lucile, LD, LA.....Seattle	
Poole, Florence Alice, LD, Ed.....Seattle	
Poole, Leona, Unc, LA.....Rexburg, Ida	
Pooley, Frank B, Sp, Eng.....Spangle	
Pooleton, Arthur, LD, LA.....Seattle	
Poole, Esther, LD, Bus.....Seattle	
Pope, Augustus Russell, UD, ME.....Seattle	
Pope, Ezra T, UD, ME.....Seattle	
Forep, Ed, UD, Bus.....Seattle	
Porsch, Rhyhart Albert, LD, Bus.....Roy	
Porter, Barton Frederick, LD, Bus..Thorp	
	Quanstrom, Ellen Marie, LD, Bus..Seattle
	Quass, Harry P, LA, Phar.....Cheney
	Quevil, Chester Jr, LD, Sci.....Tacoma
	Quick, Nell, Unc, Bus.....Tacoma
	Quigle, Helen Elizabeth, LD, LA.....Seattle
	Quigley, Clarence Black, LD, Bus.....Seattle
	Quifano, Alfredo S, Unc, Law..Philippines
	Quimosing, Dionisio, LD, ChE..Philippines
	Quinlivan, Quentin Leroy, LD, Sci..Everett
	Quinn, Elmer Joseph, LD, Bus.....Seattle
	Quinn, John Bernard, LD, EE.....Kent
	Rackerby, Theo E, LD, Bus.....Seattle
	Rademaker, Lee Albert, LD, Sci.....Tacoma

Rader, Bernard Henry, LD, Bus. Ontario, Or
 Rader, Martha Bernice, LD, Sci. Walla Walla
 Radford, Ethel S, Grad. Seattle
 Rae, Margaret M, LD, LA. Seattle
 Rader, Marta, LD, Sci. Walla Walla
 Rafn, Harold, LD, Sci. Puyallup
 Raine, Margaret Muir, LD, LA. Seattle
 Raines, Harold, LD, LA. Seattle
 Ramm, Aubrey Gillespie, Unc, EE. Seattle
 Ramos, Rufino, LD, CE. Philippines
 Ramsay, James S, UD, Bus. Ellensburg
 Ramsey, Edward Orville, UD, Bus. Boise, Ida
 Ramsey, Mary Vivian, Unc, Sci. Seattle
 Ramsey, Rachel, LD, LA. Sandpoint, Ida
 Ramstead, Alvin Clifford, LD, Bus. Everett
 Ranthum, Lucile, LD, Bus. Chehalis
 Randal, Dudley Knox, Unc, Bus. Seattle
 Randolph, Stanley N, LD, Bus. Kennewick
 Rank, Carroll Price, LD, Bus. Cashmere
 Rankin, Park W, Unc, Eng. Yakima
 Ranley, Edna M C, LD, LA. Tracy, Cal
 Ranning, Fred, LD, Bus. Seattle
 Raport, Rubin W, LD, EE. Seattle
 Rapp, Peter G, Bus. Seattle
 Rasmussen, Fred Neil, LD, CE. Seattle
 Rasmussen, George Vincent, LD, Ed. Seattle
 Rasmussen, Helen, LD, Bus. Kent
 Rasmussen, Ralph David, LD, FA. Tacoma
 Ratcliffe, Kent B, Grad. Cheney
 Rath, Martha A, UD, Sci. Vancouver, B C
 Rathbun, John Hall Jr, LD, EE Chicago, Ill
 Ratigan, Thomas, Grad. Seattle
 Rauch, Bernardine, LD, FA. Pomeroy
 Raven, Robert S, UD, Bus. Monroe
 Ray, Doris B, UD, Bus. Yakima
 Raymond, Harold, LD, Phar. Bellingham
 Raymond, Rena K, Grad. Seattle
 Reaber, O Maurice, Unc, Bus. Seattle
 Readman, Florin, LD, LA. Seattle
 Reagan, John Ashworth, Unc, Bus. Seattle
 Reaney, Margaret M, LD, FA. Everett
 Recart, Horacia, LD, For. Santiago, Chile
 Reddy, Anthony E, LD, LA. Medford, Or
 Redinbaugh, Dorothy D, LD, Sci. Seattle
 Redfield, Edith, Sp, LA. Seattle
 Redington, Bryan, LD, ChE. Seattle
 Redington, Elizabeth M, Unc, LA. Seattle
 Redmond, Dorothy, LD, FA. Yakima
 Redmond, Harold Vincent, LD, Min. Seattle
 Redpath, Harry Stuart, LD, LA. Helena, Mt
 Redpath, Lindley R, Unc, Bus. Seattle
 Reed, Earl B, LD, Bus. Seattle
 Reed, Eva Isabelle, LD, Bus. Reedsport, Or
 Reed, Helen V, Unc, Bus. Milwaukee, Wis
 Reed, James Judson, LD, Bus. Kennewick
 Reed, Jennie M, Grad. Tacoma
 Reed, Leo Burkhardt, LD, Bus. Redmond
 Reed, Lucile Ida, UD, FA. Spokane
 Reed, Winona, Unc, Ed. Ellensburg
 Reeder, Ardis Harold, Unc, Bus. Tacoma
 Reeder, Thomas August, LD, Bus. Seattle
 Reeder, Joseph McAlister, LD, LA. Seattle
 Reedy, Frances M, UD, Sci. Tacoma
 Reekie, Dick, LD, EE. Seattle
 Reye, James B, Sp, Bus. Seattle
 Reese, Richard H, Sp, Bus. Concrete
 Reeves, Harold Jaye, Unc, Bus. Portland, Or
 Regan, Frank T, LD, For. Boise, Ida
 Regan, Willard P, LD, Bus. Boise, Ida
 Rehm, Flays, LD, EE. Chehalis
 Rehm, Sidney Juliet, LD, Ed. Chehalis
 Reinert, Luella Alice, Unc, Bus. Anacortes
 Reibert, Carlton George, LD, Bus. Seattle
 Reid, Elizabeth Jean, LD, LA. Tacoma
 Reid, Florence Emma, LD, Bus. Govan
 Remington, Arthur B, LD, EE. Mott, ND
 Remley, Andra Mae, LD, Phar. Centralia
 Remley, Miriam, UD, LA. Dryden
 Renfro, Harold Edward, LD, EE. Seattle
 Renner, Frederic George, Grad. Wenatchee

Rennie, Wesley F, Grad. Seattle
 Reno, Beatrice, LD, LA. Portland, Or
 Renshaw, Harold Byron, LD, Bus. Spokane
 Renton, Robert Waters, Sp, Bus. Yakima
 Resos, Eugenio, LD, CE. Philippines
 Ressler, Paul C, LD, Bus. Pamosa, Cal
 Reymore, Theta, LD, Ed. Cheyenne, Wyo
 Reynolds, Alice Louise, LD, FA. Portland, Or
 Reynolds, Burton Mark, LD, Min. Seattle
 Reynolds, Dorothea, LD, LA. Seattle
 Reynolds, Elliott Woodson, LD, LA. Seattle
 Reynolds, Jack W, Unc, Law. Seattle
 Reynolds, Marguerite, LD, LA. Seattle
 Reynolds, Richard Williams, LD, Bus. Seattle
 Reynolds, Sewall Leroy, LD, EE. Seattle
 Rhoads, Stephen C, Unc, Bus. Payette, Ida
 Rhodes, Fred Harold Jr, LD, ME. Seattle
 Rhodes, Leonard, LD, Sci. Harve, Mont
 Rhodes, Ruth E, LD, Sci. Harve, Mont
 Rhodes, William F, Sp, EE. Kent
 Rice, Casper, LD, Bus. Seattle
 Rice, Charles M, Unc, FA. Snohomish
 Rice, Mrs Chlneta W, LD, Ed. Seattle
 Rice, George Russell, UD, EE. Tacoma
 Rice, Helen Louise, UD, Sci. Jerome, Ida
 Rice, Lena Victoria, LD, LA. Fairview, Or
 Rice, Mary Bicklehaupt, LD, Sci. Prosser
 Rich, Chester L, Grad. Tacoma
 Rich, Estelle May, UD, LA. Walla Walla
 Rich, Velma Mae, LD, Ed. Seattle
 Richards, Albert Allen, LD, Bus. Seattle
 Richards, Bradford A O, LD, LA. Mt Vernon
 Richards, Edgar Godfrey, Unc, LA. Tacoma
 Richards, Fern Marie, LD, LA. Seattle
 Richards, Harald Herman, LD, LA. Tacoma
 Richard, Mrs Ivy Baird, Unc, LA. Seattle
 Richardson, Elisabeth C, LD, LA. Yakima
 Richardson, George Bible, UD, CE. Seattle
 Richardson, Hugh, LD, FA. Moscow, Ida
 Richardson, Margaret M, LD, FA. Yakima
 Richardson, Norma, LD, LA. Seattle
 Richardson, Otis Dunbar, UD, LA. Yakima
 Richardt, Preciosa, LD, Sci. Seattle
 Riches, Marjorie D, Unc, LA. Silverton, Or
 Richford, Maurice A, LD, Eng. Seattle
 Richter, Franklin, LD, Bus. Seattle
 Rickles, Dave Nathaniel, LD, ChE. Seattle
 Riddell, Crockett, M, LD, Bus. Tacoma
 Riddle, William Stanley, UD, Ed. Seattle
 Rieben, Samuel E, Unc, LA. Philadelphia, Pa
 Rigg, Margaret, LD, LA. Seattle
 Riley, Elmer Bernard, Unc, Law. Tacoma
 Riley, Helen Margaret, LD, Ed. Arlington
 Riley, Marjorie, LD, Sci. Seattle
 Rinehart, Valdimis G, LD, CE. Portland, Or
 Ringler, Robert Leslie, LD, Bus. Portland, Or
 Ringstad, Theodore E, LD, Bus. La Grande
 Ripley, Julia, LD, Bus. Seattle
 Risley, Buchan Dudley, LD, Bus. Seattle
 Rist, Dorothy E, UD, Bus. Yakima
 Riste, Clara Edna, Unc, LA. Spokane
 Riste, Victor Emerson, LD, Sci. Chopaka
 Ritchie, Elisabeth L, LD, LA. Salt Lake, U
 Rittenhouse, Fay S, LD, Eng. Seattle
 Ritter, John Joseph, LD, Sci. Seattle
 Ritz, Ruthleanor, LD, Sci. Tacoma
 Rivera, Andres D, Unc, CE. Philippines
 Rivers, Edwin Bagnall, LD, Sci. Seattle
 Robb, Opal, UD, Bus. Seattle
 Robbins, Floyd David, LD, EE. Olympia
 Robbins, Frances Rowena, LD, LA. Spokane
 Robbins, Walter Guy, LD, LA. Portland, Or
 Robbins, Walter Raymond, Unc, CE. Seattle
 Robe, Helen, LD, LA. Seattle
 Robe, Vivian Moore, UD, FA. Granite Falls
 Roberts, Arthur Kitchel, UD, For. Tacoma
 Roberts, Elizabeth B, LD, LA. Portland, Or
 Roberts, James Donald, LD, For. Tacoma
 Roberts, John Terry, LD, ChE. Seattle
 Roberts, Katherine E, LD, LA. Gooding, Ida

Roberts, Mary C, Sp, Sci.....Seattle
 Roberts, Milmore D, Grad.....Seattle
 Roberts, Sara A, UD, LA.....Wilbur
 Roberts, Virginia Mae, LD, Sci.....Seattle
 Roberts, Wesley, UD, For.....Seattle
 Robertson, Berdena M, UD, Ed.....Seattle
 Robertson, Colin Wilford, Sp, Bus.....Seattle
 Robertson, Frank H, LD, Bus.....Olympia
 Robertson, E Muriel, Unc, LA.....Seattle
 Robertson, Howard P, LD, Sci.....Montesano
 Robertson, James, Sp, Eng.....Seattle
 Robertson, James H, SC, Min., Buffalo, N Y
 Robertson, Jean Muriel, LD, LA.....Bellingham
 Robertson, Peter Raymond, LD, For.....Buckley
 Robinson, A. B., Sp, Bus.....Seattle
 Robinson, David Jr, LD, Bus.....Centralia
 Robinson, Florence E, LD, Bus.....Pilchuck
 Robinson, Frank D, Rositt, LD, Bus.....Seattle
 Robinson, George N, LD, LA.....Seattle
 Robinson, F Gordon, LD, EE.....Edmonds
 Robinson, Katherine Una, UD, FA.....Edmonds
 Robinson, Minor M, LD, Bus.....Summer
 Robinson, Ted R, LD, Bus.....Everett
 Robinson, Will Alan, LD, LA.....Seattle
 Rock, Clifton Donald, LD, LA.....Nash, Or
 Rode, Alfred, 1st Law.....Bellingham
 Rodgers, Bertha Hall, LD, LA.....Seattle
 Rodman, Emmet Arthur, LD, Sci.....Seattle
 Roegner, Kenneth A, 1st Law.....Seattle
 Roehr, Dorothy Elise, LD, Sci.....Seattle
 Roehr, Margaret E, LD, Bus.....Seattle
 Rogers, Agnes H, Unc, FA.....Seattle
 Rogers, Edwin Lewis, LD, LA.....Colville
 Rogers, Ellen K, Unc, LA.....Skagway, Alaska
 Rogers, Julia Wilmot, LD, LA.....Auburn
 Rogers, Lois M, UD, LA.....Niagara Falls, NY
 Rogers, Margaret Gross, UD, LA.....Auburn
 Rogers, Nathaniel Stewart, UD, ChE.....Auburn
 Rogge, George Gustave, LD, For.....Seattle
 Rogmon, Norma Nelle, LD, LA.....Seattle
 Rohrer, Harvey V, LD, Bus.....Abilene, Kan
 Rollins, Paul Raymond, LD, Sci.....Bremerton
 Rollman, Lawrence T, Sp, EE.....Olympia
 Romagoy, John, Sp, Bus.....Seattle
 Romaine, Doris E, Unc, Ed.....Dayton
 Rombough, George H, LD, Bus.....Seattle
 Romischer, William, LD, Min.....Seattle
 Roon, Edna E, LD, Sci.....Seattle
 Rooney, Joseph, Unc, Bus.....Seattle
 Roop, Milford W, UD, Ed.....Benton City
 Roos, Albert H, UD, EE.....Lewiston, Ida
 Rosales, Godofredo, Sp, Sci.....Philippines
 Rosebaugh, Theodore W, LD, EE.....Harrington
 Rosen, Elsie Elizabeth, LD, Bus.....Monroe
 Rosenquist, Oscar W, LD, Sci.....Bow
 Ross, Doreen French, LD, Bus.....Seattle
 Ross, Edward Allan, LD, EE.....Seattle
 Ross, Evelyn Parks, LD, FA.....Seattle
 Ross, Gordon Burwell, LD, Bus.....Seattle
 Ross, Grant D, Unc, ME.....Edmonds
 Ross, Katherine Louise, LD, Sci.....Tacoma
 Ross, Lemuel, LD, Bus.....Woodland
 Rostein, Eugene Lewis, LD, Bus.....Seattle
 Roth, Kenneth LeRoy, LD, Bus.....Seattle
 Roth, Robert Ingersol, LD, ChE.....Seattle
 Rothenberger, Don O, Sp, Bus.....Osborn, Kan
 Rourke, Rupert Karl, LD, ChE.....Vernon
 Rowe, Adeline Lee, UD, Bus.....Seattle
 Rowell, Fenton Charles, UD, Bus.....Spokane
 Rowlands, Thomas McK, LD, ME.....Victoria, BC
 Rowntree, R Henry, LD, Bus.....Seattle
 Rowse, Helena B, UD, LA.....Seattle
 Royal, Philip Neice, LD, ChE.....Olympia
 Royce, Catherine Roberta, LD, LA.....Olympia
 Royce, Ruby J, LD, LA.....Seattle
 Roys, Ruby, UD, LA.....Seattle
 Royster, Helen, LD, Ed.....Seattle
 Rozell, Joshua H, LD, EE.....Glendive, Mont
 Rubens, N Gertrude, LD, LA.....Vancouver, BC
 Rubicam, Leslie Hubert, UD, Bus.....Tacoma

Ruby, Saul, LD, Sci.....San Francisco, Cal
 Rudberg, Clayton S, LD, Bus.....Spokane
 Rude, Chester A, Sp, Bus.....Culbertson, Mont
 Rude, Hazel Irene, LD, LA.....Seattle
 Rudman, Mary B, Sp, Sci Great Falls, Mont
 Rudolph, Evangeline, LD, Sci.....Seattle
 Rueger, Clarence R, LD, For.....Birdsview
 Ruegg, Clyde Arnold, LD, Bus.....Gresham, Or
 Ruel, James Walker, LD, Bus.....Sedro-Woolley
 Ruenitz, Edward Theodore LD, LA.....Seattle
 Ruetenik, Norman N, LD, Ed.....Sunnyside
 Rulifson, Harmon Alfred, LD, Bus.....Seattle
 Rumberger, G H, LD, Min.....Houtzdale, Pa
 Rummel, Elwin Bartlett, LD, LA.....Tacoma
 Rummel, Edith Elizabeth, UD, LA.....Tacoma
 Runciman, George, LD, ME.....Caldwell, Ida
 Runnings, Gladys May, LD, Sci.....Fairfax
 Rupe, Gustene Elizabeth, LD, Ed.....Seattle
 Ruple, Paul Joseph, LD, Sci.....Seattle
 Rupp, Thelma, UD, LA.....Snohomish
 Rupp, Wellington, UD, EE.....Snohomish
 Russell, Alvia D, LD, EE.....Govan
 Russell, Alysae Mae, LD, FA.....Tacoma
 Russell, Edith, LD, FA.....Seattle
 Russell, Florence M, UD, LA.....Seattle
 Russell, Helene Maybell, LD, FA.....Rainier Or
 Russell, Hugh Hopkins, LD, Bus.....Seattle
 Russell, Lewis Walter, UD, CE.....Luther, Mt
 Russell, Ruth Rowena, LD, LA.....Seattle
 Rust, H Arthur, LD, Bus.....Tacoma
 Rust, Caramel Ruth, LD, Sci.....Yakima
 Rustad, Howard Conning, LD, ChE.....Seattle
 Rutherford, Burchard H, SC, Min.....Seattle
 Ryan, Frederick A, Unc, Bus.....Seattle
 Ryan, Marie Arline, LD, LA.....Seattle
 Ryan, Harry Pherson, LD, Bus.....Bellingham
 Ryan, Helen Theresa, LD, LA.....Seattle
 Ryan, Homer Nosler, LD, LA.....Seattle
 Ryan, Rose D, LD, LA.....Portland, Or
 Ryehard, Clayton Hopkins, LD, Bus.....Hoquiam
 Rydberg, B Evelyn, LD, FA.....Anacortes
 Ryder, Maude Alice, LD, Ed.....Auburn
 Ryer, Grant H, LD, ChE.....Denver, Colo
 Ryerson, Hilma Clare, UD, LA.....Dayton
 Ryerson, Muriel Lenore, Unc, Sci.....Dayton
 Rygg, John Casper, LD, EE.....Arlington
 Rynning, Emma J, LD, Ed.....Tacoma

Sahlin, Rose E, Unc, FA.....Anacortes
 Sakuma, Arthur Y, LD, LA.....Seattle
 Salazar, Pedro L, LD, LA.....Philippines
 Sallsburg, Helen E, LD, Ed.....Sprague
 Salladay, Ruth, LD, FA.....Twin Falls, Ida
 Sainickov, John S, Unc, Eng.....Russia
 Sammis, Herbert Lowden, Unc, IA.....Seattle
 Sanaholz, John V.....
 Sanborn, Fred W, UD, Bus.....Long Beach, Cal
 Sanchez, Isabelo, LD, Sci.....Philippines
 Sanders, Carrie, Unc, LA.....Tukwila
 Sanders, Floyd, LD, Bus.....Emmett, Ida
 Sanders, Elva May, LD, Bus.....Seattle
 Sanders, John C, LD, EE.....Ephrata
 Sanders, Josephine, UD, FA.....Harve, Mont
 Sanders, Scott D, UD, Min.....Spokane
 Sanders, William C, LD, Jour.....Seattle
 Sandholtz, J Vaughn, Unc, CE.....Missoula Mt
 Sandstrom, David H, LD, LA.....Seattle
 Sandusky, Lawrence, LD, LA.....Spokane
 Sandusky, Oris Edward, LD, Bus.....Spokane
 Sandvigen, Emma, LD, Bus.....Seattle
 Sandvigen, Gilbert T, LD, EE.....Seattle
 Sangree, John Brewster, UD, Sci.....Seattle
 San Juan, Pantaleon, Unc, Sci.....Philippines
 Sankela, Neil J, UD, Bus.....Twinnoc
 Sapp, Bernice A, LD, LA.....Olympia
 Sartoris, George B, Grad.....Enumclaw
 Sartoris, Madelyn V, UD, Sci.....Enumclaw
 Sater, Irma Alma, LD, Ed.....Seattle
 Sater, Ruth F, LD, Ed.....Seattle

Sather, Gertrude B, LD, FA.....Hoquiam
 Sato, Teizo, LD, Bus.....Seattle
 Satow, Nobutoshi, UD, Bus.....China
 Sauers, John C, LD, Bus.....Seward, Alaska
 Saunders, Eugene Davis, LD, LA.....Seattle
 Saunders, Mary Cecell.....Wenatchee
 Savage, Joseph E, LD, Bus.....Seattle
 Saville, Gordon P, LD, EE.....Philippines
 Sayles, Frank Wells, LD, Bus.....Seattle
 Schaak, Chas Gustave, LD, EE.....Seattle
 Schadt, Raymond John, UD, ChE.....Seattle
 Schaefer, Leonard J, LD, Sci.....Seattle
 Schaefer, Ethelyn Pearl, UD, Sci.....Seattle
 Schaefer, Marie Bertha, LD, Bus.....Mima
 Scharr, Freeman C, LD, Bus.....Kallispell, Mt
 Schel, Adolph George, LD, ChE.....Seattle
 Schenk, Ernest, LD, EE.....Seattle
 Schenkar, Joseph, LD, Sci.....Seattle
 Scheyer, Fred Louis, LD, Sci.....Puyallup
 Scheyer, Kenneth S, LD, CE, Sedro Woolley
 Schoppmann, Hermann A, LD, FA.....Seattle
 Schlageter, Frederick, LD, ME.....Bremerton
 Schlarb, Jack, Unc, Bus.....Tacoma
 Schmid, Byron C, LD, ChE.....Seattle
 Schmidt, Richard A, Unc, Bus.....Wenatchee
 Schmidt, Ronald F, LD, Bus.....Seattle
 Schmidt, Hanks Val, LD, Bus.....Seattle
 Schmidtmann, Edward H, Unc, CE.....Auburn
 Schmitt, Margaret Lesslie, LD, LA.....Seattle
 Schmitt, Margaret F, LD, LA.....Seattle
 Schmoee, Floyd W, LD, For. Calico Rock, Ark
 Schmal, Charles Joseph, LD, Bus.....Tillamook
 Schnasse, Edison, UD, Sci.....Walla Walla
 Schneider, George M, LD Eng Rossland, B C
 Schofield, Alfred Guy, LD, Min.....Seattle
 Schofield, Gwendolyn M, LD, LA.....Seattle
 Schofield, Marguerite C, UD, LA.....Redmond
 Schofield, Robert H, LD, Bus.....Seattle
 Scholl, Suzanne E, LD, Bus.....Seattle
 Scholtes, Mary Geraldine, UD, LA.....Seattle
 Schooley, John M, LD, LA.....Zillah
 Schriever, Frederick, Sp, For.....New York
 Schrock, Doris, LD, Sci.....Okanogan
 Schrock, Ethel Grace, UD, FA.....Okanogan
 Schroder, Blanche M, LD, FA, Pendleton, Or
 Schuck, Katherine Anna, LD, Sci.....Seattle
 Schuett, Marjorie Claire, LD, LA.....Seattle
 Schuknecht, L H, Sp, Min.....Hood River, Or
 Schulze, Carl Henry, Sp, Sci.....Seattle
 Schulz, Gertrude A, Unc, Sci.....Seattle
 Schulz, Katherine L, LD, LA.....Seattle
 Schultz, William E, LD, For.....Seattle
 Schumacher, Walter C, LD, LA.....Shelton
 Schumer, Anna, LD, Bus.....Seattle
 Schuremary, Charles, Sp, Bus.....Saybrook, Ill
 Schurle, Otto H, Unc, LA.....Cashmere
 Schwab, Fredric P, LD, LA.....Bradford, Pa
 Schwartz, Gene, Unc, LA.....Burns, Or
 Schwartz, H I, LD, ME, Grand Junction, Colo
 Schweitzer, Florence, Unc, Law.....Seattle
 Schwiesow, Will H, UD, For.....Tacoma
 Scordan, Louise M, 2d Law.....Seattle
 Scott, Agnes Carrie, UD, LA.....Tacoma
 Scott, Barbara H, LD, LA.....Seattle
 Scott, Beatrice, UD, LA.....Warrensburg, Mo
 Scott, Byron David, 1st Law.....Tacoma
 Scott, Elizabeth C, LD, Ed.....Seattle
 Scott, Frank William, LD, Bus.....Seattle
 Scott, James Gordon, LD, CE.....Seattle
 Scott, Leota, LD, Sci.....Nenana, Alaska
 Scott, Lydia Louise, LD, LA.....Seattle
 Scott, Marion H, UD, Bus.....Tacoma
 Scott, Marion Snow, LD, LA.....Mukilteo
 Scott, Marion Snow, LD, LA.....Mukilteo
 Scott, Marjorie, LD, FA.....Roslyn
 Scott, Morris Robert, LD, Bus.....Twisp
 Scott, Neil Donald, LD, Bus.....Wenatchee
 Scott, E Thomas, LD, Sci.....Hood River, Or
 Scott, William D, Sp, Eng.....Seattle
 Scudder, Mrs Ella W, Grad.....Seattle

Seaborn, Margaret E, LD, FA.....Seattle
 Seabury, Esther Lucy, LD, LA.....Seattle
 Seagraves, Hal E, Unc, CE.....Seattle
 Seallis, Rachel Joyce, LD, Ed.....Seattle
 Seamons, Joe, LD, CE.....Tacoma
 Sears, Sigby, Unc, Sci.....Omaha, Neb
 Sears, Tom L, LD, LA.....Wesler, Ida
 Seavey, Morris, LD, Bus.....Port Townsend
 Secord, Isabel, Unc, LA.....Seattle
 Seecamp, John F, Unc, ME.....Seattle
 Seegers, Carl A, Unc, Bus.....Craigmont, Ida
 Seeley, Mildred L, LD, FA.....Seattle
 Seeley, Paul W, LD, Bus.....Seattle
 Seely, Anne, Grad.....Seattle
 Seelye, Walter Bale, LD, Sci.....Seattle
 Seffrit, Chas L, Unc, Bus.....Bellingham
 Segessenman, John F, LD, LA.....Spokane
 Seibert, Constance, LD, FA.....Seattle
 Seibert, Doris, LD, FA.....Seattle
 Seibert, Philip J, LD, Eng.....Seattle
 Sekine, I, SC, Fish.....Tokio, Japan
 Selby, Harold Kellogg, LD, Bus.....Seattle
 Selby, Howard Parker, LD, For. Pt Townsend
 Selby, Roy R, Sp, Bus.....Seattle
 Selland, Agnes, LD, LA.....Manzanita
 Sellers, Ulrich Robert, LD, Bus.....Seattle
 Selton, Nuben, LD, EE.....Bellingham
 Selvidge, George W, Sp, Law.....Seattle
 Selvin, Gladys M (Mrs).....Vashon
 Semon, Mrs Mayme G, Grad.....Seattle
 Semon, Waldo Lonsburg, Grad.....Seattle
 Senasac, Rudolph N, LD, Eng.....Seattle
 Sergievsky, Nicholas A, SC, Min.....Seattle
 Serrano, Bartolome R, Unc, ME.....Philippines
 Settem, Clara O, LD, LA.....Astoria, Or
 Setters, Elizabeth, LD, LA.....Astoria, Or
 Settle, Stuart Williston, LD, ME.....Seattle
 Setzer, George Frank, LD, ChE.....Daisy
 Sexsmith, Hazel Georgia, LD, LA.....Spokane
 Sexton, Roy T Thomas, UD, Bus.....Seattle
 Sexuck, Evelyn Violet, UD, FA.....Seattle
 Shaffer, Harold Bosworth, LD, LA.....Seattle
 Shaffer, Hiram, LD, Bus.....Almira
 Shaffer, Wilma J, UD, LA.....Waitsburg
 Shallicross, Erma Ellen, LD, Bus.....Issaquah
 Shank, Charles Howard, LD, Sci.....Seattle
 Shank, Jack O, LD, For.....Alton, Ill
 Shank, Katherine, UD, LA.....Seattle
 Shanklin, Lawrence Grant, LD, LA.....Pasco
 Shanks, Carrol Meter, UD, Bus.....Seattle
 Shanks, Clyde W, LD, Bus.....Payette, Ida
 Shanks, Marcus M, Unc, Sci.....Payette, Ida
 Shapiro, Joseph, Unc, Min.....Seattle
 Shapiro, Allen Lou, Unc, Phar.....Seattle
 Sharp, Mrs Mary C, Sp, FA.....Tacoma
 Sharples, Dorothea May, Grad.....Seattle
 Shaw, Anna Belle, LD, Sci.....Seattle
 Shaw, Edith Arline, LD, LA.....Portland, Or
 Shaw, Cyril Nile, UD, ME, Gt Falls, Mont
 Shaw, Gretchen Adella, LD, FA.....Seattle
 Shaw, Homer Merrill, LD, Phar.....Seattle
 Shaw, Samuel Edward, LD, LA.....Portland, Or
 Shawler, Clarence V, LD, Bus.....Spokane
 Sheeder, Lois Mal, Unc, LA, Kallispell, Mont
 Shellenberger, John A, LD, Sci.....Seattle
 Shellum, Adelbert J, LD, EE.....Seattle
 Shelton, Edward M, Grad.....Seattle
 Shepard, Aileen Ordell, Grad.....Winslow
 Shepherd, Mrs E M, Grad.....Pt Angeles
 Sheriff, Joseph M, Unc, Eng.....Seattle
 Sherman, Foster G, LD, Eng.....Tacoma
 Sherrer, Frederick A, Grad, Law.....Seattle
 Shidler, Roger Lewis, LD, LA.....Seattle
 Shields, George W Jr, LD, ChE.....Seattle
 Shields, Lucian B, LD, Bus.....Buhl, Ida
 Shigaya, Paul S, LD, Sci.....Kent
 Shillock, Harold E, LD, Bus.....Seattle
 Shinabargas, Jean D, LD, Sci.....Vancouver
 Shindel, Maurice Harry, UD, LA.....Seattle
 Shinn, Duane Thomas, LD, Bus.....Spokane

Shinn, Pauline, LD, Bus.....Seattle
 Shipley, Dorothy, Unc, LA.....Seattle
 Shipley, Harold Manley, Sp, Bus.....Seattle
 Shipton, Mildred Jeanette, LD, LA.....Chelan
 Shipton, Vivian Mae, LD, LA.....Chelan
 Shireman, Eva, LD, Sci.....Wauwat, Kas
 Shive, Ben C, LD, Eng.....Yakima
 Shoemaker, Harry Edwin, LD, FA.....Yakima
 Shoemaker, Mrs Ruth L, Unc, LA.....Seattle
 Shoemaker, William R, Unc, For.....Seattle
 Shollenberger, J Wayne, LD, Bus.....Seattle
 Shorrock, Hallam Carey, LD, Bus.....Seattle
 Short, Paul C, Sp, Fish.....Seattle
 Shotwell, Margaret, LD, LA.....Seattle
 Shoudy, John Addison, Unc, ME.....Ellensburg
 Showell, Philip Sidney, LD, Sci.....Bryn Mawr
 Showve, Earle Harwood, LD, Bus.....Seattle
 Shyrock, Dorothy, LD, Bus.....Seattle
 Shure, Sallio Lee, LD, Phar.....Bellingham
 Shuttleworth, L D, LD, Bus.....Idaho Falls, Ida
 Siao, Yu-Ling, LD, Bus.....China
 Sibley, Robert Patton, Sp, Sci.....Seattle
 Sickels, Eleanor Maria, Grad.....Seattle
 Sicks, John Harold, Unc, ME.....Roslyn
 Sieber, Eugene F, Unc, Bus.....Park City, Mt
 Siegel, Mina Louise, LD, FA.....Mt Vernon
 Sielk, George Jacob, UD, Bus.....Spangle
 Sielk, William Henry, UD, Bus.....Spangle
 Sigler, Frances A, LD, FA.....Los Angeles, Cal
 Sigmond, Arthur L, UD, Bus.....Phila. Pa
 Siler, Lillie May, UD, Sci.....Seattle
 Silliman, Marietta, UD, Bus.....Seattle
 Silliman, Grace Estella, LD, Sci.....Spokane
 Silver, Rose, LD, FA.....Seattle
 Silvermaster, Nathan G, UD, LA.....China
 Silverthorn, W O, Unc, LA.....La Grande, Or
 Sim, Ida Grace, LD, LA.....Snohomish
 Simas, Frances M, LD, FA.....Sprague
 Simcoe, Neva Lenore, LD, LA.....Pt Townsend
 Simcoe, Philip Sumner, LD, For.....Pt Townsend
 Simmons, Arthur B, LD, ChE.....Portland, Or
 Simon, Dorothy, LD, LA.....Portland, Or
 Simon, Rebecca H, UD, Bus.....Butte, Mont
 Simonson, R, Unc, LA.....Anchorage, Alaska
 Simpson, C Cecil, LD, Bus.....Cashmere
 Simpson, Clarence Angus, LD, Sci.....Everson
 Simpson, Helen Margaret, Grad.....Seattle
 Simpson, Lewis L, LD, For.....Chicago, Ill
 Sims, Norma Josephine, UD, LA.....Seattle
 Simson, George, Unc, ME.....Vancouver, B C
 Simson, Jerome, UD, ME.....Seattle
 Simson, Louis, LD, Bus.....Seattle
 Sinclair, Donald Walker, LD, Bus.....Yakima
 Sinclair, Harold Peter, Sp, Bus.....Yakima
 Sinclair, Robert L, LD, Bus.....Snohomish
 Singer, Dorothy O, LD, LA.....Vancouver, BC
 Sisler, Roland W, LD, ME.....Seattle
 Sisler, Sara Elizabeth, LD, FA.....Seattle
 Sisson, Howard Arthur, LD, Min.....Seattle
 Sister, Mary A, UD, LA.....Seattle
 Sister, Leonella, UD, Sci.....Seattle
 Sivertz, Victorian, LD, Sci.....Victoria, B C
 Skagen, Elmer Theodore, Unc, Phar.....Kent
 Skewis, Mary Alberta, LD, FA.....Tacoma
 Skibeness, Alphonse J, LD, Bus.....Spokane
 Skidmore, Samuel, LD, Bus.....Tacoma
 Skinner, Betty, LD, Bus.....Tacoma
 Skinner, C H, Sp, Bus.....Coeur d'Alene, Ida
 Skinner, Elzey, LD, LA.....Seattle
 Slater, Veria Mayfield, LD, LA.....Ferdale
 Slade, Elizabeth M, LD, LA.....Hood River, Or
 Slauson, Celeste, LD, Ed.....Seattle
 Slauson, Margaret, LD, Sci.....Portland, Or
 Slayden, Philip Lee, UD, CE.....Stellacoom
 Sletnec, Henry Burton, LD, Bus.....Seattle
 Slipper, Doris B, UD, FA.....Hamilton
 Sloan, Besse A, UD, LA.....Yakima
 Sloan, Roy H, Sp, Bus.....Portland, Or
 Slocum, Esther Mary, LD, Phar.....Seattle
 Sly, Randolph, LD, Bus.....Kennewick

Small, Frank L, LD, Fish.....Seattle
 Small, Mary Frances, UD, FA.....Puyallup
 Smaulding, B O, LD, Phar.....Albuquerque, NM
 Smith, Albert F, Bus.....White Rock, B C
 Smith, Arthur B, LD, EE.....Seattle
 Smith, Carolyn E, LD, LA.....St Paul, Minn
 Smith, Ethel Beryl, LD, LA.....Vancouver, Wn
 Smith, Charles Joseph, LD, Bus.....Seattle
 Smith, Chauncy H, UD, LA.....Livingston, Mt
 Smith, Chester Raymond, Unc, CE.....Mabton
 Smith, Dorothea, LD, LA.....Seattle
 Smith, Dorothy Cranney, LD, Bus.....Tacoma
 Smith, Elleen I, LD, FA.....Kallispell, Mont
 Smith, Emma Margaret, LD, Phar.....Hamilton
 Smith, Ethel, LD, LA.....South Bend
 Smith, F Erdmann, Grad.....Shawnee, Okla
 Smith, Evelyn A, LD, LA.....Mankato, Minn
 Smith, Frederick Charnley, Sp, CE.....Seattle
 Smith, George M Jr, UD, LA.....Seattle
 Smith, Gertrude Burwell, LD, LA.....Seattle
 Smith, Gertrude Esther, LD, LA.....Seattle
 Smith, Gladys Lucile, UD, LA.....Seattle
 Smith, Guy W, Unc, Law.....Okanogan
 Smith, Harold A, LD, LA.....Seattle
 Smith, Harold M, LD, Sci.....Anacortes
 Smith, William Harold, LD, FA.....Everett
 Smith, Harry E, LD, Bus.....Reedsport, Or
 Smith, Helen Deane, LD, LA.....Tekoa
 Smith, Herndon, UD, LA.....Seattle
 Smith, Irving Davenport, Sp, Law.....Seattle
 Smith, Janet Sarah, LD, Sci.....Peoria, Ill
 Smith, John Henry, UD, For.....Seattle
 Smith, Lawrence Kellam, UD, Fish.....Seattle
 Smith, Leona, LD, Sci.....Seattle
 Smith, Margaret, Unc, Sci.....Seattle
 Smith, Martha Elliott, Sp, Sci.....Seattle
 Smith, Mrs Myrett W, Grad.....Seattle
 Smith, Neil Martin, LD, Bus.....Duvall
 Smith, Pearl, UD, Bus.....Prosser
 Smith, Perry G, LD, Bus.....Newhall, Cal
 Smith, Shipley Quentin, LD, LA.....Puyallup
 Smith, Ralph Leslie, LD, Sci.....Miller River
 Smith, Ralph M, LD, Bus.....Livingston, Mont
 Smith, Ralph R, LD, LA.....Seattle
 Smith, Richard Martin, Unc, EE.....Seattle
 Smith, Richard Merrill, UD, For.....Washougal
 Smith, Robert R, LD, LA.....Seattle
 Smith, Ruth A, UD, FA.....Seattle
 Smith, Helen Ruth, Unc, FA.....Seattle
 Smith, V Stanford, Unc, Law.....Eatonville
 Smith, Stanley Lawrence, LD, Bus.....Seattle
 Smith, Tremaine J, LD, LA.....Spokane
 Smith, Vernetta Terrill, LD, LA.....Hoquiam
 Smith, Virginia M, UD, Sci.....Ontario, Or
 Smith, Walter A, Unc, Bus.....Seattle
 Smith, Wayne Clifford, Unc, LA.....Lynden
 Smith, Wendell Marcus, LD, Bus.....Everett
 Smithson, Geraldine A, LD, Jour.....Seattle
 Smull, Victor Albion, Unc, Phar.....Pasco
 Smyth, Russell, LD, LA.....Yakima
 Sneed, Marie F, LD, LA.....Halsey, Or
 Snellenberg, Lewis, LD, Eng.....Seattle
 Snider, A Latta, Grad.....Alderwood Manor
 Snook, William W, Sp, Bus.....Ridgefield
 Snortland, Oscar, LD, Phar.....Ferdale
 Snow, Gretchen A, Unc, Bus.....Blaine
 Snow, Iola, UD, Sci.....Seattle
 Snow Loren L, LD, LA.....Seattle
 Snowden, James M, UD, Bus.....Ellensburg
 Snyder, Harold F, Unc, Bus.....Seattle
 Snyder, Hart, LD, LA.....Seattle
 Soderstrom, Harry Ted, Unc, CE.....Spokane
 Softky, Albert Max, LD, EE.....Auburn
 Soles, Geraldine, LD, FA.....Seattle
 Sollar, Telesforo, LD, Sci.....Philippines
 Solomon, Claire Ida, Unc, LA.....Portland, Or
 Solomon, Hyman O, Unc, Law.....Seattle
 Somers, Harry Dillon, LD, Bus.....Perry, Ia
 Somerville, David A, UD, ChE.....Lewiston, Ida
 Somerville, Robert A, LD, Bus.....Lewiston, Ida

Sommer, Helen, LD, LA.....Seattle
 Sorenson, Oscar A, LD, Bus., Portland, Or
 Sorenson, Otto Nordahl, LD, ME., Edmonds
 Sorenson, Sanda A, UD, LA.....Ellensburg
 Soss, Israel, LD, Bus.....Spokane
 Soule, Kenneth E, LD, Eng.....Seattle
 Soule, Nadine, UD, LA.....Seattle
 Soulen, Freda Marie, UD, Ed., Moscow, Ida
 Southard, John H, UD, ChE., St Helens, Or
 Southwick, Charles U, LD, LA.....Chelan
 Southwick, Glen H, UD, Bus.....Chelan
 Southwood, Alma, LD, FA.....Spokane
 Southworth, Deane, LD, LA.....Tacoma
 Sowder, Arthur M, LD, FOR.....Spokane
 Sowle, Jack, LD, Min.....Seattle
 Spaight, Margaret, LD, LA.....Auburn
 Sparks, Helen, UD, LA.....Seattle
 Sparring, Margaret Jane, LD, Bus., Hoquiam
 Spaulding, David L, Sp, Bus., Hood River, Or
 Spaulding, Edith W, Unc, LA.....Montesano
 Spear, Mildred Cushing, UD, LA.....Seattle
 Spearman, Theodore, LD, LA.....Yakima
 Spedden, Margaret M, LD, LA.....Chewelah
 Speer, Howard Beashoff, UD, LA.....Seattle
 Spence, Everett, LD, Phar.....Everett
 Spencer, Frank C, LD, Bus.....Prairie, Or
 Spencer, Ralph W, LD, Eng.....Bovill, Ida
 Spencer, Rhodes Vaughn, UD, EE.....Seattle
 Spencer, Robinson, Grad.....Seattle
 Spencer, William Ann, Grad.....Seattle
 Sperring, Otto Frederick, LD, EE.....Spokane
 Sperry, Emery Franklin, LD, Bus.....Yakima
 Spickard, Helen Florence, Unc, LA.....Seattle
 Spickard, Paul William, LD, Sci.....Seattle
 Spies, Valentine, LD, Bus.....Seattle
 Spieske, Winnie, UD, LA.....Seattle
 Spiker, Robert Ray, Unc, Bus., Lewiston, Ida
 Spill, Geraldine B, LD, LA.....Pasadena, Cal
 Sprague, Albert Milton, LD, ChE.....Seattle
 Sprague, Hollister T, Grad.....Seahurst Pk
 Sprague, Joanna Helen, LD, LA.....Seattle
 Spriesterbach, Alice, LD, FA.....Everett
 Springer, Anna C, Unc, LA.....Olympia
 Sprinker, Irene Abigail, UD, LA.....Olympia
 Spring, Seymour G, LD, Bus.....Yakima
 Springer, Maurice E, UD, Bus.....Olympia
 Spuhn, Fred W, LD, Bus.....Medford, Or
 Squier, Charlotte Irene, LD, LA.....Seattle
 Stachel, Edward H, Unc, Bus., Glencoe, Ill
 Stack, Irene Helen, UD, Ed.....Spokane
 Stary, Virginia, LD, LA.....Lewiston, Ida
 Stalker, Lloyd E, LD, ME., St Anthony, Ida
 Stamm, C H, LD, ChE., Bonners Ferry, Ida
 Stanciliffe, Imogene, LD, LA.....Seattle
 Standcliffe, Joseph B, LD, LA.....Seattle
 Standing, Frank Hartely, LD, Bus., Tacoma
 Stanfield, Ralph B Jr, LD, Bus.....Echo
 Stangland, Bessie F, LD, LA.....Madras, Or
 Stankorutch, Peter N, SC, Min.....Everett
 Stanley, Claude R, Sp, Bus.....Seattle
 Stanley, Maxine, UD, Sci.....Tacoma
 Stannard, Jeannette C.....Seattle
 Stanton, Margaret, LD, LA.....Seattle
 Starbuck, Elwood T, LD, Bus., Ft Wayne, Ind
 Starin, Edward, LD, Bus.....Seattle
 Starin, Joseph, UD, Bus.....Seattle
 Stark, Eugene Edward, LD, LA.....Seattle
 St Arnold, Norma H, LD, FA.....Seattle
 Starr, B Evangeline, Ist Law.....Seattle
 Staret, F Raymond, LD, Sci., Victoria, B C
 Stauffer, Jessie, Unc, FA.....Ellensburg
 Stead, Miriam E, UD, LA.....Lumsden, B C
 Steele, Victor Harvey, UD, Bus.....Clarkston
 Steelman, Eleanor, LD, LA, Salt Lk City, U
 Steen, Ralph E, LD, FA.....Vashon
 Steere, M Esther, LD, LA.....Kallispell, Mont
 Steffen, Gustav J, LD, Bus., Menomonie, Wis
 Stell, Leila, Unc, Sci.....Sheridan, Wyo
 Steindorf, Eric C, LD, LA, St. Ignatius, MP
 Stenke, Pearl Acena, UD, Ed.....Seattle

Stelling, Herman J, Unc, Bus.....Puyallup
 Stendal, William H, LD, Bus., Kallispell, Mt
 Stenger, Lloyd Charles, UD, Bus., Moscow, Ida
 Stenson, William F, LD, Sci.....Snohomish
 Stentsz, Waldo Winfield, LD, Bus.....Olympia
 Stephens, Elmer R, LD, Sci.....Clarkston
 Stephens, Inga Agnes, LD, Sci.....Algona
 Stephens, Loren Earl, LD, Bus.....Centralla
 Stephenson, Edith F, UD, FA., Portland, Or
 Stephenson, Oscar A, Sp, Bus.....Manson
 Stephenson, James Ross, LD, Phar., Centralla
 Stern, Fred Rust, LD, EE.....Seattle
 Stevens, Allan, Sp, Law.....Seattle
 Stevens, Grant Aaron, UD, Bus.....Seattle
 Stevens, Richard Francis, LD, ME., Seattle
 Stevenson, Lillie C, UD, LA.....Tacoma
 Stevenson, Merton, LD, Bus.....Everett
 Stevenson, Robert John, LD, Bus.....Seattle
 Stewart, Barbara Jean, LD, Ed.....Spokane
 Stewart, Mrs B B, Grad.....Edmonds
 Stewart, Chesterfield, LD, ME.....Seattle
 Stewart, Dorothy Dean, LD, Sci., Bremerton
 Stewart, Edgar I Jr, LD, Ed.....Seattle
 Stewart, Gladys H, Unc, Sci.....Snohomish
 Stewart, Glenn R, LD, Bus.....Ellensburg
 Stewart, Isabel Clarissa, Grad.....Seattle
 Stewart, Mary L, LD, LA., Kansas City, Mo
 Stewart, Max Dewain, LD, Bus.....Seattle
 Stewart, Oliver, LD, Sci.....Seattle
 Stewart, Ralph Bentley, LD, Sci.....Seattle
 Stewart, Robert H, LD, Sci.....Spokane
 St Germain, Garnette, Sp, LA.....Seattle
 Stickney, Guy Charles, Sp, CE.....Bothell
 Stigenwalt, Alpha L, LD, ME.....Bellingham
 Stiles, Russell M, Unc, Phar.....Seattle
 Stillman, Alfred Kittoe, Unc, CE.....Spokane
 Stillman, Allyn Putnam, LD, For.....Spokane
 Stillson, Merle Osgood, UD, ChE.....Seattle
 St John, Bernice M, LD, LA.....Chehalis
 Stolkier, McKinley Virgil, LD, LA., Auburn
 Stommer, Ida, UD, Sci.....Seattle
 Stone, Caleb S Jr, LD, Sci.....Wallace, Ida
 Stone, Edgerton C, LD, Bus.....Seattle
 Stone, Edward T, LD, CE.....Vancouver, Wa
 Stone, Sally Byrd, UD, Ed.....Wallace, Ida
 Stoddy, Helen Mary, LD, Phar.....Seattle
 Storm, Charlotte (Mrs), Unc, LA, Seattle
 Storms, Walter Rex, LD, Min.....Laredo, Mo
 Story, James Paul, LD, Bus., King Hill, Ida
 Stover, Merrill McCord, LD, EE.....Seattle
 Stover, Miriam Carol, LD, Ed.....Seattle
 Stranack, Dorothy Belle, LD, FA.....Seattle
 Stranack, Janet, UD, FA.....Seattle
 Strand, Erling, LD, LA., Petersburg, Alaska
 Strand, Robert E, LD, Bus.....Gt Falls, Mt
 Strate, Johanna, UD, Ed.....Seattle
 Stratton, Irving, LD, LA.....Seattle
 Strauss, Siegfried, LD, Sci.....Colville
 Streng, Alwin H, LD, LA.....Portland, Or
 Streyyfert, T. K, Grad., Vasteras, Sweden
 Strickler, C Buell, LD, Bus.....Chicago, Ill
 Strickler, William Howard, LD, Bus., Spokane
 Stringer, Marian, Unc, Sci.....Seattle
 Strong, Gladys Delight, LD, Ed.....Bellevue
 Strong, James, LD, CE.....Greeley, Colo
 Strong, Lloyd Christy, UD, Bus.....Bellevue
 Strube, Charles G Jr, UD, ME., Portland, Or
 Struble, H. S, SC, Fish.....Juneau, Alaska
 Strum, Elmer Augustine, Sp, CE.....Seattle
 Stryker, Helen, LD, FA.....Seattle
 Stuart, MacClelland, LD, LA.....Seattle
 Stuart, G Margaretta, LD, Ed.....Ellensburg
 Studdert, Ruth Anna, LD, Fish.....Seattle
 Sturges, Beryl, Unc, Jour.....Rockford
 Styer, Cornelius W, UD, LA.....Seattle
 Sugrang, Felipe P, LD, Sci.....Philippines
 Sullivan, Clare Agnes, UD, LA.....Seattle
 Sullivan, John D, UD, Sci.....Belton, Mont
 Sullivan, John Edward, LD, Sci.....Seattle
 Sullivan, John Kenneth, LD, Phar.....Ritzville

Sullivan, Richard Francis, UD, LA...Seattle
 Sullivan, Will James, Unc, EE.....Aloha
 Sulz, Albert M, LD, Eng.....Seattle
 Summers, Doris Edith, UD, LA.....Seattle
 Summersett, Peter, Unc, Law.....Chehalis
 Summy, Archibald P, LD, Bus.....Seattle
 Sundling, Doris M, LD, Bus.....Seattle
 Snomela, H John, LD, Fish.....Ilwaco
 Suransky, Paul, UD, EE.....Seattle
 Sutherland, Ione, LD, LA.....Tacoma
 Sutherland, Ray C, LD, Bus.....Tacoma
 Suttner, Alice Mary, Unc, LA.....Spokane
 Sutton, Arthur C, LD, EE.....Portland, Or
 Sutton, Alice Dolores, LD, LA.....Seattle
 Sutton, Dorothy Jane, LD, Bus.....Seattle
 Sutton, Phoebe Jane, LD, LA.....Seattle
 Swalle, George E, LD, CE, San Diego, Cal
 Swain, Kenneth Hudson, UD, Bus.....Seattle
 Swain, Olive, LD, Sci.....Tacoma
 Swailwell, Corinne, LD, LA.....Everett
 Swailwell, William Howard, LD, For...Seattle
 Swanberg, Amy A, LD, Bus.....Seattle
 Swanberg, Roy, LD, Min.....Seattle
 Swanson, Verne John, Unc, EE.....Seattle
 Swanson, Walter W, LD, Bus.....Charbrook
 Swartz, Ella Marie, LD, Bus.....Seattle
 Swartz, Florence W, Grad.....Seattle
 Swartz, Lester B, LD, Bus, Fortuand, Or
 Swasey, Harriette E, Unc, LA.....Raymond
 Sweeney, Frank E, LD, Bus.....Seattle
 Sweet, Earl K, UD, Bus.....Eureka, Mont
 Sweet, Marion Louise, LD, FA.....Okanogan
 Swegle, Walter, LD, ME.....Seattle
 Swenson, Thelma E, Unc, LA, Esmond, N D
 Swengel, Elaine Isabelle, LD, FA.....Seattle
 Swezea, Vernita, LD, FA.....Seattle
 Swezey, Mildred Louise, LD, LA.....Sumner
 Swift, Lester John, UD, Phar.....Hoquiam
 Sykes, Harriet, LD, LA.....Seattle
 Sykes, Iris Honor, Unc, FA.....Tacoma
 Sylvester, B A, LD, LA, San Bernardino, Cal
 Szymkowiak, E. A, Sp, For Milwaukee, Wis

Tabor, Lawton Cline, LD, Bus.....Seattle
 Tabor, Marian Esther, LD, LA.....Seattle
 Tady, Manuel C, Sp, Sci.....Philippines
 Taft, Alice Louise, LD, LA.....Seattle
 Taft, Dorothy Grace, LD, Ed.....Seattle
 Taft, Marian Alice, LD, LA.....Hoquiam
 Taft, Genevieve Maurine, LD, Sci.....Beach
 Taggart, George Moore, LD, Bus.....Seattle
 Takgart, Marguerite E, LD, LA.....Seattle
 Takagi, Miss Miyo, UD, Bus.....Japan
 Takazash, Tomeo, LD, Bus.....Pt Blakely
 Talbot, Archibald W UD, Bus.....Spokane
 Talbot, Everett Charles, Sp, Bus.....Lowell
 Talmadge, Heath Walter, UD, EE.....
 Tamesis, Florencio, Sp, For.....Philippines
 Tanabe, George B, LD, ChE.....Spokane
 Tanguay, Emmett, LD, Bus.....Seattle
 Tanner, Benjamin Franklin, LD, Bus.....Seattle
 Tanner, Lura, LD, FA.....Seattle
 Tanner, Mary Catherine, LD, Sci.....Seattle
 Tanzer, William M, LD, Min.....Seattle
 Tappe, Kenneth Hartley, LD, CE.....Bremerton
 Tarbox, Eugene Ralph, Unc, ME.....Seattle
 Tarter, Clyde Sidney, LD, Phar.....Seattle
 Tatsuji, O Kamoto, Bus, Kumamoto, Japan
 Taylor, Archa Bertrand, LD, LA.....Sumner
 Taylor, Colin Alexander, LD, EE.....Seattle
 Taylor, Dorothea, Grad.....Seattle
 Taylor, Fred Lawrence, Unc, ME.....Tacoma
 Taylor, George S, UD, Bus.....Prosser
 Taylor, E Henrietta, LD, LA.....Tacoma
 Taylor, Jeannette, LD, Bus.....Seattle
 Taylor, J Elmer Rex, LD, Phar.....Seattle
 Taylor, Joy Belle, LD, Phar.....Seattle
 Taylor, James Lynn, LD, LA.....Seattle
 Taylor, Martin S, SC, Min.....Weiser, Idaho

Taylor, Roland Merle, Unc, Bus.....Seattle
 Taylor, Susan Esther, LD, Sci.....Tacoma
 Taylor, William P J, UD, FA.....Tacoma
 Taylor, Will S Jr, Sp, For.....Darrington
 Teall, Mrs Hazel L C, UD, FA.....Walla Walla
 Teed, Howard M Jr, LD, Bus.....Snokomish
 Telg, Clifford L, LD, CE.....Seattle
 Tejada, Emilliano A, LD, LA.....Philippines
 Temple, Mrs Mary S, Sp, LA.....Tacoma
 Tenney, Madeline Gertrude, LD, Sci, Seattle
 Terhune, George W, LD, FA.....North Bend
 Terrell, Agnes L, LD, LA.....Billings, Mont
 Terrell, Ruth, LD, LA.....Seattle
 Terril, Corwin LeRoy, LD, Bus.....Kennewick
 Terry, Buella, LD, LA.....Kenmore
 Teutsch, John Milton, Sp, Bus.....Seattle
 Tevis, David Russell Jr, LD, Bus.....Seattle
 Tevis, James, LD, Bus.....Seattle
 Thayer, Ellen Jeannette, LD, LA.....Everett
 The, Kok Tie, Unc, Bus.....Java
 Theriault, Albert, LD, Bus.....Twisp
 Thielman, Cathleen Frances, Unc, Sci, Seattle
 Thies, William Adolph, UD, CE.....Seattle
 Thiry, Albert Paul, LD, Sci.....Seattle
 Tholin, A L, LD, Min.....Downes Grove, Ill
 Thomas, Gertrude M, UD, Sci.....Cosmopolis
 Thomas, Irene, LD, LA.....Bellingham
 Thomas, Lee Baldwin, LD, Bus.....Sumas
 Thomas, Margaret, LD, Sci.....Bellingham
 Thomas, Margaret E, LD, FA.....Seattle
 Thomas, Roscoe G, LD, LA.....Seattle
 Thomas, V L, LD, Sci, San Francisco, Cal
 Thome, Joseph M, LD, LA.....Granger
 Thome, Matthew W, LD, CE.....Granger
 Thompson, Albert W, Sp, ME.....Homedale, Ida
 Thompson, Allen Emmett, LD, For...Seattle
 Thompson, Bernhard Nordel, Sp, FA.....Seattle
 Thompson, Browder J, Unc, EE.....Minot, N D
 Thompson, Catherine, UD, LA.....
 Thompson, Charles Gillis, LD, Bus.....Spokane
 Thompson, Florence Bell, LD, LA.....Palouse
 Thompson, George F, LD, Bus, Lewiston, Ida
 Thompson, Gordon Wright, LD, LA, Central
 Thompson, Helen, LD, LA.....Pendleton, Or
 Thompson, Jack, LD, Sci.....Seattle
 Thompson, Lois Dorothy, LD, LA.....Seattle
 Thompson, Margaret M, Unc, LA.....Seattle
 Thompson, Marguerite E, Unc, Sci, Minot, ND
 Thompson, Nathan P, LD, Bus.....Everett
 Thompson, Thelma, LD, FA.....Tacoma
 Thompson, Thelma L, UD, LA.....Pendleton, Or
 Thompson, Mrs Bertha M, Sp, FA.....Seattle
 Thomson, Edward Lyse, LD, Bus.....Wilbur
 Thomson, Duncan Ernest, LD, LA.....Seattle
 Thomson, Frances C, UD, LA.....Seattle
 Thomson, Mamie Lyse, LD, Bus.....Wilbur
 Thomson, Mrs Rhea S, Unc, Sci.....Seattle
 Thomson, Reginald, UD, Bus.....Seattle
 Thorburn, John, LD, Min.....Seattle
 Thoreson, Wallace, LD, ChE.....Seattle
 Thorgrimson, Myrtle R, LD, LA.....Seattle
 Thorn, William A, LD, ME.....Abbotsford, BC
 Thornton, Ross C B, LD, Sci.....Seattle
 Thorpe, Clarence Steven, LD, ME.....Seattle
 Thorsland, Delmont S, UD, Bus.....Sprague
 Thorsteinson, Idunn, LD, LA.....Seattle
 Thurston, Lois Elizabeth, LD, Ed.....Seattle
 Thwing, Samuel Prentiss, UD, Bus.....Seattle
 Tibbits, Erva Lillian, LD, Sci.....Cashmere
 Tildmarsh, Patrick M, LD, CE.....Seattle
 Tilbury, Percy William, LD, ChE.....Nooksack
 Tilden, Freda A (Mrs), LD, LA.....Seattle
 Tilgner, Harold, LD, ChE.....Seattle
 Tilton, Kenneth Elwood, LD, ChE.....Seattle
 Tilton, Warren Gerrish, LD, ME.....Seattle
 Tinkcom, Lucile, LD, FA.....Seattle
 Tinker, Dorothy Jean, LD, LA.....Tacoma
 Tingling, Norman J, Unc, Bus.....Seattle
 Tionson, Felix, Sp, Bus.....Philippines
 Titus, Pauline V, LD, LA.....Portland, Or

- Tjosdal, Ruth Adelaide, LD, LA....Burton
 Tobey, Lono W, LD, Bus.....Elma
 Todd, Daphne, LD, LA.....Tacoma
 Todd, John W, UD, Bus.....Greenfield, Ind
 Tolbert, Alice C, Unc, LA....Greenwood, S O
 Tomas, Nicanor, LD, Bus.....Philippines
 Tomlinaga, Sakaye, Unc, LA.....Factoria
 Tompkins, Chester Ernest, LD, Bus....Seattle
 Toner, Lawrence Edward, LD, Bus.Sunnyside
 Toohill, Frank E, Unc, Law.....Seattle
 Toppfing, Willard F, UD, LA Granville, O
 Torpen, Hiram Maurice, Sp, Bus.....Seattle
 Torrance, Roscoe C, LD, Bus.....Spokane
 Totten, Morrell Phelps, LD, Law.....Seattle
 Tourtellot, Phillip D, Sp, Eng.....Seattle
 Towne, Arthur Herbert, LD, LA....Carrollis
 Towne, Mertice C, UD, LA.....Aberdeen
 Townsend, Howard George, LD, Bus....Seattle
 Townsend, Arthur C, Sp, Bus.Portland, Or
 Trandum, Theodore A, LD, EE.....Seattle
 Trandum, Walter F, LD, Bus.....Seattle
 Travis, Beverly Artemus, LD, EE.Pinehurst
 Trawick, Margaret P, UD, LA..Opelika, Ala
 Tremayne, Mrs Laura F, UD, LA....Seattle
 Trenholme, Dickson G, Sp, Bus.....Seattle
 Trenholme, Ruth, UD, Bus.....Seattle
 Trezies, William J, LD, Bus.....Blaine
 Trogstad, Grace I, UD, LA, La Crosse, Wis
 Tromsund, Margaret L, Unc, Phar.Snohomish
 Troth, Dennis C, Grad.....Seattle
 Trotnan, Frank B, LD, Sci.....Woodinville
 Trow, Arthur Palmer, UD, Bus.....Seattle
 Troy, Helen M, LD, LA....Juneau, Alaska
 Troy, Harold P, LD, Bus.....Olympia
 Troy, Marion Lucile, UD, Ed.....Olympia
 Troy, Mary Madeline, LD, LA....Olympia
 Trumball, Jonathan J, LD, LA....Seattle
 Tschudin, Ethel Ava, Unc, Phar.....Napavine
 Tschudy, Arnold N, LD, LA.....Seattle
 Tsol, Nai Shing, LD, Bus.....China
 Tabbs, Ray W, Sp, Sci.....Buckley
 Tuck, Joseph, UD, Bus.....China
 Tuck, Marjorie B, LD, LA....Billings, Mont
 Tucker, Alexander N, LD, ChE.....Seattle
 Tucker, Alice Norma, LD, FA.....Seattle
 Tucker, Marvin, Unc, LA.....Toppenish
 Tucker, Stacy Argyle, LD, LA....Bellingham
 Tucker, Wilmon Stevens, LD, LA....Seattle
 Tudor, Guy M, LD, MB..New Dayton, Can
 Tuseley, George Prescott, LD, Bus..Yakima
 Tung, Sung Wuan, UD, Bus.....China
 Tupas, Ambrosia B, LD, Min.....Philippines
 Tupper, Chester Dewey, LD, Bus..Snohomish
 Tupper, Louise Clyde, Sp, FA.....Seattle
 Turinsky, Angeline, Unc, LA..Sandpoint, Ida
 Turk, Jack, LD, Bus.....Chewelah
 Turncliffe, Mary Lucile, UD, Phar.....
 Turnblad, Harold Magnus, LD, LA..Seattle
 Turnbull, Donald M, LD, Bus....Skykomish
 Turner, Arthur Frank, Unc, EE.....Seattle
 Turner, Charles Maynard, LD, EE..Everett
 Turner, Herbert Clair, UD, Bus.....Seattle
 Turner, Harvey Elijah, LD, LA..Davenport
 Turner, Homer Kwart, LD, Bus....Seattle
 Turner, Lloyd Edwin, UD, Sci.....Spokane
 Turner, Lucille Marie, LD, LA..Nampa, Ida
 Turner, Marstin, LD, Bus.....Seattle
 Turner, Mary, LD, LA.....Woodinville
 Turner, Paul Leonard, LD, For.....Outlook
 Turner, Roy Paris, UD, Sci.....Seattle
 Turner, Theodore Sheldon, Grad.....Seattle
 Turner, Wendell Walter, LD, Bus.....Seattle
 Turnure, Miss M B, UD, FA..Portland, Or
 Turpin, Harold Lester, UD, Bus.....Seattle
 Turtle, Hazel Jane, LD, LA.....Seattle
 Tusler, Charles Harold, LD, CE....Wilbur
 Tuttle, Esther Belle, UD, Sci.....Spokane
 Tweed, Earl Allen, LD, Bus.....Boise, Ida
 Tweed, Mildred LD, LA.....Seattle
 Twillegear, Verlan H, Sp, Phar..Bellingham
- Tyler, Charles LD, LA.....Olympia
 Tyler, Rose Higher LD, Bus.....Seattle
 Typer, Malin Linn LD, LA.....Seattle
- Ubugen, Sabas, LD, Sci.....Philippines
 Uchimura, Kiwa LD, ED.....Seattle
 Udasco, Camito S LD, LA.....Philippines
 Uddenberg, Alice LD, Bus.....Gig Harbor
 Udell, Dorothy LD, LA.....Seattle
 Uhland, Annette, LD, LA.....Seattle
 Uhlmann, William Paul LD, LA....Centralla
 Underwood, Coleman Hugh UD, EE..Seattle
 Underwood, Robert C LD, ChE...Elgin, Or
 Uphus, Evan LD, For.....Seattle
 Upton, Earl Edward UD, Bus.Black Diamond
 Upton, Marietta LD, LA.....Seattle
 Upton, Virgil Morgan Sp, Sci.....Seattle
 Urbanek, Eugene Roy LD, EE..Des Moines
 Utley, Willa Pauline LD, LA.....Seattle
 Utz, Glenn Harold Unc, Bus.....Prosser
 Uyeda, Takashi, LD, Eng Toku-Ken, Japan
- Valentine, L Albert Jr LD, Bus.....Seattle
 Valentine, Blanche Ellen Unc, LA.Montesano
 Valentine, Haddon P Unc, EE.....Hamilton
 Valmonte, Leonardo A Unc, Sci..Philippines
 Van Tsee-Ching UD, LA.....China
 Vanderburg, Mrs. Rose UD, LA....Seattle
 Vandercook, Jeanette C LD, Bus....Seattle
 Vanderhook, M William Unc, Law.....Seattle
 Vander Las, Richard Sp, Bus.....Seattle
 Vanderpool, Ned Unc, Sci.....Walla Walla
 Van Devanter, Edward L, LD, Bus..Burton
 Vandiver, Lanita LD, LA....Eastland, Tex
 Van Doren, Charles P LD, Phar.Wendell, Ida
 Van Duyn, Donald F LD, LA..Butte, Mont
 Van Duyn, Frank D, Sp, Jour Butte, Mont
 Van Duzee, Jeannette E UD, LA..St Paul
 Van Duzen, Bess Gail LD, LA....Tacoma
 Van Eaton, Harold Douglas LD, ME.Olympia
 Van Eaton, Lloyd Arthur, LD, Bus..Olympia
 Van Eaton, J M, Unc, Bus.....Batonsville
 Van Gilder, F M, LD, LA....St Helena, Or
 Van Gilder, John F, LD, Phar....Centralla
 Van Keuren, Bernice, LD, Bus.....Tacoma
 Van Koughnet, A, LD, FA..Forest Grove, Or
 Van Meter, Lyle Eugene, LD, EE..Bremerton
 Vannoy, Louise Hynes, UD, Ed.....Seattle
 Van Sicklin, Grace, UD, Bus....Weiser, Ida
 Van Tilborg, L D, LD, ME....Moscow, Ida
 Van Tilborg, Mary, Unc, LA....Moscow, Ida
 Van Vleet, Carolyn, LD, LA.....Yakima
 Van Voris, Cecil Seth, LD, Bus.....Seattle
 Van Voris, William S, Unc, Law....Tacoma
 Van Winter, Amy Marie, LD, FA....Seattle
 Veden, John Charles Jr, LD, EE.....Seattle
 Velsinge, M Louise, LD, FA.....Seattle
 Veldee, Harry, LD, Bus.....Bremerton
 Veldee, Nina May, LD, Ed.....Bremerton
 Velten, Alice K, LD, LA....Port Orchard
 Verd, Erma, UD, LA.....Seattle
 Verd, Naomi Regina, Unc, Bus....Arlington
 Vernon, Marian E, LD, Ed.....Aberdeen
 Verran, William Jr, UD, Jour.....Wapato
 Vessey, Dalice, LD, Bus....Ronan, Mont
 Vestal, Frederick L, Unc, Min.....Seattle
 Vestel, Webby, LD, Bus.....Seattle
 Veysey, Mary Isabel, UD, LA....Montesano
 Vial, Clara, Unc, FA.....Weiser, Ida
 Vick, Josephine, LD, Bus.....Seattle
 Vickers, Mildred Louise, LD, FA....Seattle
 Vldgoff, Isaac Jack, LD, Bus....Portland, Or
 Viers, Dorothy Bernice, Unc, LA.....
 Villareal, Filomen, Unc, Bus.....Philippines
 Villegas, Andres, Unc, ME.....Philippines
 Vincent, Chester, Unc, Bus.....Seattle
 Vincent, Katherine M, UD, LA.Lewiston, Ida

Vincent, W Pierre, LD, Min.....Puyallup
 Vining, Genevieve V, LD, LA.....Seattle
 Vining, Marjory, UD, Ed.....Seattle
 Vining, James Orrin, LD, Bus.....Seattle
 Vinton, Harriet E, LD, LA..Hood River, Or
 Virtue, Jessie Hardy, LD, LA..Missoula, Mt
 Virtue, Norma, LD, LA.....Missoula, Mt
 Voelker, Claude Bernard, LD, Bus.....Spokane
 Vogel, Catherine, LD, LA.....Tacoma
 Von Babo, Max, LD, EE.....Seattle
 Von Erichsen, Lyle Gordin, LD, LA..Hillyard
 Von Kettler, Wanda, UD, Jour..Vancouver
 Von Presentin, D, LD, Ed.....Marblemount
 Von Presentin, Laura, LD, LA..Marblemount
 Voorhes, Sol Watson, LD, Bus.....Yakima
 Vorce, Harriette A, Unc, FA.....Maltby
 Voyer, Gerald Joseph, LD, Sci..Anaconda, Mt
 Voyer, Margaret E, LD, Sci..Anaconda, Mt
 Vye, George William, LD, Phar.....Seattle

Waage, Robert, LD, Bus.....Silverdale
 Wade, Harold Dale, Unc, Bus.....Elma
 Waechter, Bernadine Hazel, LD, FA.....Seattle
 Waegner, Robert Philip, LD, ME.....Seattle
 Wafer, Mary Barbara, Unc, Ed..Marysville
 Waggener, Bertha Hazel, LD, FA.....Seattle
 Wagner, Florence Minera, UD, LA..Sequim
 Wahl, Berntena, UD, LA.....Seattle
 Wahlstrom, Nelson Alvin, LD, Bus.....Seattle
 Walnwright, Ernest G, Sp, ME.....Seattle
 Walnwright, Eyre Bennett, LD, Bus..Tacoma
 Wait, Robert Abel, Unc, Sci.....Decatur, Ill
 Waite, Netta Marguerite, Grad.....Seattle
 Wakefield, Carol, LD, LA.....Anacortes
 Wakefield, Claude E, LD, Bus.....Tacoma
 Wakefield, L I, Unc, FA..Ketchikan, Alaska
 Walden, Margaret, LD, Ed..Hamilton, Mont
 Waldo, Esther M, LD, FA.....Astoria, Or
 Waldo, Josephine Mary, UD, LA.....Seattle
 Walker, Bessie Marie, UD, Sci.....Seattle
 Walker, Donald, Unc, Bus..Pacific Grove, Cal
 Walker, Charles J, Unc, Bus.....Seattle
 Walker, Charles W, LD, Eng..Ellensburg
 Walker, Dwight M, LD, Bus..Vancouver, BC
 Walker, Lois Evelyn, LD, LA.....Seattle
 Walker, Henrietta, Sp, Sci.....Seattle
 Walker, J, LD, For..New Westminster, B C
 Walker, F D, Lanier, LD, LA..Bremerton
 Walker, Myrell, UD, EE.....Seattle
 Walker, Nina Ruth, LD, Bus.....Seattle
 Walker, Ona Blanche, LD, Bus.....Seattle
 Walker, Richard D, LD, ME..Anaconda, Mt
 Walker, Richard R, LD, ME.....Seattle
 Walker, Roger Albert, LD, EE.....Tacoma
 Walker, Ronald Pearson, LD, Bus..Seattle
 Walker, William B, LD, LA..Aberdeen, Miss
 Wallace, Allan R, UD, Bus.....Seattle
 Wallace, Anne, LD, LA.....Seattle
 Wallace, Genelle, LD, Sci.....Seattle
 Wallace, Hiram Brainard, Unc, Bus.....Toit
 Wallace, Lora Marie, LD, LA.....Spokane
 Wallace, Norma Willa, LD, Sci.....Seattle
 Wallace, William Adam, LD, ME.....Seattle
 Wallaer, Mildred, LD, Bus.....Spokane
 Waller, Donald G, UD, Bus.....Seattle
 Wallin, Beulah, UD, LA.....Seattle
 Wallin, James Roy, Unc, Ed.....Seattle
 Waters, Frank Outley, Unc, LA.....Seattle
 Wang, Chen-han, Sp, Bus.....China
 Ward, Alfred H, LD, Sci.....Vashon
 Ward, Cecil Miner, UD, CE.....Seattle
 Ward, Frank Donlow, 3d Law.....Seattle
 Ward, George Frank, LD, LA.....Seattle
 Ward, George Henry, LD, CE.....Hoquiam
 Ward, Harold James, LD, Bus.....Seattle
 Ward, Merrill H, LD, LA.....Vashon
 Ward, Victor, LD, Bus.....Sauk
 Warde, Walter H, LD, Eng.....Seattle
 Wardwell, Marjorie, Sci.....Seattle

Ware, Janet, LD, Ed.....Redmond
 Warford, Glenn O, LD, Bus.....Onalaska
 Warne, Ada Mary, UD, LA.....Seattle
 Warne, Alice May, LD, Sci.....Seattle
 Warner, Marylois, LD, Ed.....Seattle
 Warner, Norma L, Unc, LA....Troy, Mont
 Warnock, Mildred, LD, Bus.....Seattle
 Warren, Cecil Carl, LD, EE.....Seattle
 Warren, Edwin J, LD, Min.....Bremerton
 Warshal, Adolph, UD, Phar.....Seattle
 Washam, Fred Frank, Sp, Bus.....Seattle
 Washburn, Charlotte, LD, LA.....Seattle
 Wasson, Alfred L, LD, Bus.....Seattle
 Watkins, Inez, UD, Bus.....Hoquiam
 Watne, Ed Merritt, LD, ME.....Seattle
 Watney, Cornelius O, LD, Bus.....Seattle
 Watson, Dorothy T, LD, LA.....Seattle
 Watson, Dwight Alvin, LD, EE.....Seattle
 Watson, Harold Harrison, LD, EE.....Seattle
 Watson, John Franklin, Unc, EE.....Seattle
 Watson, William Harris, UD, EE.....Seattle
 Watson, Nettie K, LD, LA..Vancouver, B C
 Watt, Carl W, LD, For.....Berkley, Cal
 Watt, Elsie, LD, Bus.....Seattle
 Watt, Harold Barton, LD, Bus.....Yakima
 Watt, James Graham, LD, ME.....Seattle
 Watt, James William, Sp, Phar..Centralia
 Watters, Wayde H, Sp, Bus.....Seattle
 Watts, Gertrude L, Sp, FA.....Seattle
 Watts, Ruth M, UD, Sci.....Bellingham
 Way, Lois Edith, UD, Sci.....Seattle
 Weage, Esther Anna, UD, Ed.....Seattle
 Weage, Mary, LD, LA.....Seattle
 Weage, Ruth W, LD, Ed.....Seattle
 Weatherly, Clayton W, LD, ChE..Portland, Or
 Weaver, Floyd Howard, LD, Bus.....Tacoma
 Webb, Charles C, LD, Bus.....Wenatchee
 Webb, Helen E, Unc, FA.....Seattle
 Webb, Nannie Frances, Unc, Sci.....Seattle
 Webb, Walter A, Unc, ME.....Tacoma
 Weber, Hawley Edward, LD, Bus.....Seattle
 Weberg, Carroll, Unc, LA.....Denison, Ia
 Webster, Aletta, LD, LA.....Vancouver, Wu
 Weeks, Mary Louise, LD, FA.....Seattle
 Weigel, Charles Maurice, LD, Bus..Yakima
 Weikel, Elizabeth Celestia, UD, LA..Yakima
 Weiland, Marjorie L, UD, FA.....Oakville
 Weinzirl, Adolph, LD, Sci.....Seattle
 Weinzirl, Gertrude, LD, Sci.....Seattle
 Weissenborn, Howard, LD, Bus.....Seattle
 Welch, Roy Daniel, LD, Bus.....Kelso
 Weld, Karen M, LD, LA.....Seattle
 Wells, Dorothy, LD, LA.....Tacoma
 Wells, Dorothy B, LD, LA....Mt. Vernon
 Wells, Edmund Rexford, LD, ChE..Tacoma
 Welts, Richard, LD, Bus.....Mt. Vernon
 Wendland, Edwin George, LD, FA..Tacoma
 Wendler, Erwin Arthur, Sp, Bus..Ellisport
 Wenig, Edward J, Grad.....Pomona, Cal
 Wentworth, Mary Margaret, LD, Sci..Seattle
 Wentworth, Ray Lovering, LD, ME..Seattle
 Wenzel, Arthur E, LD, Eng..Twin Falls, Ida
 Werby, Helena, Grad.....Seattle
 Werner, Oscar B, LD, Bus..Litchfield, Minn
 Werner, W, UD, LA.....Greenfield, Mich
 West, Beth, LD, Ed.....Sumas
 West, Cecil Rowland, UD, Sci.....Seattle
 West, Constance Mary, LD, Sci.....Seattle
 West, Earle Downs, Grad..Forest Grove, Or
 West, Florence L, LD, Bus.....Seattle
 West, Frank, LD, Bus.....Seattle
 West, Gertrude, LD, LA.....Seattle
 West, Harry Robert, Sp, ME.....Seattle
 West, Adeline Marie, Unc, FA.....Wenatchee
 Westbrook, John Lewis, LD, EE..Anacortes
 Westerleerz, Iwar S, Grad.....Tacoma
 Weston, Merle M, UD, Sci..Sacramento, Cal
 Weston, John R, UD, For.....Logtown, Miss
 Wetherby, Harold J, UD, LA.....Tacoma
 Wetherill, True, Unc, LA.....Kenton, O

Weyant, Kathryn Phoebe, LD, Sci....Seattle
 Weythman, Ruth, UD, Sci.....Monitor
 Whalen, Carl Dorsey, LD, Bus.....Seattle
 Whaley, Francis Carlisle, LD, Bus..Chelan
 Wharton, Florence Lillian, UD, Ed....Yakima
 Wharton, Harry Jerome, LD, ChE....Seattle
 Wheaton, Alma Jane, LD, Bus....South Bend
 Wheaton, Marion E, UD, FA....Bellingham
 Wheaton, Willard, LD, Sci Lewistown, Mt
 Wheeler, Bryce, Unc, Bus.....Colfax
 Wheeler, Brooks Edward, LD, EE....Seattle
 Wheeler, Forrest V, LL, Sci.....Satsop
 Wheeler, Gladys Fidele, Grad.....Seattle
 Wheeler, James Addison, UD, Bus....Seattle
 Wheeler, Lloyd Earl, LD, ChE....Bellingham
 Wheeler, Verna Mae, UD, Ed....Gig Harbor
 Wheelock, Ernest E, Sp, Law.....Seattle
 Wheelon, Burton Jones, 1st Law....Seattle
 Whipple, Marjorie Helen, Grad.....Seattle
 Whitacre, Paul, UD, Bus.....Seattle
 White, Frances Caroline, UD, LA....Seattle
 White, Dorothy Janet, LD, Sci.....Seattle
 White, Dykeman, LD, Bus.....Portland, Or
 White, Elmer, LD, ME.....Seattle
 White, Mrs Eugenia D, UD, LA....Seattle
 White, Frances, LD, LA.....Yakima
 White, Helen Grace, LD, LA.....Seattle
 White, Janice M, LD, Bus.....Tacoma
 White, Leslie Archibald, LD, Sci....Seattle
 White, Lydia A, UD, LA.....Seattle
 White, Margaret Lois, LD, FA....Yakima
 White, Marie, LD, LA.....Seattle
 White, Myrtle, LD, Sci.....Seattle
 Whitlaw, Hugh, UD, Bus.....Seattle
 Whitesides, Norma Rose, LD, FA....Seattle
 Whiting, Edward Parsons, UD, EE..Seattle
 Whitlock, Maryhelen, UD, LA Los Angeles
 Whitman, Daniel Spurgeon, LD, LA..Seattle
 Whitmer, George, LD, Bus.....Seattle
 Whitney, Albert Judson, LD, LA....Yakima
 Whittier, Lyman K, UD, Bus....Moscow, Ida
 Wieber, Carl E, Unc, Phar.....Camas
 Wichser, Charles T, Unc, Bus.Granite Falls
 Wick, Guy Marion, Sp, Bus.....Arlington
 Wick, Sanford Adolph, Sp, Bus.....Arlington
 Wicker, Agnes, Unc, FA.....Sedro-Woolley
 Wicker, Gertrude B, LD, Sci..Sedro-Woolley
 Wicklund, Blanche, LD, Ed.....Seattle
 Widitz, J Jack, LD, ME.....Seattle
 Widrig, Thomas Merriot, Unc, EE....Seattle
 Wieden, Hazel Helen, LD, Bus..Portland, Or
 Wiegandstein, Frank J, LD, ME....Butte, Mt
 Wiel, Bodil, UD, Ed.....Seattle
 Wienand, Carl Marcus, UD, LA....Seattle
 Wiesenbach, Ward O, UD, Bus....Richland
 Wiester, Clarence M, LD, FA....Greenacres
 Wiggins, Charles K, UD, Bus..Portland, Or
 Wightman, Chauncey B, LD, Bus.Portland Or
 Wilking, Maja, LD, LA.....Seattle
 Wilcox, Milo Fay, UD, CE.....Seattle
 Wilder, Hoyt G, LD, LA....Granite Falls
 Wiley, Alexander C, 1st Law.Kallispell, Mt
 Wiley, Lois, UD, FA.....Seattle
 Wiley, James Martin, UD, Bus....Waterville
 Wiley, Wilmer Wayne, LD, ME.....Seattle
 Wilhelm, Edward K, LD, Sci.....Seattle
 Wilkes, Maxine E, LD, LA.....Seattle
 Wilkes, Jean Robin, Grad.....Seattle
 Wilkins, E L, Unc, Bus....Twin Falls, Ida
 Wilkinson, Jessie, LD, Bus....Sedro-Woolley
 Willard, Dorothy Elizabeth, LD, LA..Seattle
 Willard, Dudley Wilson, Grad.....Kent
 Willett, Henry Truax, LD, Sci....Seattle
 Williams, David James, LD, LA....Tyler
 Williams, Earl Arthur, Sp, Ed.....Olympia
 Williams, Edith V, Unc, LA.....Blaine
 Williams, Frances Ethelyn, LD, FA.Yakima
 Williams, Willard Gayle, LD, Bus....Seattle
 Williams, George Otis, UD, Bus.....Seattle
 Williams, Grant J, LD, CE....Payette, Ida

Williams, Harold L, LD, Bus.....Seattle
 Williams, Paul Hugh, LD, EE.....Seattle
 Williams, Ruby Josephine, LD, Bus..Spokane
 Williams, Kenneth G, Sp, Bus.....Spokane
 Williams, Mrs Mary L, LD, Ed....Seattle
 Williams, LeRoy, Unc, Law.....Seattle
 Williams, Margaret C, 1st Law....Seattle
 Williams, Ethel Marjorie, UD, Ed..Wilbur
 Williams, Menta L, LD, LA.Miles City, Mt
 Williams, Owen, UD, Bus.....Seattle
 Williams, Robert C, UD, For..Detroit, Mich
 Williams, Ronald Campbell, LD, Bus.Sprague
 Williams, Scott, LD, Bus....Leavenworth
 Williams, Thomas Alfred, LD, LA....Seattle
 Williams, Wallace Edwin, LD, Bus..Seattle
 Williams, William C, Unc, Law.....Seattle
 Williams, Winifred, LD, Sci.....Seattle
 Williamson, Marguerite, LD, Sci....Seattle
 Williamson, Reba, LD, LA....Greybull, Wyo
 Willison, Clyde Lester, LD, ME....Blaine
 Willoughby, A Beryl, Unc, Sci.Lewiston, Ida
 Wills, Henry V, LD, Phar....Friday Harbor
 Wilson, Alice L, UD, Bus.....Seattle
 Wilson, Beatrice Mariam, Unc, LA....Seattle
 Wilson, Ben William, LD, Bus..Portland, Or
 Wilson, Burdette G, LD, Bus..Newberg, Or
 Wilson, George Dewey, UD, For..Aberdeen
 Wilson, Doris Glasgow, Grad.....Seattle
 Wilson, Edwin D, Grad.....Everett
 Wilson, Mrs F B, Grad.....Seattle
 Wilson, Glen Evans, 1st Law.....Seattle
 Wilson, Grace, LD, LA.....Seattle
 Wilson, Harvey Brwin, UD, LA....Everett
 Wilson, Howard W, LD, ChE..Portland, Or
 Wilson, John Gilbert, LD, Bus.....Seattle
 Wilson, John M Jr, 2d Law....Olympia
 Wilson, Lena, Grad.....Seattle
 Wilson, Lee, Unc, Bus....Tisman, China
 Wilson, Lucile H, LD, LA....Hoquiam
 Wilson, Mazie, UD, LA.....Seattle
 Wilson, Paul Ebenezzer, LD, Sci....Spokane
 Wilson, Thelma, LD, LA.....Seattle
 Wilson, James Victor, LD, EE....Tacoma
 Wilson, Virginia, LD, LA.....Seattle
 Wilson, William Gray, LD, Sci....Spokane
 Wilson, William Henry, Sp, FA....Seattle
 Wiman, Fred S, UD, LA.....Portage
 Windley, Esther W, LD, Sci....Auburn
 Winkel, Frederick W, Unc, Bus..Ellensburg
 Winn, Burdett A, LD, Min.Juneau, Alaska
 Winston, James Carey, LD, Bus....Seattle
 Winter, Alfred F, LD, LA....Portland, Or
 Winningham, Nona J, LD, FA....Seattle
 Winninghoff, F L, LD, Sci..Philipsburg, Mt
 Winter, Evelyn M, LD, LA....Portland, Or
 Winter, K M, Unc, FA....Los Angeles, Cal
 Winter, Rex, Grad.....Seattle
 Wintermutes, Gladys Marie, LD, Sci..Seattle
 Winters, Bernadine L, LD, FA....Seattle
 Winwood, Ralph F, LD, Bus.....Seattle
 Wise, Joseph W, LD, LA....Vancouver, Wn
 Wise, Leslie V, LD, Bus....Vancouver, Wn
 Wise, Robert S, UD, LA....Cedar Falls, Ia
 Wisen, Byron Francis, LD, Bus....Seattle
 Wiswall, Henry M, LD, Sci....Vancouver
 Withrow, Faye, LD, LA.....Seattle
 Witt, Lucille (Mrs), LD, Sci....Seattle
 Wittenberg, Louis H, LD, Sci....Seattle
 Woelher, Harry J, UD, Min.....Seattle
 Wolrdabe, Raymond A, UD, Sci....Seattle
 Wolf, Alvin Joseph, LD, ChE....Auburn
 Wolfe, Joe, LD, Bus.....Seattle
 Wolfe, John Brown, LD, Bus.....Seattle
 Wolfe, Merle, LD, Bus.....Seattle
 Wollaston, Francis O, LD, EE..Victoria, BC
 Womack, Jasper C, LD, Eng....Carnation
 Wong, Chew C, Fred, LD, Sci Canton, China
 Wong, Frank Su-tung, LD, Bus....Seattle
 Woo, May Geraldine, UD, LA.....Seattle
 Wood, Arthur Garde, UD, Bus..Payette, Ida

Wood, Carl Edwin, LD, ChE.....Seattle
 Wood, Esther Mary, UD, Bus.....Seattle
 Wood, Everett Powers, LD, Bus..Helena, Mt
 Wood, George, Sp, CE.....Dryad
 Wood, James Harold, UD, Bus.....Seattle
 Wood, Harold Sydney, LD, Bus....Sunnyside
 Wood, Hazel E, LD, LA.....Seattle
 Wood, James Leslie, LD, Bus.....Seattle
 Wood, Leighton Howard, UD, Bus.....Seattle
 Wood, Lillian, Grad.....Seattle
 Wood, Mary, LD, Sci.....Seattle
 Wood, Oak D, UD, Bus.....Hood River, Or
 Wood, Roswell R, LD, Phar.....Renton
 Wood, Russell W, LD, For.....Seattle
 Wood Zephia, LD, FA.....Tacoma
 Woodall, Otis, LD, EE.....Ephrata
 Woodbridge, Frederick W, Sp, Bus.....
 Woodburn, Worth, LD, ChE.....Carbonado
 Woodcock, Lucy A, Unc, Ed.....Dungeness
 Woodhouse, Arthur Jack Jr, LD, ME, Seattle
 Woods, Rachel Angeline, LD, Sci.....Seattle
 Woods, Ruth Elizabeth, UD, LA.....Cle Elum
 Woodwand, Harriett, UD, Bus.....Seattle
 Woodward, Henriette Leone, UD, Bus, Seattle
 Woodward, Mrs W C, UD, LA.....
 Woodworth, Claude J, LD, LA.....East Sound
 Woodworth, Earl Grantly, LD, Bus....Nooksack
 Woody, Nell Edwin, LD, CE.....Winlock
 Woolaston, Francis, LD, Eng Victoria, Can
 Woolley, Myles, LD, EE...Poughkeepsie, NY
 Woolsey, Eva Fay, UD, Lib.....Seattle
 Worboys, Helen Monfort, UD, LA.....Seattle
 Workman, Esther B, LD, Ed...Portland, Or
 Workman, Lucy Nadine, LD, Bus.....Seattle
 Worsham, Aurelia, LD, LA.....Seattle
 Worswick, Luella Anne, LD, Bus....Seattle
 Worth, Harold B, LD, FA, Monte Vista, Colo
 Worthington, Harold L, LD, CE....Quilcene
 Worthington, Robert E, LD, ME, Quilcene
 Worthley, Charles B, UD, EE.....Tacoma
 Wotherspoon, Gavin C, LD, Bus....Seattle
 Wray, Burrill, Unc, EE.....Seattle
 Wrentmore, Gwyneth, LD, LA.....Philippines
 Wright, Allen C, UD, EE...New Bridge, Or
 Wright, Elizabeth, Grad, LA.....Seattle
 Wright, Elmer Robert, LD, ME.....Seattle
 Wright, Elsie, Unc, Ed.....Seattle
 Wright, Frank H, LD, ME.....Seattle
 Wright, George Jr, Unc, Bus.....Tacoma
 Wright, Guy S, LD, EE.....Victoria, B C
 Wright, Jack Willis, LD, LA.....Tacoma
 Wright, Leota, LD, Ed.....Camas
 Wright, Ralph E, LD, Eng.....Chelan
 Wright, Robert Burns, LD, EE.....Seattle
 Wright, Albert Russell, LD, Bus.....Seattle
 Wright, Wilma LD, Bus.....Tacoma
 Wurzbacher, Marian LD, FA.....Seattle

Wyers, Marie LD, LA.....White Salmon
 Wyers, Teunis James LD, Bus..White Salmon
 Wyman, Thornton D LD, LA....Boise, Ida
 Wyman, Winfred LD, Ed.....Colfax

Yadro, Francis John LD, ChE.....Ronald
 Yamada, Galchi, Grad, Min.....Japan
 Yates, Dewey LD, Bus.....Clarkston
 Yates, James, UD, Bus.....Clarkston
 Ybojos, Marceline V Unc, Bus....Philippines
 Yeager, Fred A LD, ME.....Spokane
 Yeatman, Marion E UD, Ed..Vancouver, Wn.
 Yerger, Beasle Pearl Grad.....Seattle
 Yerkes, Margaret LD, FA.....Seattle
 Ygray, Bartolome LD, ME.....Philippines
 Yonemoto, Shinji Grad.....Stevenson, B C
 Yoshimura, Tamekichi LD, Bus.....Japan
 Yost, Steele G LD, Ed.....Blackfoot, Ida
 Youell, Miriam UD, LA.....Seattle
 Young, Arthur B LD, Bus....East Stanwood
 Young, Dorothy UD, Sci.....East Stanwood
 Young, Edle F UD, Sci.....Boise, Ida
 Young, Ertes May Unc, Bus.....Seattle
 Young, Harold Dewey Grad.....Kirkland
 Young, Helen LD, FA.....Seattle
 Young, Laverne UD, FA.....Tacoma
 Young, Lois Evelyn, LD, LA....Aberdeen
 Young, Mae A Unc, Sci.....Astoria, Or.
 Young, Steven A LD, Bus.....Montesano
 Young, Vernus LD, Bus.....Sherwood, Or
 Young, Wesley George Grad.....Seattle
 Youngquist, R Clifford LD, EE...Goldendale
 Yow, Rose Law LD, FA.....Seattle
 Ystrom, Bernard, Unc, Eng.....Seattle

Zaar, Clarence William LD, LA.....Seattle
 Zahl, Herman Miles LD, Bus..Williston, N D
 Zambemin, Carl UD, Bus.....Olympia
 Zamora, Vicente P Unc, CE....Philippines
 Zarsadilas, Sofia, LD, LA.....Philippines
 Zee, Chung LD, Bus.....China
 Zee, Ernest Unc, Bus.....China
 Zeigel, Henry H LD, Min.....Dragon, Utah
 Zeis, Duncan LD, Bus.....Seattle
 Zener, Bertram LD, Sci.....White Salmon
 Zener, Carlos R, UD, Bus..White Salmon
 Zener, Robert G LD, ME.....White Salmon
 Zickrick, Lyall W UD, Min..Wahkon, Minn
 Ziel, Leonard LD, CE.....Pt Townsend
 Zimmerman, Mary Lucille UD, LA....Seattle
 Zimmerman, Ralph O, UD, Bus..Gresham, Or
 Zinthro, Clarence J LD, EE.....Seattle
 Zobrist, Herbert E Unc, ME.....Acme
 Zwicky, Everett E, UD, Unc Min Kalso, B

SUMMER QUARTER STUDENTS—1921

Abel, Robert Bryan, 1st Law Grays Harbor	Baker, Warren Benjamin.....Seattle
Abell, Charles H, LD, BA.....Seattle	Baldwin, Anna L, Spec.....Spokane
Abelset, Mark, 3d yr, Law.....Seattle	Baldwin, David Edward, UD, Ba.....
Achlin, Helen Spec, LA.....Seattle	Baldwin, Rolla Joseph, Unc.....
Adair, Prudence, Spec, Ed.....Seattle	Balfour, Eda.....Chehalis
Adams, Jeannette, UL, LA.....Spokane	Bail, Belya Lillian.....Pomeroy
Adamson, John Q, Unc, BA, Sherman, Texas	Ballard, James M, Spec, LA.....Seattle
Aells, Margaret Kathryn, UL, BA.....Dayton	Bamborough, James Elton, Unc.....
Agen, John Stuart, LD, Bus.....Seattle	Bampton, Louise.....Vancouver, B C
Agulla, Jose, LD, Ed.....San Jose, Philippines	Banks, Amy Theodora.....Seattle
Ahnquist, Ethel Martha, Unc, Ed.....Tacoma	Banks, Gale Condee.....Portland, Ore
Akin, Cecilia Eleen, Unc, LA.....Seattle	Banta, Donald M, UD, Ed.....Selah
Akin, Margaret Agnes, Unc, FA.....Seattle	Bar, Wm, Lawrence, 3d Law.....Seattle
Albee, Archie Veryl, UL, LA.....Seattle	Barber, David A, Grad.....Kent
Albers, Alvina M, Grad.....Northfield, Minn	Barber, Helen Josephine, Unc.....Kent
Albert, Besse Cooley, Unc, FA.....Seattle	Barber, Zay, Grad.....Seattle
Alberts, Hazel Estella, UD, LA.....Seattle	Bardon, Norma, UD, LA.....Seattle
Albertson, Genevieve, UD, LA Hardin, Mont	Barquist, Walter Conrad.....Seattle
Alderman, Edith Pauline, FA Portland, Ore	Barrett, Marshall N, LD, Sci.....Vancouver
Alderson, Fay Sue.....Hardin, Mont	Barrow, Minna Elizabeth.....Newark, S J
Alexander, Brian B, Fr, CE.....Victoria, B C	Bartholomew, Wayne L, LD, BA.....Seattle
Allen, Glenna Alicia, UD, Sci.....Seattle	Bassett, Charlotte A, UL, Sci.....Hoquiam
Allen, Joseph Mills, UD, BA.....Tacoma	Bassett, Samuel Bitar.....Washington, D C
Allen, Louise Barrett, Spec, Sci.....Seattle	Batcheller, Elva Leonore, Grad.....Seattle
Allen, Lucile, Grad.....Greencastle, Ind	Batdorf, Beryl.....Seattle
Allen, Mabelle, UD, Ed.....Bellingham	Bateman, Albert A, Unc, FA.....
Allen, Mildred A, UD, Ed.....Seattle	Bathwell, Belle, UD, LA.....
Allen, Viola Maxine.....Sandpoint, Ida	Bauer, Lydia L, Spec, Ed.....Walla Walla
Alper, Morris, UD, ME.....Seattle	Bay, W, D.....Bothell
Alport, Ruth Jessie, UD, Ed.....Buffalo, N Y	Beall, Bessie, Spec, LA.....Olympia
Alverson, Stella, Spec, BA.....Calhoun, Ken	Beach, Leota Myrtle, Unc, Ed.....Seattle
Alvord, Mary Hamilton, Unc, Law Chehalis	Bean, Erma Lois, LD, BA.....Spokane
Andersgord, Helen E, Grad.....St. Paul, Minn	Bean, Mabel Louise, LD, LA.....Seattle
Andersen, Frances Bertine, UD, Ed.....Seattle	Beardslee, Will Gordon.....Bothell
Anderson, Ada Charlotta, Grad.....Seattle	Beauchamp, Grace, LD, LA.....Winlock
Anderson, Arvid E, Grad Sandy City, Utah	Beebe, Jeanette Howell.....Seattle
Anderson, Clara Irene.....Sandpoint, Ida	Behymer, Verona Skinner.....Seattle
Anderson, Edna M, UD, Sci.....Redmond	Bell, Adna May, Unc, Sci.....Vancouver, B C
Anderson, Edward G.....Ellensburg	Bell, Bonnie, UD, LA.....Seattle
Anderson, Else.....Seattle	Bell, Ellis W, Fr, ME.....Mt. Union, Ia
Anderson, Evelyn M, UD, Sci.....Seattle	Bell, Kate Tuttle, Grad.....Spokane
Anderson, Mrs. Florence, Unc, Sci Langley	Bell, Otis Emmett, Unc, Ed Idaho Falls, Ida
Anderson, Jessie J, Grad.....Vancouver, B C	Bell, Wyloha Helen, UD, LA.....Seattle
Anderson, John Franklin, Unc, Ed.....	Bemiss, Meriam Catherine, UD, LA Spokane
Anderson, Lucien F, Spec, Ed Portland, Ore	Benezra, Henry, S, EE.....Seattle
Anderson, Margaret Gena.....Tacoma	Bender, Robert William, Jurn.....Tacoma
Anderson, Mary Carew.....Bellingham	Bennett, Ada M.....Seattle
Anderson, Mary Murphy.....	Bennett, Brenda Ann, Spes, BA, Kapowsin
Anderson, Pauline.....Yakima	Bennett, Edward Allen, Grad.....Seattle
Anderson, August R, UD, Sci.....Seattle	Benezra, Henry, S, EE.....
Ankcom, May, Unc, LA.....Palouse	Benson, Clarence W, UD, LA.....Spokane
Applegate, Lindsay M, UD, EE.....Harrington	Berg, Lawrence R, Jr, EE.....Missoula, Mont
Arant, Bernadine R, LD, Ed Lewiston, Ida	Berg, Stella Marie, Unc, Sci.....Seattle
Archer, Helen, LD, LA.....Seattle	Bergman, E, E, UL, Sci.....Breckenridge, Col
Archer, Raymond Barnes, LD, LA.....Seattle	Bergstrom, Anna, Spec, Sci.....
Arges, Julia Eileen, LD, Ed.....Du Pont	Berner, Elsa Rose.....Clackamas, Ore
Armbruster, Verona, Unc, LA.....Burton	Bernheim, Martha Julia, J, Phar.....Seattle
Armstrong, Raphael W, LD, Bus.....Tacoma	Best, Walter Columbus, Spec, Bus.....Seattle
Arneson, Harriett J, Grad Big Timber, Mont	Bewley, Loyal V, F, EE.....Seattle
Arneson, Ruby, UD, LA.....Seattle	Bewley, Ruth Lynette, Unc, LA.....Seattle
Arthur, Isobel.....Nelson, B C	Bhuh, Geau.....Seattle
Arthur, Margaret Isabel, L.....Nelson, B C	Bingham, Blanche Irene, LD, LA.....Seattle
Ashton, Emmett Raymond, LD, Eng.....Seattle	Bingham, Glen Arthur, Grad.....Denver, Colo
Aspinwall, Mabel Gates, Grad.....	Bird, Lela.....Twin Bridge, Mont
Atkins, Ruth, UD, LA.....	Birks, Margaret E, UD, LA.....Tacoma
Attebery, Uri Oscar, UD, Ed.....Elk	Bisazza, Virginia, Unc, FA.....Seattle
Ault, Lila M.....Enterprise, Ore	Bishop, Theodore, Unc, LA.....Clarkston
Austin, George Ray, UD, Ed.....Seattle	Bissett, May, Grad.....Winnipeg, Manitoba
Ayers, Leland S, LD, LA San Francisco, Cal	Bissett, Rudolf Alfred, UL, Sci.....Seattle
	Bjorkquist, Enoch Joseph, Unc, LA Spokane
	Black, Dorothy E, LL, LA.....Ellensburg
Bailey, Frank Holmes, Grad.....Seattle	Blackburn, Mrs, R, L.....Ephrata
Bailey, Merle Parker.....Gooding, Ida	Blackburn, Richard Leroy, UL, LA.....Ephrata
Bailey, William Locke, 1st Law.....Seattle	Blackstone, Helen E.....Seattle
Baker, Portia, Grad.....Seattle	

Blaine, James A, LL, LA.....Seattle
 Blake, Thomas Wallace.....Olympia
 Blankenhorn, Helen, Unc, BA.....
 Blomgren, Ethel E, Grad.....Butte, Mont
 Blosser, Stella Bell, LD, LA.....Snohomish
 Blankenhorn, Helen.....Spokane
 Bohn, Herman Carl.....Seattle
 Bollam, Darrell, LD, Sci.....Portland, Ore
 Bollman, Dean S.....
 Bolman, James, UD, Ed.....Madagascar
 Bolton, Edwin, Soph, CE.....Seattle
 Bonnell, Daisy Frow, Grad.....
 Bonner, James F, Grad.....Columbus, Neb
 Bonnett, Howbert B, Unc, ME.....Seattle
 Bookwalter, Florence.....Dayton, O
 Borman, Ernest Ehrke, UD, EE.....Seattle
 Bostad, Mabel, Sci.....Fosston, Minn
 Bothwell, Bell.....Seattle
 Bottenseck, Anne E, UD, Ed.....Medina, Wis
 Bowen, Joseph C, Fr, EE.....
 Bowles, Allen.....Vancouver, B C
 Bowman, Avis Ellen, Unc, LA.....Snohomish
 Bowman, Edna E, UD, LA.....Everett
 Bowman, Lillian Oline, Unc, LA.....Snohomish
 Bowne, Charles Walter, Spec, LA.....Valleyford
 Bowne, Nona Dunn, Spec, LA.....Valleyford
 Bowns, Lillian Ruth, Unc, Ed.....Colville
 Brackett, Bertha, Grad.....Seattle
 Braid, Frances Mae H, LD, LA.....Seattle
 Brandriff, Herman, LD, Sci.....Edmonds
 Bray, Edith.....Helena, Mont
 Brayton, Fannie, Grad.....
 Brehm, Helen Louise, UD, Ed.....Seattle
 Brennan, E, R, Spec, FA Coeur d'Alene, Ida
 Brethorst, Marie, Grad.....Seattle
 Brewer, Jessie Marie, UD, LA.....Spokane
 Brewer, Ruth Hazel.....Ripon, Wis
 Bridston, Albertine O, LD, LA Valier, Mont
 Brill, Birdie B, UD, LA.....Minneapolis, Minn
 Brink, Stephen M, Grad.....Seattle
 Brower, Grace Louise.....Seattle
 Brown, Bertha Signor, Unc, Sci.....Rockford
 Brown, Earl Dwight, UD, ChE.....Custer
 Brown, Earl T, Grad.....Centralia
 Brown, Ford Keeler.....Seattle
 Brown, Francis L, UD, BA.....Yakima
 Brown, Francis M, LD, LA.....Portland, Ore
 Brown, Martin.....Yakima
 Brown, Melvin Edward, Unc, Ed Rockford
 Brown, Nellie Vesta.....Hardin, Mont
 Brown, Sarah, LD, BA.....Yakima
 Brown, Vaughan, 3rd Law.....Seattle
 Brownell, Helena Maxwell, Grad.....Seattle
 Bruce, Helen Roslyn, Grad.....Seattle
 Bryan, Clara M, Grad.....Montessano
 Buchanan, Christiana, LA.....Vancouver, B C
 Bucher, Marion, Spec.....
 Budden, Frank Wilfrid, Jr, EE.....Seattle
 Bulkeley, Josephine, Grad.....Seattle
 Burcham, Marie A, UD, LA.....Seattle
 Burgess, Dora Cecilia.....Tacoma
 Burgess, Celia M, Grad.....Palouse
 Burghardt, Lucy.....Great Falls, Mont
 Burke, Mrs. Edna L, Spec, LA.....Seattle
 Burks, Florence, Grad.....Anaconda, Mont
 Burke, Kendall E, UD, Sci.....Seattle
 Burke, Mattie H, UD, LA.....Seattle
 Burleigh, Bess May, UD, Ed.....Seattle
 Burnett, Alta Hazel, UD, Ed.....Pomeroy
 Burns, Helen, UD, FA.....Spokane
 Burns, Jessie E, LD, LA.....Seattle
 Burns, Rosalia G.....St. Peter, Minn
 Burr, Harriet Kendall, Spec.....
 Burrows, Louise.....Sequm
 Burrows, Wm, J, LD, Sci.....Chehalis
 Burrus, Thurlow, LD, Sci.....Spokane
 Bursell, Blanche, UD, Ed.....Seattle
 Bursell, Margaret, UD, Ed.....Seattle
 Burwell, Frederick A, UD, BA.....Seattle

Butler, Judson Rea, LD, LA.....Burton
 Button, Arthur Oscar, BA.....Bellingham
 Button, H, O, A.....Bellingham
 Byers, Kathryn.....Seattle
 Byers, Zina G.....Eugene, Ore
 Byron, Margaret, UD, LA.....Boise, Ida

Cady, Osman Horace, Grad.....
 Cage, Mary, Grad.....
 Caimduff, John.....Seattle
 Calkins, B, Myrtle, Unc, Sci.....Tacoma
 Callaghan, Dennis M, UD, Ed.....Seattle
 Callow, Annabel, Sci.....Spokane
 Calvert, Laurence C, UD, BA.....Seattle
 Calvert, Starr Henderson, Unc, BA.....Seattle
 Calvird, Enid, LA.....Clinton, Mo
 Camp, Dorothy Foster, UD, Sci.....Seattle
 Campbell, Alice May, Unc, LA.....Waverly
 Campbell, Arthur Talbot, Sr, EE.....Seattle
 Campbell, Ernest William, Grad.....Seattle
 Carey, Ellen, Unc, Ed.....Seattle
 Carey, Henry Ames, LD, LA.....
 Carlander, Oswald Rudolph, UD, Sci Seattle
 Carlson, Effie Annabel.....Willapa
 Carlson, Florence, Unc, Ed.....Seattle
 Carlson, Hildore Matilda, Unc, Ed Willapa
 Carlson, Hulda M, UD, Ed.....Gig Harbor
 Carlson, Joseph E, UD, Ed.....Lewiston, Ida
 Carlton, Ella, Spec, Ed Coeur d'Alene, Ida
 Carnine, Jennie M, Ed..... Fargo, N D
 Carr, Howard M, S, ChE.....Tacoma
 Carr, Neil, UD, Ed.....Spofford
 Carrithers, Lillie A, UD, Ed.....Centralia
 Carroll, Frank S, Soph, Comm, E.....Seattle
 Carroll, Joseph D, Grad.....Seattle
 Carson, Emma, Unc, Sci.....
 Cartwright, Laura, D, LD, LA.....Seattle
 Cartwright, Ralph.....Wallace, Ida
 Carver, Roscoe Jesse, UD, LA.....Tacoma
 Cash, Bessie May, Grad, Bloomington, Ill
 Castner, Burton M, LD, LA.....Seattle
 Castonia, Minnie Elizabeth.....Seattle
 Caton, Mary E.....Ottumwa, Iowa
 Cave, Floyd A, LD, LA.....Seattle
 Cekada, Emil Boyomir, LD, Sci.....Seattle
 Cekada, Martha Amalia, LD, Sci.....Seattle
 Chalfant, Frank E, 2nd Lav.....Boise, Ida
 Chamberlain, Dorothy, Grad.....Seattle
 Chamberlain, Elizabeth, Grad.....Seattle
 Chamberlain, Helen D, Grad.....Seattle
 Chambers, Wilma, Grad.....Pomona, Mo
 Champlin, Rose A, Spec.....Kennydale
 Chandler, Gladys, LD, Ed.....Sheridan, Ore
 Chandler, Willard E, Grad Rathdrum, Ida
 Chapman, Florence, Unc, LA.....Plummer, Ida
 Chappelle, Gladys, Grad.....Everett
 Charroin, Florence, UD, LA.....Seattle
 Chen, Suen, UD, LA.....Ningpo, China
 Cheney, Johnston Myers, Unc, CE.....Tacoma
 Cheng, Chien Feng, UD, BA Foochow, China
 Chittick, Edna Whitman, UD, FA.....Seattle
 Choy, Doo Whan, Fr, Min Honolulu, Hawaii
 Chubbuck, Alice Louise.....Auburn
 Christianson, Luella, UD, Ed.....Seattle
 Christie, Lily, Sci.....Seattle
 Chubbuck, Alice Louise, Grad.....
 Churches, Ada Evelyn, UD, Ed.....Everett
 Clark, Bessie, Grad.....Pullman
 Clark, Elmer, Unc, Ed.....Langley
 Clark, Helen, Unc, LA.....Portland, Ore
 Clark, Lenore Bailey, Unc, Ed.....Langley
 Clarke, Loretta Leslie, UD, Sci.....Auburn
 Clarke, Elmer.....Seattle
 Clarke, Richard King, LD, BA.....Seattle
 Classic, Ralph Fred, LD, Fish.....Portland, Or
 Claussen, Francis, LD, Sci.....Goldendale
 Claypool, John C, UD, Sci.....Seattle
 Cleary, Bessie, E, LD, LA.....Spokane
 Clein, Norman, Sci.....Seattle

Clement, Franklin C.,.....	Albert Lea, Minn
Close, Anetta L, UD, Ed.....	Kalama
Clough, Ray W, Grad.....	Seattle
Coatsworth, Leonard B, Jour.....	Seattle
Coffinberry, Pearl S, Grad.....	Seattle
Coffman, Grace M, UD, LA.....	Spokane
Coffman, Mabel M, Unc, LA.....	Bellingham
Cole, Gladys G, LD, FA.....	Seattle
Coleman, John E, UD, Ed.....	Portland, Or
Coleman, Louise, Grad.....	Seattle
Collier, Olive Irene, LD, LA.....	Seattle
Collins, Audrey Lenore, Unc, FA.....	Seattle
Collins, Kenneth R, UD, LA.....	Ellisport
Collins, Opal H, Grad.....	Seattle
Collins, Ruth, LI, Ed.....	Triplett, Mo
Condit, Charlotte F, LA.....	Bliss, Ida
Condit, Sadie Adeline, L.A. Hagerman, Ida	
Conklin, R, H, L, Spec, For Chittoor, India	
Conn, John Earl, LD, B (.....)	Findlay, I
Connell, Archie M, UD, Ed, Freewater, Ore	
Connolly, R, Constance, Spec, BA.....	
Connor, Catherine, Unc, LA.....	Seattle
Converse, Esther J, LA.....	Billings, Mont
Cook, Beatrice H.....	San Francisco, Calif
Cook, Raymond Edward, Grad.....	Chehalis
Cooney, Alta, UD, Ed.....	Seattle
Cooper, Alfred Morton.....	Seattle
Cooper, Elsie Lawson.....	Seattle
Cooper, Isabel Donkin, UD, LA.....	Tacoma
Cope, Harvey F, UD, Ed.....	Corvallis, Ire
Copeland, Mildred F, FA.....	Portland, Ore
Corbally, John E, Grad.....	Seattle
Cordero, R, M, Jr, Phar Bawan, Philippines	
Corskie, Florence B, LD, Sci.....	Seattle
Coulter, Edna M, Unc, FA.....	Williston, N D
Cox, Hallie M.....	Helena, Mont
Coyner, Ruth Caldwell.....	Kirkland
Craig, Dora B, UD, Ed.....	Eureka, Kans.
Crain, Leota, Unc, LA.....	Tacoma
Crane, Lillian A, D, LD, LA.....	Seattle
Craske, Fred H, Grad.....	Bellingham
Craven, Leonard T, Unc, LA.....	Seattle
Cremers, Henry, Grad.....	Seattle
Crim, Winnifred D, LD, LA.....	Seattle
Crofoot, Mentha, UD, Ed.....	Seattle
Cronk, Lillian C, Unc, Ed.....	Worley, Ida
Crowley, Montana, Unc, Ed.....	Butte, Mont
Crummett, Alice, Unc, BA.....	
Crummett, Ella, Unc, FA.....	Palouse
Crump, John K, Unc, LA.....	Seattle
Cuddy, Flora May.....	Auburn
Cullinan, Nicholas C, LD, LA.....	Seattle
Culver, Ralph M, LD, BA.....	Seattle
Cummings, Ardyce H, UD, Ed.....	Seattle
Cunningham, Genevieve M, LA.....	Baker, Ore
Cunningham, B, Theresa, Grad.....	Seattle
Curtiss Verne E, LD, LA.....	Grand Dalles, Ir
Cushing, Gladys H.....	Seattle
Cutter, Susan E, UD, Sci.....	Sheridan, Wyo
Cutting, Forrest B, Grad.....	Seattle
Cutts, Beatrice T, Journ.....	Seattle
Cutts, Laura L, UD, LA.....	Seattle
Dahl, Florence, Unc, FA.....	Seattle
Dahlin, Ebba, Grad.....	Seattle
Dalley, Beth E, Mrs.....	Spokane
Dalquest, Emma C, LD, Sci.....	Everett
Dalquest, Lena, Unc, FA.....	Everett
Dalton, John C, LD, BA.....	Yakima
Daniels, Mary, Unc, Ed.....	Florence, Colo
Danielson, Ella T, UD, LA.....	Parkland
Danielson, Lillian C, LD, BA.....	Tacoma
Darby, Winifred, FA.....	Eltopia
Darling, Grace, Grad.....	Boise, Ida
Darlington, Nora E, LD, LA.....	Addy
Darr, Dorothy R, LD, LA.....	Tacoma
Darwin, Mrs, K, Spec.....	Seattle
Davey, Pearl W.....	Butte, Mont
David, Emerson E, B.....	Seattle
Davidson, Florence, UD, Ed.....	Grandview
Davidson, Helen, UD, LA.....	Grandview
Davidson, Mabel.....	Spokane
Davies, David F.....	Seattle
Davis, Benjamin F, Unc, BA.....	Farmington
Davis, Frances, UD, LA.....	Everett
Davis, Martelle Elliott, Grad.....	
Davis, Raymond, BA.....	Salt Lake City, Utah
Davis, Rose McVay, Unc, Sci St. Paul, Minn	
Dawson, Kathleen, Grad.....	Oakland, Calif
Day, Mrs, Wallace Robens, Spec.....	
Dean, Mildred, Grad.....	Walla Walla
Deane, Charles H, Grad.....	Seattle
de Forest, Marlon R, Grad.....	Norwalk, Conn
Degering, Ed F, Spec, Sci.....	Mt. Vernon
Deits, Harry Lee, Unc, Ed.....	Seattle
Del Duca, Domenica E, UD, FA.....	Seattle
DeLong, Edyth, UD, LA.....	Everett
Deming, Anna, Spec.....	
Denney, Charles R, UD, LA.....	Everett
Densmore, Eda, UD, Ed. St. Croix Falls, Wis	
De Shone, M, UD, Sci.....	Seattle
Desmond, Ethel J, LA.....	Seattle
Detjen, Gertrude.....	Algoma, Wis
Dickson, Belle L, LA.....	Spokane
Dockstader, Maude J, Sci.....	Lamel, Mont
Dodd, Joseph, LD, Fish.....	Seattle
Dodge, Florence F, UD, Ed.....	Tacoma
Donaldson, James.....	Tacoma
Donovan, Nellie O, UD, LA.....	Spokane
Doran, Ida F.....	Seattle
Dove, Eva M, UD, LA.....	Bickleton
Dow, Neal Ellis.....	Seattle
Doyle, James C, LD, Sci.....	Everett
Draper, Edgar M, Grad.....	Opotario, Ore
Draper, Geo, A, Socp, ME.....	Seattle
Draper, Oscar E, BA.....	Ellensburg
Drayton, Katharin G.....	Hamilton, Mont
Driscoll, Marie E.....	Butte, Mont
Drivar, Hanna F, LD, BA.....	Seattle
Dryden, Cecil P, UD, LA.....	Peck, Ida
Dum, Mrs. Annie H, Spec.....	Seattle
Dunmore, Blanche, LD, LA.....	Seattle
Dunn, Margaret C, LD, Ed.....	Seattle
Dunning, Guy Ernest, Unc, Law Washkucna	
Dutcher, Lila M, Spec, LA.....	Seattle
Dvorak, Charles E, Grad.....	Chewelah
Eades, Beulah, Sci.....	Mesa
Eagan, Frances M, LD, Ed.....	Bremerton
Eager, Marlon C, UD, LA.....	Vancouver
Easterbrook, Alice L, Unc, LA.....	
Ebright, Elsie, UD, BA.....	Seattle
Eccles, Grace, Grad.....	Nisqually
Eckerty, Ruth.....	Indianapolis, Ind
Eddy, Mrs. Mona B, Spec, Ed Helena, Mont	
Eder, Martha L, Spec, Sci.....	Hardin, Mont
Edson, Mrs. Grace H.....	
Edwards, Elizabeth M, LD, LA.....	Seattle
Edwards, Esther M, UD, Sci.....	Seattle
Edwards, George Boardman.....	Seattle
Edwards, Pauline, LD, LA.....	Seattle
Egan, Blanche L, FA.....	Seattle
Eisenmann, A, M, LA, Nebraska City, Neb	
Elliott, Annabelle, Grad.....	
Ellis, J. Boyd, Grad.....	Marysville
Ellis, James L, Unc, LA.....	Tacoma
Ellis, Leola, UD, LA.....	Walla Walla
Ellis, Marlon F, LD, BA.....	Tacoma
Elmore, Luther, UD, BA.....	Seattle
Elvidge, Earle C, Sr, ME.....	Seattle
Ely, John Carl, UD, FA.....	Seattle
Elyea, Winifred, UD, Ed.....	Epworth
Elwell, Marion M.....	Seattle
Emerson, Frances, UD, LA.....	Butte, Mont
Emory, De Wolfe, Unc, Law.....	Seattle
Ensley, Talitha Eldora, LD, Ed.....	Seattle
Erickson, Helen, Unc, FA.....	Seattle

Erickson, Phil K, LD, LA.....Seattle
 Esten, Sidney Raymond,Anderson, Ind
 Ester, Lauvena, Unc.....Port Angeles
 Ettinger, Dorothy, UD, Ed.....Seattle
 Evans, Mary S, LA.....Spokane
 Ewan, Vernelle, LD, Sci.....Warden
 Ewell, Mensfield Mac, Unc, EE.....Seattle
 Ewer, Jess W, FA.....Lewistown, Mont
 Ewing, Richard Howe, UD, LA..Bellingham

Fahrenwald, Alice.....Seattle
 Fairwether, Douglas, LD, BA.....Seattle
 Falkoff, Anna Lea, Grad.....Seattle
 Farkley, Guy Francis, LD, Ed.....Seattle
 Farnsworth, Ruah, UD, LA..Lindsay, Calif
 Farrell, Charles Vincent, Grad.....
 Faunt, Edith Annie, Spec, FA.....
 Ferguson, Alice, Ed.....Seattle
 Fields, Alice Lois, Grad.....Salem, Ore
 Fifer, Eva Lonella, UD, Sci.....Seattle
 Fille, Viola Louise, Grad.....Irving, Ill
 Filz, Mildred Edna, UD, Ed.....Seattle
 Finley, Madge, Grad.....Seattle
 Finnegan, Agnes, Unc, Ed.....
 Finrow, Vernon H, Unc, BA.....Reardan
 Fisher, Myrtle E, UD, LA..Portland, Ore
 Fishken, Marjorie, Journ.....Seattle
 Fitzgerald, Elsie E, UD, LA.....St. John
 Fix, Lynwood W, UD, LA..Lewiston, Ida
 Flack, Lena B, LD, LA.....Seattle
 Fleenor, Joseph B, UD, Ed.....
 Fleenor, Mrs. Mame, UD, Ed.....
 Fleming, Elizabeth, SpecHuron, S D
 Fletcher, Blanche F, FA.....Seattle
 Fletcher, Elizabeth F, LD, LA.....Tacoma
 Flood, George Edward, UD, BA.....Seattle
 Flowers, Goldie, LA.....Burton
 Floyd, Lona M, Grad.....Greenville, Ill
 Fluett, Russel H, Law.....Butte, Mont
 Folsom, Bernice A.....Toppenish
 Folsom, Robert, Spec, CE.....Prosser
 Forbes, Edith, UD, LA.....Portland, Ore
 Ford, Clara Louise, UD, LA..Brooklyn, Mich
 Foreman, Iona Susan, Unc, Sci.....Houghton
 Forrest, Ronald C, UD, B.....Seattle
 Fossdick, Helen W, LD, LA..San Diego, Cal
 Foss, Mary Loretta, UD, FA..Walla Walla
 Foster, Charles Jacob, Unc, Ed.....Seattle
 Foster, Harry E, 1st Law.....Columbus, O
 Foulon, Joel Louis, UD, Ed.....Elberton
 Frank, Thomas G, UD, BA.....Spokane
 Franklin, Alice Virginia, UD, LA.....Seattle
 Frazee, Mary Carrington, Unc, Ed.....Seattle
 Fredrickson, Albert P, LD, BA.....Seattle
 Freistat, Mabel R.....Rock Island, Ill
 Frem, Horace Henderson, LD, BA.....Seattle
 French, Jane, LA.....Spokane
 French, Malcom Graham, LD, FA.....Seattle
 French, Merle Carolyn, UD, LA..Vancouver
 Friedman, Samuel.....Seattle
 Fristad, Millie Jorgina, FA..Kalispell, Mont
 Frizzell, Marie Alice.....Minneapolis, Minn
 Fullerton, Ida.....Helena, Mont
 Funkhouser, Myrtle, UD, LA.....Ridgefield
 Furber, George C, 2nd Law.....Seattle

Galbraith, H, Spec, Sci..E, Burnaby, B C
 Gallaher, Lydia, LA.....Seattle
 Gillihur, Cora.....Dayton
 Gander, A, MacLean, UD, BA.....
 Ganders, Harry S, UD, Ed.....Seattle
 Gardinier, Inez, UD, BA.....Baker, Ore
 Garske, Theresa Susanna, Unc.....Seattle
 Gaupp, Pauline, LD, Ed.....Tacoma
 Geary, Cornelia Mary.....
 Gebauer, Helen Eleanor.....Helena, Mont
 Geer, Bernice Lura, Unc, LA.....Seattle
 Gehrette, Katherine Lib, Sci Oakland, Cal

Gelsness, Thos, Grad.....Port Angeles
 Gellerman, Wm, LD, LA.....Seattle
 Gilbert, Lois Marion, Grad.....Yakima
 Gilbert, Montana.....Dillon, Mont
 Gilbert, Warren J, 3rd Law, El Reno, Okla
 Gilbreath, Matilda Karrer, Grad.....Seattle
 Gilliland, W, L, Grad.....Seattle
 Gilman, Bonnie, Grad.....
 Gilman, Hazel Wells.....St. Anthony, Ida
 Glover, Oscar Kern, Grad.....Knapowsin
 Goble, Lucy E, UD, BA.....Sunnyside
 Goebel, Ellen L, Unc, LA.....
 Good, Jane, Grad.....Mt. Vernon
 Goodner, Ernest Francis, Grad.....Seattle
 Goodwin, Charles A, LD, BA.....Tacoma
 Gorzovitzky, Maurice J, LD, EE..Seattle
 Gorman, Ellen V, UD, LA..Portland, Ore
 Gowell, Prudentia Browne, LA.....Tacoma
 Graham, Agnes.....Pomeroy
 Graham, Beatrice Eva, Grad.....Roslyn
 Graham, Wilda.....Seattle
 Graham, Wyona, Unc, FA.....
 Granger, Winifred C, LA..Janesville, Wis
 Grant, Clara G, Unc, FA.....Seattle
 Grant, Gary Gale, Soph, ChE.....Seattle
 Grant, James Coleman, UD, LA.....Seattle
 Gracie, Florence B, FA.....Milwaukee, Ore
 Graves, Ralph A, UD, LA.....Seattle
 Gray, Elizabeth D, FA.....
 Gray, Margaret, UD, LA.....Bellingham
 Gray, Wendella Unc, LA Grand Rapids, Minn
 Grebe, Louisa Edith, UD, LA.....Spokane
 Greenslade, William G, Grad..Walla Walla
 Grigg, Mary.....New York
 Gregg, Ralph, LD, Sci.....Coulee City
 Greguson, Judith, UD, Ed.....Aberdeen
 Greig, John W, Soph, EE.....Bremerton
 Griffin, John F, Grad.....St. Paul, Minn
 Griffen, Kizzle Belle, LA.....Seattle
 Grimes, Cora M, Unc.....
 Grinrod, Ione, Grad.....Seattle
 Groat, Lincoln S.....North Loup, Neb
 Gulick, Eleanor Brooks, Grad.....Seattle
 Gundlack, Wilford R, Unc, LA.....Seattle
 Gunn, Catherine, LD, Ed.....Seattle
 Gunn, Elizabeth, LD, Sci.....Seattle
 Gustafson, Walter T, Fr, EE.....Seattle
 Gwynn, Leanna, UD, Ed.....Bellingham

Haberland, Elsa, Spec.....Chicago
 Hager, Morton F, LD, BA..Portland, Ore
 Hagne, Martha, Grad.....Livingston, Mont
 Hahner, Olive, Sci.....Spokane
 Hahner, Ruth, LA.....Spokane
 Hale, Grace Thornton, Unc, LA.....Tacoma
 Hall, Amy Violet, UD, Ed..Vancouver, B C
 Hall, Vernon K, LD, Sci.....Vancouver, B C
 Hallam, Leslie C, Mrs.....Seattle
 Hallowell, Lionel B, UD, BA Roundup, Mont
 Halverson, Leonard A, LD, BA.....Seattle
 Lambert, Rhea Elizabeth.....Cheney
 Hamilton, Edna K, LD, FA.....
 Hamilton, Rachel E, Grad.....Echo, Ore
 Hamley, Gladys J, UD, LA..Pendleton, Ore
 Hamm, Charles Henry, Spec, Ed.....Seattle
 Hammar, Mrs. Louise Blau, UD, Ed.....
 Hammarberg, A, E, Grad Ostersund, Sweden
 Hammond, Allen O, Grad.....Seattle
 Hammond, Eleanor, LA.....Portland, Ore
 Hammond, Orlena I, UD, Sci.....Spokane
 Handke, Goldie C, Sci.....Seattle
 Hankinson, Helen A, LD, LA Moscow, Ida
 Hannan, Esther, Unc, LA.....Wenatchee
 Hannan, Ruth.....
 Hansen, Alvilda L.....Lewiston, Ida
 Hansen, Hilda, Unc, FA.....Ferndale
 Hansen, Leo, Unc, Sci.....Lacey
 Hansen, Nine Isabell, Sci.....Bemdale
 Hansen, Viola, UD, LA.....Seattle

Hanthorn, Faith, Grad.....Portland, Ore
 Hara, Tadao.....Kobe, Japan
 Harada, Matsutaro, LD, Sci.....Japan
 Harbaugh, Chas, W, LD, BA Sedro Woolley
 Harmon, Louise W, Grad.....Orosl, Cal
 Harper, Le Roy, LD, Sci.....Seattle
 Harrington, Bernard J, LD, BA Butte, Mont
 Harrington, Florence, LD, LA, Butte, Mont
 Harris, Sarah Eleanor, UD, BA.....Seattle
 Harrison, Mary, Unc, Ed.....Toledo, Ore
 Harvey, John Hamilton.....Vancouver
 Hassenmiller, K, Lyndon, Fr, Sci.....Seattle
 Hathway Ina Jane.....Webster City, Iowa
 Hatton, Ruth Genevieve, UD, LA.....Seattle
 Haugen, Ella, Unc, Ed.....
 Haugum, Evelyn Amy, LD, Ed.....Seattle
 Havelly, Mary E, Sci.....Portland, Ore
 Hawley, Edith G, LD, FA.....Seattle
 Haworth, Elizabeth, LD, Sci.....Denver, Colo
 Hay, Nell, Spec, FA.....Berlin, Pa
 Haynes, Stephen Bernard, LD, LA.....Seattle
 Hayward, Harold Soph, For Ridgewood, N J
 Heath, Harry French, Grad.....Dryad
 Hefferman, Grace E, UD, LA.....Seattle
 Hellbaum, Walter F, Unc.....Spokane
 Helmich, Merle L, UD, Sci.....Yakima
 Henderson, Evelyn G, BA.....Seattle
 Hendricks, Helen, Grad.....Lizton
 Hendricks, John Joseph, LD, Sci.....Seattle
 Henthorne, Oril E, UD, LA.....Portland, Ore
 Herbers, Willis Neeld, LD, BA.....Tacoma
 Hernandez, Mallari A, Macabebe, Pamp, P I
 Heywood, Carrie, Grad.....Kittitas
 Hibbard, Myra, UD, LA.....Seattle
 Hickey, Florence M, Unc, Law.....Seattle
 Hickok, Beulah G.....Bloomington, Wis
 Hicks, Ethel M, FA.....Portland, Ore
 Hight, William, Spec, FA.....Seattle
 Hill, Cyril Dean, UD, LA.....Seattle
 Hill, Glen G, UD, Ed.....Roche Harbor
 Hill, Leila D, LD, Ed.....Augustus, Geo
 Hill, Mildred S, LA.....Olympia
 Hill, Sidney B, Unc, LA.....Friday Harbor
 Hillis, Mary O, LA.....Bellingham
 Hillman, Robert K, LD, LA.....Seattle
 Hilton, Maud Helen, FA.....Seattle
 Himes, Ella, Unc.....Spokane
 Himmelsbach, Dora M, UD, Ed.....Yakima
 Hinshaw, Grace Linton.....Ashland, Mo
 Hintze, Mrs. Gertrude, FA.....Seattle
 Hitchings, Esther L, LD, LA.....Seattle
 Hoag, Katharine.....
 Hoard, Charles Vere, Law.....Seattle
 Hobi, Edwin Anthony, LD, BA.....Aberdeen
 Hodge, Willard W, Grad.....Corvallis, Ore
 Hodges, James F, LD, BA.....Seattle
 Hodges, Jo Evelyn.....Seattle
 Hoffer, J, C, LD, Fish Chippewa Falls, Wis
 Hogue, Helen, LD, FA.....Seattle
 Holbrook, William Paul, UD, Sci.....Seattle
 Holden, James Hector, UD, Ed.....
 Holen, Olaf, Grad.....Tacoma
 Holland, Ruth, UD, LA.....Seattle
 Holland, Selma, FA.....Roslyn
 Hollander, T, H, 3rd Law.....Edgmont, N C
 Holt, Lucy M, UD, Sci.....Seattle
 Holtine, Linda Adeline, Unc, Ed.....
 Hone, Marie C, UD, LA.....Tonasket
 Hope, Erma Dorothy, Grad.....
 Hopkinson, Mrs. Marie, Spec, BA.....Seattle
 Hoppe, Carolyn.....Pomeroy
 Hoppock, Gertrude C, Grad.....Seattle
 Hornstra, Fred Harry, Fr, EE.....Auburn
 Hoskins, Naomi M, UD, Ed.....Redmond
 Hoyer, Ernest John, Unc, Law.....Seattle
 Hovey, Joseph C, 2nd Law.....Ellensburg
 Howard, Mrs. Susie.....Tacoma
 Howe, Ellen Ford, Grad.....Seattle
 Howe, Eva, UD, BA.....Mansfield, Ill
 Howell, Irma Elizabeth, LD, LA.....Renton

Hubbard, C, Anderson, UD, Ed Portland, Ore
 Hubbard, Etta H.....Sacramento, Calif
 Hudson, M, Ethel, FA.....
 Huelsdonk, Elizabeth, UD, Sci.....Spruce
 Hughes, Honoria Leona, LD, Ed Butte, Mont
 Hughson, Ella P.....Cedarhurst
 Hulet, John Henry, Spec, LA.....Nespeles
 Hunt, Hector, UD, BA.....Seattle
 Huntley, Mary, Law.....Centralia
 Hurlbut, B, UD, Ed Thompson Falls, Mont
 Hurlbut, Jeannette F, Unc, Ed.....Seattle
 Hurley, Catharine R.....Bellingham
 Hurley, Ernest E, Grad.....Imbler, Ore
 Hurwitz, Albert E, Sci.....
 Hutchinson, Orrel E, Grad.....Seattle
 Hutchinson, Pansy E, Grad.....Mt. Vernon
 Hutchinson, Pearl I, Grad.....Seattle
 Hyatt, Gertrude Beatrice.....Porterville
 Hyde, Clarence F, Spec, Sci.....Seattle
 Hyde, Marguerite R, UD, Ed Kalispell, Mont
 Hyms, Mrs. A, Spec, FA San Francisco Cal
 Hyndman, William Lee, Spec, Law.....

Imes, Henry T, Grad.....Tacoma
 Inkmlre, Jessie E, Sci.....Longmont, Colo
 Inouye, Chohel, LD, LA.....Seattle
 Inouye, Katsumo, Spec, BA.....Tatsue, Japan
 Irwin, John Ivan, LD, BA.....Seattle
 Israel, Alice, Spec.....Helena, Mont
 Israel, Selma, Spec.....Helena, Mont

Jackson, Calla La Rose, Unc, LA.....Withrow
 Jackson, Mildred Helen.....Seattle
 Jacobs, Jerome Burnard, LD, Sci.....Seattle
 Jacobsen, Louis August.....Everett
 James, Williams Kelly.....Bellingham
 Jameson, J, Mabel.....Centralia
 Jasperson, Aknes Grace, UD, Sci.....Seattle
 Jenks, Helen.....Toppensish
 Jensen, Arne Sigurd, Grad.....Moxee
 Jensen, Mariam G, LD, Sci.....Everett
 Jensen, Paul John, Spec, Journ.....Seattle
 Johnson, Arnold Valdemar.....Seattle
 Johnson, Clifford E, LD, EE.....Tacoma
 Johnson, Elizabeth.....Olympia
 Johnson, E, A, Unc, LA Evansville, Minn
 Johnson, Florence E, LD, LA Bellingham
 John, Leta E, UD, LA.....Corvallis, Ore
 Johnson, Lillian V, Grad.....Seattle
 Johnson, Ralph C, Unc, Ed.....Bend, Ore
 Johnson, Ursula E, UD, LA.....Seattle
 Johnson, V, M, Unc, FA Coeur d'Alene, Ida
 Johnson, Wesley K, LD, ME.....Bellingham
 Johnson, Wm, E, UD, BA.....Selah
 Johnston, Hazel B, UD, BA.....Seattle
 Johnston, Kathryn, LD, Ed.....Helena, Mont
 Johnston, Marjorie Dean, UD, FA.....Seattle
 Johnston, Theresa M, UD, LA.....Seattle
 Jones, Mrs. Alice W, LA.....Portland, Ore
 Jones, Almon Clyde, Unc, Sci.....Bremerton
 Jones, Clare T, UD, Sci.....Seattle
 Jones, David John.....Columbus, Mont
 Jones, Dorothy M, Unc, Ed.....Carbonado
 Jones, Effie D, UD, Sci.....Yakima
 Jones, Ethel, Grad.....Julietta
 Jones, Flora S.....Blackfoot, Ida
 Jones, Margaret Slater.....Bellingham
 Jones, Marjorie UD, LA.....Seattle
 Jones, Mary, Bus.....Vancouver B C
 Jones, Nancy Emerson, Grad.....Seattle
 Jones, Zechariah.....Seattle
 Jones, Zenith W, UD, LA.....
 Jorgenson, H, George, LD, LA.....
 Jory, Harold Budd, LA.....Joseph, Ore
 Joseph, Maude, Grad.....Boise, Ida
 Joya, Esteban Spec Bauan, Bantagas, P I
 Judd, Elsie Gillis, UD, LA.....Seattle

Kadolke, Y, Spec, Ed.....Japan
 Kaln, Elsie M, Grad.....Stevensville, Mont
 Kalbus, Helen, UD, BA.....Chehalis
 Kamere, Thela Marcy.....Seattle
 Kangley, Lucy, UD, LA.....Seattle
 Karas, Mrs, Beulah Bouck, Grad.....
 Karrer, Roselle, UD, Sci.....
 Kassebaum, Emma, BA.....Seattle
 Kawamoto, Hiroh, BA.....Kobe, Japan
 Kaye, Mary Gertrude, Grad.....Spokane
 Keep, Margaret, FA.....Washougal
 Keith, Mrs. Lillian A.....Vancouver, B C
 Kelley, Curtis, LD, Ed.....Centerville
 Kelley, Francis Joseph, Jr, ChE.....Seattle
 Kelley, Jane Isabel, UL, Ed.....Walla Walla
 Kellog, George Albert, LD, Ed.....Seattle
 Kellogg, Mrs. Pauline H, LD, Ed.....Seattle
 Kelly, Raphael Lester, UD, BA.....Tacoma
 Kemp, James Ward, LD, EB.....Hazelwood
 Kendrick, Raymond Henderson, Grad Seattle
 Kennedy, Stella Marguerite, UD, LA Tacoma
 Kennedy, Mary H, LD, LA.....Kirkland
 Kennedy, Joel M, LD, CE.....Portland, Ore
 Kenyon, George Dewey, LD, BA.....Seattle
 Kepp, Karl Henry, Soph, CE.....Seattle
 Kerr, Olive M, Grad.....Portland, Ore
 Kershaw, William Earnest, UD, LA Yakima
 Ketchum, William R, LD, BA Savannah, Ga
 Klehl, Miriam, Unc, Bus.....Seattle
 Klemle, Katherine, UD, LA.....Portland, Ore
 Kilpatrick, Genevieve, Grad.....Seattle
 Kimple, Emily Belle, UD, Sci.....Seattle
 Kincaid, Frederick M, 1st Law.....Seattle
 King, Grace Elizabeth, Grad.....Seattle
 Kindachy, Ena Pauline, Unc, Ed.....
 Kinsley, Tula Franch, Grad Condon, Ore
 Klipp, Letha Julia, Unc, Ed.....Seattle
 Kittredge, Marguerite B, Grad.....Seattle
 Kizer, Dorothy, Grad.....
 Klæboe, Regna M.....Seattle
 Klobucher, Emma.....Opportunity
 Knapp, Alta R.....Seattle
 Knapp, Dora.....
 Knapp, Eugene Henry, LD, BA.....Davenport
 Knapp, Frances, UD, LA.....Lynden
 Knight, Nellie K.....Bellevue
 Knight, Nell Roy.....Endicott
 Knudsen, Elmer Magnus, UD, Bus.....Seattle
 Kobler, Anna Helen, LD, Ed.....Seattle
 Kohler, Kenneth, LD, BA.....Seattle
 Kongale, Edward, UD, BA.....Port Angeles
 Kramer, Karl W, LD, ME.....Seattle
 Kraus, Minnie L, Grad.....Seattle
 Kreamer, Lena, UD, Ed.....Seattle
 Krogstad, Elva, UD, LA.....Seattle
 Krohn, Violet, Grad.....Seattle
 Kuhn, Jessie, LD, Ed.....Seattle
 Kwok, Ping C, UD, BA Hong Kong, China
 Kwok, Tak Wa, Unc, LA.....Canton, China
 Kyd, Markaret S, UD, LA.....Seattle

Latham, Myrle Mary.....Seattle
 Lauenstein, Minnie V.....Longmont, Colo
 Laughlin, Mabel, Unc, LA.....Seattle
 Laughlin, Raymond, UD, BA.....Ellensburg
 Lauder, Anne May.....Tulsa, Okla
 Lautz, Fritz A, Soph, For.....Buffalo, N Y
 La Violette, Doris, LD, LA.....Bremerton
 Lawson, Annie S, LD, Ed.....Seattle
 Lawson, Jesse B.....Creston, Ia
 Lawson, Norman, Grad.....Hartline
 Laymance, Alma Bess.....Waterville
 Leaf, Alice, UD, Ed.....Seattle
 Leahy, Josephine, FA.....Ironwood, Mich
 Lear, Lillian G, Spec, Ed.....Darby, Mont
 Leavitt, Marion C, UD, LA.....Seattle
 Lee, Artrudoe L, Unc, LA.....Seattle
 Lee, Frank A, LD, Sci.....Seattle
 Lee, Pearl, Unc, LA.....Helen, Mont
 Leechman John Douglas, UD, Lib.....
 Legg, Emily, UD, LA.....Seattle
 Lemon, John Francis, UD, Ed.....Meridian
 Lenehan, Ellen M, Spec, Bus.....Seattle
 Lenfesty, Susie, LA.....Hoquiam
 Lenington, Marcia M, Unc, Ed.....
 Lentz, Katherine J, Grad.....Marietta
 Lettrick, Lesli Grace, Spec, Sci.....Mullan, Ida
 Lichty, Ralph J, Unc, Law.....Spokane
 Lighthouse, Margaret LD, Ed Friday Harbor
 Lilly, Stella A, UD, LA.....Tacoma
 Lin, Fu, UD, Sci.....Wukang, China
 Lind, Fred Alnard 3rd Law.....Seattle
 Lindaas, Anna, Grad.....Tacoma
 Lindberg, Wilmer Hilding, UD, LA Tacoma
 Lindberg, Ruby C, LD, LA.....Seattle
 Lindsay, Margery, UD, LA.....Seattle
 Lindsay, Francis S, Grad.....Seattle
 Linklater, Florian, Grad.....
 Little, Edward M, Grad.....Seattle
 Little, Jane M, Unc, Ed.....McCleary
 Livengood, Charles A, Spec, Bus.....Dayton
 Locker, Mariam Rose.....Walla Walla
 Lockwood, Edna M, D.....Seattle
 Lockwood, Maude S, LD, FA.....Seattle
 Lockwood, Verne, Grad.....Yakima
 Loftfield Gabriel, Grad.....College Place
 Long, Alta Marie, Unc, Ed.....Newport
 Long, Sylvester John, LD, LA.....Seattle
 Loucks, Ethel May, Grad.....Portland, Ore
 Louden, Russell, LD, Bus.....Centralia
 Loughlen, Paul E, LD, Sci.....Puyallup
 Lowman, J, Guy, Spec, LA.....Seattle
 Lucas, Martha, LD, LA.....Seattle
 Ludwig, Flora Emma, Grad.....Walla Walla
 Lurie, David, Unc, EE.....Seattle
 Lustie, William, Grad.....Seattle
 Lynch, Angelina, LD, Ed.....Butte, Mont
 Lynch, Anna M, UD, Ed.....Silver Bow, Mont
 Lynch, Isabelle Reis, LD, Sci.....Yakima
 Lyon, Laura A, FA.....Seattle
 Lyon, Margaret A, FA.....Bay City, Mich
 Lytle, Mary, Grad.....Tacoma

La Bossler, Inez J, UD, Sci.....Kent
 Laidig, Lillia W, Unc, LA Tillamook, Ore
 Lamb, Elvie Dora, Bus.....Vancouver, B C
 Lammers, Frieda, Unc, LA.....Port Townsend
 Lamont, Ralph H, Bus.....Idaho Falls, Ida
 Lane, Bertha Irene F, Grad.....Seattle
 Lane, Robert F, LD, Sci.....Seattle
 Langbehn, Amanda M, Unc, Ed.....Tekoa
 Langbehn, Elsie C, Unc, Ed.....Tekoa
 Lange, Millie E, UD, Ed Sauk Center, Minn
 Lankenau, Walter H, Spec, For.....
 Largent, Alta, UD, Ed.....Kablotus
 Larkin, Mae E, Grad.....Seattle
 Larsen, Laura, UD, Ed.....Seattle
 Larsen, Lillian S, Unc, BA.....Port Townsend
 Larsin, Josephine C, UD, Ed.....
 Larson, Madeline, Unc, Ed.....Tacoma
 Lass, Edna, Unc, LA.....Seattle

McAllister, Josephine, UD, LA Morrison, Ill
 McAssey, Ethel.....Seattle
 McCarney, Margaret, Grad.....Seattle
 MacClain, Albert Lewis, Grad.....
 McClung, Ryland E, 1st Law.....Portland, Ore
 McClure, Letha L, FA.....Seattle
 McClure, Worth, Grad.....
 McColloch, E, Z, LD, LA.....Seattle
 McCord, William B, 2nd Law.....Seattle
 McCormick, Flora.....
 McCormick, Cora, Unc, Ed.....Billings, Mont
 McCoy, Edward M, UD, LA.....
 McCoy, Ella B, Grad.....Carbanodo
 McCoy, Newton C, Unc, Law.....Castle Rock
 McCracken, Mrs Joan Spec, FA Portland Ore
 McCredy, Harold F, UD, LA.....Seattle
 McDaniel, Mrs. Elizabeth A.....

McDonald, Alice Louise, UD, Sci., Seattle
 McDonald, Mary K, LD, Bus., Pocatello, Ida
 McDonnell, Mary A, LD, Ed., Tacoma
 McElford, Jessie, Sedro Woolley
 McElroy, Katharine M, Unc, LA Bolse, Ida
 McEuen, Marshall L, UD, BA., Seattle
 Macfarlane, Robert Stetson, 2nd Law, ..
 McGannon, Gertrude, Seattle
 McGiel, Vivian J, UD, LA., Seattle
 McGirr, Horace Donald, v, BA., Bolse, Ida
 McGrade, Minnie M., Anaconda, Mont
 McGrady, Anna L, UD, LA., Anaconda, Mont
 McGrath, Margaret, Spec, Ed., Spokane
 MacGregor, Euphemia S, LA., Spokane
 McGriff, Many B, Unc, Ed., Olympia
 McHugh, Ruth, UD, BA., Seattle
 McInnis, Merville W, LD, BA., Spokane
 McIntosh, Elizabeth, Spec, Ed., Seattle
 McIntyre, Harry John, Grad., ..
 Mac Iver, Doris, Spec, LA., Naches
 McKay, Mary Hannah, Grad., Seattle
 McKee, Edna L, Spec, FA., Everett
 McKee, George M, Grad., Seattle
 McKinney, Nellie, Yakima
 McKinnon, Annie M, Unc LA Vancouver, B C
 McKnight, John T, LD, Sci., Cle Elum
 McLaughlin, Inez V, Unc, LA Port Angeles
 McLaughlin, Victoria, Spec, FA., ..
 McLeran, Grace K, Sci., Seattle
 McManus, Edith M, Spec FA Vancouver, B C
 McMeen, Lola I, UD, LA., So. Bellingham
 McMillan, Anna, Grad., Sandpoint, Ida
 McMillan, Jane C, Spec LA., Tacoma
 McMoran, Jean P, UD, FA., Seattle
 McMurphy, Samuel T., Tacoma
 McMurphy, Susannah I, Grad., ..
 McNair, Letitia, Sci., Victoria, B C
 Mac Naughton, Ellen, Bus., Waukesha, Wis
 McNeill, Beatrice, Grad., Seattle
 McPhee, Aletha Sophia, Seattle
 McWilliams, Alice B, Grad., Seattle
 Mack, Enid A, Unc, LA., Seattle
 Magill, Margaret, Grad., Tacoma
 Mahl, Alvina M, Unc, FA., Seattle
 Mahony, Ethel C, UD, Sci., Bremerton
 Mallery, Joseph A, LD, Ed., Castle Rock
 Mallery, McClane M, LD, Ed., Castle Rock
 Mallay, Kathlee J., Seattle
 Malmo, Clarence O, Grad., Seattle
 Maltby, Addie E, LD, Ed., Cut Bank, Mont
 Manson, Gladys, Grad., Seattle
 Mapes, Carl Herbert, UD, LA., ..
 Marino, Frank, Fish., Seattle
 Markey, Lynn, Sci., Easton
 Markham, Blanche Elaine, LD, LA., ..
 Markson, A, Unc, LA., Owatonna, Minn
 Marlowe, Myrtle D, UD LA Kansas City, Mo
 Marquette, Elizabeth, UD, LA., ..
 Marston, Cassandra May, Seattle
 Martin, Earl B, UD, LA., ..
 Martin, Eva Ednah, Spec, Ed., Seattle
 Martin, Mary Geneva, UD, LA., Mabton
 Martin, Lenore, UD, LA., Mabton
 Martin, Marjorie A, Grad., Mullan, Ida
 Martinson, Ida E, Grad., Vancouver
 Mason, Ruth, UD, LA., Seattle
 Mathews, Ahasah Olive, FA Lake City, Minn
 Mathews, Adda, Sci., Genesee, Ida
 Mathews, Leo Ambrose, Spec, LA., Seattle
 Mathieu, Mae, Grad., Seattle
 Matthews, James T, CE., Salem, Ore
 Matson, Joseph, 3rd Law., Seattle
 Mattson, John Iva, Unc, Ed., Hoquiam
 Maxwell, Gertrude, Grad., Walla Walla
 Maxwell, May Minnie, Unc, Ed., Yakima
 Meade, Emilie Hulse, Grad., Seattle
 Meade, May., Mt. Hope
 Meehan, Gertrude, Spec., Spokane
 Meehan, Grace M, Unc., Spokane
 Meehan, Lyle J, M, UD, BA., Spokane

Meinecke, Bertha E, LD, Ed Rupert, Ida
 Melby, Esther Muriel, LD, LA., Seattle
 Meldrum, Helen S, Grad., Spokane
 Melkild, Mildred E, Grad., Conway
 Mellor, Martha E, Unc, Ed., Helena, Mont
 Mendham, Jeanne B, Grad., Spokane
 Mendham, Mayme., Spokane
 Meneely, Alexander H, UD, LA., Seattle
 Merrill, Grant W., Seattle
 Merrill, Honor, LD, LA., Seattle
 Merry, Hazel Marie, Unc, LA., Spokane
 Mervin, Katherine M, Grad., ..
 Mesher, Edis Eophie, Grad., Seattle
 Meyer, Ambrose J, LD, Sci., Colfax
 Meyer, Edward Albert, LD, LA., Edmonds
 Meyer, Flora, LD, Ed., San Leandro, Calif
 Meyer, John D, Grad., Harrington
 Michea, Marie A, Grad., Seattle
 Middleton, Keith, LD, BA., ..
 Mifflin, Wesley J, 1st Law., Seattle
 Miles, Cornelia S, Grad., Denver, Colo
 Miller, Belle, Spec, Ed., Spokane
 Miller, Mrs. Elsie, UD, LA., Seattle
 Miller, Elvena, UD, LA., Bellingham
 Miller, Elverta Leone, Grad., Seattle
 Miller, Ernest L, LD, B., Seattle
 Miller, Esther Jean, UD, LA Minnville, Ore
 Miller, Ray C, 1st Law., Seattle
 Miller, Ruth, UD, Sci., Tonganoxie
 Miller, Sylvia A, 3rd Law., Tobias, Neb
 Miller, Genevieve, LD, FA., Seattle
 Millican, Mrs. C, W, Spec, FA., Seattle
 Millon, Mary Ethlyn, LA., Seattle
 Millison, Nena Marie, Unc, LA., Seattle
 Minihan, Campbell C, LD, Sci., ..
 Minnick, Katherine, Jr, Phar Maple Falls
 Mitchell, Lena Lillian, Corwith, Iowa
 Mitchell, Ruby, Grad., Seattle
 Moen, Mayme M, Sci., ..
 Moffett, Edith Pauline, Grad., Woodinville
 Mohr, Esther, UD, LA., Seattle
 Monk, Edith May, Unc, Ed., Waterman
 Monk, Genevieve B, Unc, LA., Seattle
 Monteagie, Gwendolyn, UD, LA., Seattle
 Monteaige, Vera Marie, LD, Ed., Seattle
 Moody, Miriam I, Grad Honolulu, Hawaii
 Moore, Clarence F, Spec, BA., Seattle
 Moore, Helene, Grad., Seattle
 Moore, Joseph R., Othello
 Moore, Lillie B, Spec, LA., Seattle
 Moore, Mary C, UD, FA., Portland, Ore
 Moran, Charles Gilbert, LD, LA., Seattle
 Moran M, Juliette, Unc, Ed., Algona
 More, David T, LD, Ed., Tacoma
 More, Luther, LD, Ed., Tacoma
 Morey, Hazel Harbey, Walla Walla
 Morford, Helen I, UD, Ed., Seattle
 Morgan, Alfred., Davenport
 Morgan, Coral, LD, LA., Coeur d'Alene, Ida
 Morgan, Jessie M., Helena, Mont
 Morris, Morril J, Unc, Sci., Seattle
 Morris, Mrs. N. Unc, LA., Kamela, Ore
 Morrison, Alice, Grad., Corvallis, Ore
 Morrison, Mary E, Sci., Victoria, B C
 Morton, Lillia L, Grad., Seattle
 Moss, J, Ethel, UD, Sci., Donnelly, Ida
 Moss, Roy Ormond, Grad., ..
 Mossford, Frances M, Grad., Monroe
 Mossford, Margaret A, LD, LA., Monroe
 Moulton, Lena V, UD, BA., Walla Walla
 Mount, James M, UD, Ed., Ancortes
 Mulhern, Monica Patricia, UD, LA., Seattle
 Mulholland, Nellie C, LA., Butte, Mont
 Mukey, Lowene, LD, LA., Seattle
 Mullane, Winifred., Seattle
 Mumby, Anne, Unc, Sci., Olympia
 Mumby, Mildred, Unc, Sci., Olympia
 Mumford, Ora M, Unc, LA., Caldwell, Ida
 Munro, Anna Marie., Seattle
 Murphy, Asael B, Unc, LA., Salina, Utah

Murphy, Mary S, Unc, Ed.....Seattle
 Murray, Rose, Unc, LA..Twin Falls, Ida
 Myers, Donald, LD, BA.....Seattle
 Myers, Margaret Esther, UD, Sci.....Sumas
 Mykland, Albert A, Grad.....Everett

Nadeau, Eleanor, LD, FA.....Seattle
 Nafe, Muriel B, LD, LA.....Seattle
 Nagel, Julius, Unc, Sci.....Oak Harbor
 Nagley, Louise, Unc, Ed.....Eatonville
 Nathan, Kenneth Robert, LD, EE.....
 Naugle, Fern Elizabeth, UD, Ed.....Seattle
 Neal, Marguerite, Grad.....Seattle
 Nedry, Anna, LA.....
 Neely, Charles Bertie, UD, LA.....Seattle
 Neighbor, Emily, Grad.....Seattle
 Nelkirk, Nettie P, Unc, Ed.....Opportunity
 Neilson, Irene M, UD, FA.....Kallispell
 Nelson, Florence, Unc, Ed.....Kent
 Nelson, George E, Sr, Mines Juneau, Alaska
 Nelson, Laura Elsa, LD, LA.....Seattle
 Nelson, Leone Marie, LD, BA.....Seattle
 Nelson, Valley Lilly, UD, Sci.....Tacoma
 Ness, Arthur B, Grad.....Tacoma
 Nettleton, Alice M, UD, LA.....Tacoma
 Nettleton, Marie.....Kirkland
 Nichols, Walter R, Grad.....Snoqualmie
 Nicholson, Leo S, LD, LA..Keppner, Ore
 Nitschke, Paul H, Unc, Sci.The Dalles, Ore
 Nix, Martha J, UD, LA.....Dresden, Tenn
 Noble, Elizabeth B.....Aberdeen
 Noble, Mary, Spec Sci Hamilton, New Zealand
 Nolan, Michael J, Unc, CE.....Centralia
 Nord, Swan E, UD, BA.....
 Nordberg, Erika I, Grad.....Marysville
 Nordlie, Leonard T.....Deerfield, Wis
 Norman, Evelyn Minglis.....
 Norton, Mamie Belle, Unc, Sci.....Seattle
 Nottingham, W, K, Unc, BA..Portland, Ore

Oakes, Ruth Elsie, LD, Sci.....
 Oates, Eulalie UD, LA.....Portland, Ore
 Oerholser, Ethel, Unc, Sci Mansfield, Mo
 Oertel, Daniel Theodore, Unc, Law..Blaine
 Oertel, Ernest Edward, UD, LA.....Seattle
 O'Farrell, Kathleen, LD, BA.....Seattle
 Ofstie, Edda Valborg, Grad.....Everett
 Ogden, Clara Mae.....College Place
 Olding, Katherine Spec FA Vancouver, B C
 Oleson, Mildred Elizabeth.....Seattle
 Oliver, Esther, Spec, BA..Douglas, Alaska
 Oleson, Mildred B, Unc, LA.....
 Olmsted, Marion C, UD, Ed.....Grandview
 Olsen, Edwin, Spec, EE.....
 Olson, Lillian B, UD, Sci.....Mt. Vernon
 O'Neill, Agnes Virginia, LD, Ed.....Spokane
 Onsum, Elizabeth, LD, FA.....Seattle
 Orosa, Jose, LD, BA Bantagas, Bavang, P I
 Orrill, Jessie, UD, Ed.....Seattle
 Osgood, Elizabeth P.....Helena, Mont
 Osgood, Ernest Staples, Grad..Helena, Mont
 Overguard, Julia O, Spec, Sci.Salem, Ore
 Overman, Marion Gray, Grad.....Spokane
 Overton, Hubert E, LD, BA.....Olympia
 Owen, Elizabeth H, P.....Atmakur, India
 Owsley, Joseph H, Soph, EE.....Seattle
 Oxley, Gertrude Grad New Westminster, B C

Palo, Rosa Winifred.....Tacoma
 Pape, Pearl L.....Toppenish
 Papetz, Mary Alice, Unc, Bus.....
 Parish, Herbert I, Unc, Bus.....Centralia
 Parker Catherine A, Grad.....Seattle
 Parker, Marie, LD, Ed.....Seattle
 Parkins, Wright A, Fr, ME.....Seattle
 Parsons, E, T, Grad.....Seattle
 Partridge, Ruth H, UD, Sci.....Seattle

Patten, Ethel Mae, UD, LA.....Seattle
 Patterson, Bernice Lillian, LD, LA Fuyallup
 Patterson, Isabel, Spes, FA.....Appleton
 Patterson, Jean, FA.....Vancouver, B C
 Patterson, Sara K, Spec, FA Sandpoint, Ida
 Patton, Robt. T, Unc, BA.....Spokane
 Patzold, Oswald Edward, LD, Ed..Seattle
 Paulik, Andrew, Soph, EE.....Carbonado
 Payne, Mrs. Almee, Unc, Jour.....
 Pearson, Earl C, H, Unc, LA..Mt Vernon
 Pearson, Mabel E, D, Spec.....Seattle
 Pease, Katharine M, UD, FA.....Langly
 Peden, Barton Edward, LD, Sci.....Yakima
 Penas, N, Spec, For San Jose, Camarines, P I
 Pennell, Dorothy Winnifred, LD, LA Seattle
 Perkins, Georgia G, Grad.....
 Perkins, Gwendolyn Goff, Grad.....Seattle
 Perkins, Jennie Belle, LD, LA.....Hillsdale
 Perkins, M, F, Soph, ChE Ft Steilacoom
 Perkins, Russell, LD, Bus.....Seattle
 Perlin, Solomon A, Soph, CE.....Seattle
 Perry, Ethel.....Puyallup
 Peterson, Anita M, UD, Ed.....Tacoma
 Peterson, Esther Jenny.....Mariette
 Peterson, Ida G, Unc, Ed.....Tacoma
 Peterson, Inez Helena.....Seattle
 Peterson, Lot C, Unc, Ed.....
 Peterson, Tillman, Grad.....Tacoma
 Peth, Hazel, Unc, LA.....
 Petri, Mrs, Lillian J, FA..Portland, Ore
 Pettyjohn, Jessie Mabel, LD, LA.....Prescott
 Phelps, Frances Browell, LA.....Seattle
 Phelps, Grace Marie, UD, Sci.....Dryad
 Phelps, Howard Rodney, Soph, EE..Tacoma
 Phelps, Vera May, Grad.....Dryad
 Philbrook, Madge, Grad.....Seattle
 Phillips, Jack W, Fr, Phar.....Hadlock
 Pickel, Dorothy, FA.....Bellingham
 Pinkham, Mildred May, LD, LA.....Buckeye
 Pitt, Mildred Esther, Grad.....Manette
 Pitzer, Carl A, LD, FA.....Tacoma
 Platner, Evelyn Idessa, Grad.....Seattle
 Platt, Imogene Bash, Grad.....Seattle
 Pollock, Dorothea, UD, LA.....Spokane
 Pool, William Franklin, Unc, LA.....Seattle
 Poole, Jessie Lee, Grad.....
 Poolton, Frederick Arthur, LD, LA..Lind
 Pope, Ezra Tobey, Jr, ME.....Seattle
 Porter, Clara M, C, UD.....Seattle
 Porter, Dott, LD, Sci.....Remington, Ind
 Post, Harry G, Grad.....Seattle
 Potter, Roy Morley, Unc, BA.....Seattle
 Pottnner, Ottilie, Grad.....Portland, Ore
 Powell, May Leone, LA.....Spokane
 Powers, Anna M, Spec.....Lewiston, Mont
 Powers, Francis Joseph, LD, BA.....Seattle
 Preston, Morris Earl.....Seattle
 Pringle, Mrs. Emma, BA.....Port Townsend
 Pritchard, Ernest H.....Bryn Mawr
 Pryde, Joel Joseph, Grad.....Hoquiam
 Pugh, Anne Clough, LD, Ed.....Seattle
 Purington, Helen, Grad.....Burns, Ore

Quast, Florence A, Grad.....Marysville
 Quirk, Nellie Jane, Sci.....Seattle

Rahr, Louis F, Grad.....Kenosha, Wis
 Raitt, John A, Grad.....Seattle
 Ramaley, Harry Kenneth.....Grandview
 Ramaley, Mrs. H. Kenneth, Sci..Grandview
 Ramos, Rufine, Jr, CE Cagayan, Misamis, P I
 Ramsdell, Ruby C, Grad.....
 Rand, Ethel, FA.....Portland, Ore
 Range, Ruth Marion, LA.....Butte, Mont
 Rapp, Elizabeth, LA.....Spokane, Wash
 Rasmussen, George V, LD, Ed.....Seattle
 Rath, Martha Amelia, Sci..Vancouver, B C
 Ratigan, Thos, Grad.....Seattle

Rawlinson, Laura Jones.....Portland, Ore
 Raymond, Anita Caldwell.....Berkeley, Calif
 Rayner, Marguerite F, LD, LA.....Pueblo, Colo
 Reager, William P, Grad.....Tacoma
 Reardon, Gertrude UD, Sci Anaconda, Mont
 Redford, Walter, LD, Ed.....Steptoe
 Redington, Bernice O, FA.....Seattle
 Redpath, Harry S, UD, LA Helena, Mont
 Redway, Elizabeth Alice, Grad.....Tacoma
 Reed, Clyde L, LD, Ed.....
 Reedy, Frances M, UD, Sci.....
 Rees, William Daniel, Sci.....Spokane
 Reeves, Marie Adele, Grad.....South Bend
 Reeves, Joseph Austin, Grad.....Sultan
 Reeves, Mary Katherine, UD, Sci.....Seattle
 Rehder, Annabelle, Grad.....Missoula, Mont
 Reid, Mona Adele, LD, Ed.....Newport
 Relferson, Christie, LA.....Troy, Ida
 Remington, Arthur E, Soph, ME.....Mott, N D
 Rennie, Weslie F, Grad.....Seattle
 Reynolds, Dore.....Loon Lake
 Reynolds, Jack W, 3rd Law.....Seattle
 Rich, Estelle May, UD, LA.....
 Richards, Marie Fern, Unc, LA.....Seattle
 Richardson, Dio, Grad.....Seattle
 Richardson, Mary Elizabeth, Unc, FA Seattle
 Richardson, Nona B, LA.....Bend, Ore
 Richeson, Sanford Elmer, Spec, BA.....Seattle
 Richmond, Mrs. Agnes N, Unc, Law Renton
 Riggs, Metta Wilson, Unc, FA.....Seattle
 Rind, Rudia, Grad.....Seattle
 Ringner, Helen Dorothy, LD, LA.....Seattle
 Riste, Victor E, LD, Sci.....Chopaka
 Ritter, John Jos, Spec, Sci.....Seattle
 Roaney, Malland B, Unc, Ed.....Bellingham
 Robb, Opal, UD, BA.....Seattle
 Robbins, David, Unc, Sci.....Portland
 Robe, Vivian Moore, UD, FA.....Granite Falls
 Roberts, Jocelyn M, FA.....Walla Walla
 Roberts, Margaret, Unc, Ed.....Tacoma
 Roberts, Nell J, Sci.....Lewiston, Ida
 Roberts, Sara A, UD, LA.....Seattle
 Robertson, Berdena, LD, Sci.....Seattle
 Robertson, Katharine C, Grad.....Seattle
 Robertson, Eleanor Muriel, UD, LA.....Seattle
 Robins, Anna Loretta, Spec Burlington, Ia
 Robinson, Beatrice, Unc, Ed.....Everett
 Robinson, Blanche M, Sci.....
 Robinson, Estelle E.....Seattle
 Robinson Lillian M, Grad.....Spokane
 Robinson, Luella V.....Nasau, Wis
 Rockwell, John Jr, UD, Ed.....Castle Rock
 Rode, Alfred, 1st Law.....Bellingham
 Rode, Irene Dortha, LD, FA.....Minot, N D
 Rodman, John F, Spec, Sci.....Nampa, Ida
 Rogers, Henry E.....Centralia
 Roper, Marion Wesley, UD, Ed.....
 Rose, Guy, Spec, Ed.....Everett
 Rose, Flora Mae, Spec, FA.....Portland, Ore
 Roys, Ruby, UD, LA.....Seattle
 Rowlands, Thomas M, Spec, EE Victoria, B C
 Rowe, Adeline Lee, Unc, Bus.....
 Rowell, Fenton Charles, LD, Bus.....Spokane
 Rubican, Leslie H, UD, BA.....Tacoma
 Rupe, Gustene E, LD, Ed.....Seattle
 Ruppenthal, Anne B, Grad.....Kahlotus
 Russell, Catharine Ann, LA.....Seattle
 Russell, Mrs. Irene, LA.....
 Russell, John Beaucamp, Ed.....Puyallup
 Russell, Lewis W, Sr, CE.....Luther, Mont
 Ruzziki, Henry Romuald.....Seattle

Scamahorn, Essie None, LD, Ed.....Spokane
 Schirrman, Sara I, UD, Ed.....Mt. Vernon
 Schlanger, Manford, LD, Sci.....Seattle
 Schlauch, Gustav H, Grad.....Latah
 Schmid, Byron C, Soph, ChE.....Seattle
 Schmitt, Lizzie M.....Seattle
 Schoettler, Miriam C, UD, Ed.....Seattle
 Schofield, Mary G, Unc, LA.....Seattle
 Scholes, Marlon Ellen, FA.....Yakima
 Schroder, Blanche M, LD FA Pendleton, Ore
 Schuck, Katherine A, UD, Sci.....
 Schumaker, Margaret, Grad.....Bellingham
 Scott, Alice A, Sci.....Seattle
 Scott, Cora Hazel.....Twin Falls, Ida
 Scott, Elizabeth G, Grad The Dalles, Ore
 Scott, Jessie Waite, Unc, LA.....Seattle
 Scott, Lydia L, LD, LA.....Seattle
 Scougall, Laura, UD, Sci.....Seattle
 Scully, Kathryn I, FA.....Butte, Mont
 Sczuch, Evelyn Violet, FA.....Everett
 Sealls, Rachel Joyce, LD, LA.....Seattle
 Sears, Ruth Beth, LA.....Bellingham
 Seddon, Stanley, LD, LA.....Roslyn
 Seelye, Walter Bale, UD, Sci.....Seattle
 Selby, Harold Kellogg, LD, BA.....Seattle
 Senska, Nellie M, Grad.....Seattle
 Stiemler, Flossie, LA.....Spokane
 Shank, Chas, Howard, LD, Sci.....Seattle
 Shank, Katherine, UD, LA.....Seattle
 Shanks, Carol M, UD, BA.....Payette, Ida
 Sharp, Mary Corts, Spec, LA.....
 Shaw, Oscar.....Bellingham
 Sheehan, Mary Madeline, Grad.....
 Shelton, Sarah Louise, Unc, FA.....Seattle
 Shepard, Aileen O, Grad.....Winnlow
 Shepherd, Esther Maria, UD, LA.....
 Shern, Oscar Richard.....Coeur d'Alene Ida
 Sherrard, Alice G, Ed.....Seattle
 Sherrick, Johnson, Grad.....Seattle
 Shervem, Henry O, Unc, Ed.....Tacoma
 Shidler, Edwin, UD, LA.....Seattle
 Shidler, Will L, LD, LA.....Seattle
 Shigaya, Paul S, LD, Sci.....Kent
 Shindel, Maurice H, UD, LA.....Seattle
 Shipley, Ethelyn, Grad.....Seattle
 Shoemaker, Harry E, Fr, CE.....Spokane
 Short, Bessie L, Unc, BA.....Tracyton
 Shotter, Mrs. M, S, FA.....Bellevue
 Shull, Ranata M, Grad.....Springfield, O
 Shuttleworth, L, D, LD, BA Idaho Falls, Ida
 Sickels, Eleanor Maria, Grad.....Spokane
 Sickels, Katherine A, Unc, Ed.....Spokane
 Siders, Frances Ethel.....Seattle
 Siemens, Lydia Jane, UD, Ed.....Othello
 Siemens, May M, Sci.....Othello
 Siler, Lillie May, UD, Sci.....Seattle
 Silvermaster, Nathan Gregory, UD, LA.....
 Silvers, Edith, FA.....
 Sirjord, Mea F, Sci.....Fertile, Minn
 Skally, Nan Smith.....Everett
 Slater, Lela May, Spec, FA.....Portland, Ore
 Smith, Abigail Jean, Unc, Sci.....Topenish
 Smith, Mary Adelaide, UD, LA.....Seattle
 Smith, Albert Earl, UD, BA.....Seattle
 Smith, Edith R, UD, Ed.....Tacoma
 Smith, Eileen I, LD, FA.....Kallispell, Mont
 Smith, Eunice L.....Ashland, Ore
 Smith, George M, Jr, UD, LA.....Seattle
 Smith, Glenard D, Spec, BA.....Portland, Ore
 Smith, Helena A, LD, LA.....Pasco
 Smith, Mary I, Grad.....Lomkmont, Colo
 Smith, John A, UD, BA.....Seattle
 Smith, Julia B, Unc, LA.....Twin Falls, Ida
 Smith, Lillian E, LD, LA.....Spokane
 Smith, Lyle C, Spec.....Bellingham
 Smith, Madorah, Grad.....Cedar Rapids
 Smith, Mrs. Margaret Spec, Sci Boise, Ida
 Smith, Mary G, S.....Portland, Ore
 Smith, Minnie J, Grad.....Moscow, Ida
 Smith, Pearl, UD, BA.....Prosser

Sahlun, Rose E, Unc, FA.....Anacortes
 Salmons, Arlie, Grad.....Columbia, Mo
 Sandgren, Jennie, Unc, LA.....Seattle
 Santee, Joseph F, Spec, Ed.....Banks, Ore
 Sapp, Bernice A, Unc, LA.....Olympia
 Sartoris, Madelyne V, UD, Sci.....Enumclaw
 Shedico, Mrs. Ida J, S, FA.....Seattle

- Smith, Sherwood H, LD, BA.....Seattle
 Smith, Truman Wheeler, Grad.....Mineral
 Smith, Virgil, UD, Ed.....Boise, Ida
 Smitham, Sylvia Theresa, LA.....Rigby, Ida
 Snook, William Warren, LD, BA.....Ridgfield
 Snyder, Harold Alvin, Fr, CE.....Edmonds
 Sontag, Charles, UD, BA.....Seattle
 Sorenson, Agnes M, Grad Woodbine, Iowa
 Spaulding, Lucia C, LA.....Spokane
 Sparks, Percy Spencer, Grad.....
 Sparling, Robert, Spec.....Vancouver, B C
 Spaulding, Katherine Unc, Jour Superior Wis
 Spaulding, Mina Unc, Ed Great Falls, Mont
 Spaulding, Emille T, Unc, BA.....Yakima
 Speer, Ernest DeWitt, Grad.....Seattle
 Speer, Howard B, 1st Law.....Seattle
 Speer, Minerva L, UD, Ed.....Seattle
 Spencer, Cornelia J, Spec.....
 Spencer, Robinson, Grad.....Seattle
 Spencer, William A, Grad.....Seattle
 Spiller, Amy Lydia, FA.....Belt, Mont
 Springer, Maurice E, LD, BA.....Olympia
 Stacey, Mildred, Grad.....
 Stach, Anna, Grad.....Iowa City, Ia
 Stalhut, Verna, UD, LA.....Spokane
 Staley, Ethel Maud, Grad Battle Creek, Mich
 Stangland, Bessie Frances, LA.....
 Stanley, Ethel M, Grad.....Chula Vista, Calif
 Stanley, Jane, Grad.....Long Beach, Cal
 Starin, Joseph, LD, BA.....Seattle
 Starr, Alva Guy, Unc, LA.....
 Starr, Elizabeth A, UD, Sci.....Walla Walla
 Starr, Beatrice E, 1st Law.....Seattle
 Statter, Eleanor, LA.....Portland, Ore
 Stearns, Josephine, UD, Sci.....Ellensburg
 Steele, Chas, E.....Seattle
 Steele, Gladys J, Spec, Ed.....Renton
 Steelman, Charlotte, Grad.....
 Steelman, Marjory, Grad.....
 Steinbach, Helen UD, Ed New Rockford, N D
 Steineke, Pearl A, UD, Ed.....Seattle
 Sterling, Mrs. Adah S, Spec, Ed.....Seattle
 Stevens, Belle A, Grad.....Maltby
 Stevens, Frances May, Unc, Ed.....Spokane
 Stevenson, Lillie C, UD, LA.....Tacoma
 Stevenson, Marguerite B, Grad Omaha, Neb
 Stewart, Edgar Irving, Jr, LD, Ed.....Seattle
 Stewart, Isabel C, Grad.....Seattle
 Stewart, Katherine, LA.....Seattle
 Stewart, Oliver, Eng.....Seattle
 Stigenwalt, Alpha Lee, Soph, EE.....Chewelah
 Stinchfield, Bess O.....Helena, Mont
 Stinchfield, Caroline.....Helena, Mont
 St. Jean, Frances.....Mullan, Ida
 St. John, Bernice, Unc, LA.....Chehalis
 Stockley, Sallie, Spec, Sci.....Roslyn
 Stone, Edith, Grad.....
 Stone, Nellie, Grad.....
 Storey, Eloise E, Unc, Sci.....Harlem, Mont
 Storey, Millie Eugenia.....Harlem, Mont
 Strand, Eliza, Unc.....Vancouver
 Strater, Johanna, UD, Ed.....Seattle
 Strangham, Mrs. J, UD, Ed. Pendleton Ore
 Strauss, Siegfried, LD, Sci.....Colville
 Street, Harold Woodard.....Spokane
 Struble, Mildred Clara, Grad.....Spokane
 Stwalley, Calvin, Unc, Ed.....Tacoma
 Stwalley, Mrs. Margaret.....Tacoma
 Sugang, Felipe P, LD Sci Capizz, Batan, P I
 Sullivan, Clare Agnes, UD, LA.....Seattle
 Sullivan, Katherine.....Butte, Mont
 Sundby, Ella J, Unc, BA.....Tacoma
 Swan, Eleanor J, Grad.....Seattle
 Swacy, Harriette E.....Raymond
 Swanson, Queenie, Unc, Ed.....Portland, Ore
 Swanson, Sadie.....Spokane
 Sweet, Helen Eliza, Grad.....Kallispell, Mont
 Swingle, Elirington M, Grad.....Seattle
- Tachell, Maud, UD, FA.....Renton
 Tamesis, Florencio, Unc, LA.....Musan, P I
 Tanner, Josephine, UD, Ed.....Seattle
 Tarter, Clyde Sidney, LD, Sci.....Seattle
 Taylor, Dorothea, Grad.....Seattle
 Taylor, Claud L, LD, Sci.....Koooskia, Ida
 Taylor, Howard Rice.....Port Townsend
 Taylor, Susan E, Sci.....Tacoma
 Tee Garden, Chester U, UD, LA.....Seattle
 Tegland, Nellie May, Bus.....Tacoma
 Temple, Mary S, Spec, LA.....Tacoma
 Templeton, Ermine E, UD, LA.....Oakesdale
 Terrell, Agnes Neola, Unc, LA Billings, Mont
 Terril, Corwin LeRoy, LD BA.....Kennewick
 Thiel, Cordella Madeline, Unc, Law Seattle
 Thom, Amelia Edna, LA.....Spokane
 Thomas, Lee Clarence.....Butte, Mont
 Thomas, Hattie Couser, Journ.....Portland, Ore
 Thomas, Letty K, Spec, LA.....Seattle
 Thompson, Anna May, LD, LA.....Seattle
 Thompson, Gerhard N, Spec, FA.....Seattle
 Thompson, Ruth M, Unc, BA.....Prosser
 Thorn, William A, Unc, ME Abbotsford B C
 Thune, Elmer T.....Edmonds
 Thwing, Clarence, Grad.....Seattle
 Tiffany, Clara Louise, LD, LA.....Seattle
 Tiller, Arnt, Unc, LA.....Seattle
 Tionson, Felix, Spec, BA.....Manila, P I
 Tomas, Nicanor, LD, BA.....Rizol, P I
 Toner, Martin, LA.....Eau Claire, Wis
 Toomey, Floyd F, Unc, Law.....Seattle
 Town, Frances Allen.....Tacoma
 Townsend, John Gilbert, Spec Sci Utica, N Y
 Townsend, Russell, LD, Sci.....Everett
 Trawick, Margaret P, UD, LA Opelika, Ala
 Tremper, Edward P, Jr, UD, BA.....Seattle
 Trenholme, Ruth, LD, BA.....Seattle
 Tripp, Lucy B, LA.....Tacoma
 Trogstad, Grace Ina, LA.....LaCrosse, Wis
 Troth, Dennis C, Grad.....Seattle
 Troth, Mrs. Dennis C, Unc, BA.....Seattle
 Trow, Arthur P, UD, BA Santa Barbara, Cal
 Trukositz, Elizabeth, UD, LA.....Spokane
 Tucker, Josephine O, UD, LA Logansport, Ind
 Tucker, Ruth Elizabeth, Grad.....Seattle
 Tung, Sung-Wuan, UD, BA.....Peking, China
 Turinsky, Angline R, Unc BA Sandpoint, Ida
 Turnbull, Fred Archie, Ed.....Skykomish
 Turner, Lloyd Edwin, UD, Sci.....Spokane
 Turpin, Harold Lester, UD, BA.....Seattle
- Unis, Waldemar John.....Gresham, Ore
 Upton, Earl E, UD, BA Black Diamond
 Urner, John Arnold, UD, Sci.....Seattle
 Urquhart, Florence M, Grad Vancouver, B C
 Utz, Mrs. Cora Cato, Lib.....Spokane
- Van, Tsee-Chang, Unc, LA Hangchow, China
 Vande Bogart, Guy H, Grad.....Opportunity
 Vandercook, Mordecai W, Law.....Seattle
 VanDeVanter, Louise Mary, Grad.....Renton
 Vandwrit, Bessie A.....Seattle
 Van Eman, Clarice L, Grad.....Bellingham
 Van Gilder, J, Fred.....Centralia
 Van Houte, Mrs. Lydia, UD, LA.....
 Van Houte, William.....Richland
 Vannoy, Mrs. Louise, LD, Ed.....Seattle
 Varney, Cora C, Unc, Ed.....Honolulu, Hawaii
 Vickers, Mildred Louise, UD, FA.....Seattle
 Visell, Mrs. Florence W, LA.....Seattle
 Vaight, Edna Edmunds, Grad.....Seattle
 Von Babo, Max, Eng.....Seattle
 Von Erichsen, Lyle G, LD, LA.....Hillyard
- Wahl, George Franklin, Fish.....Seattle
 Walker, Mrs. Gladys P.....Portland, Ore
 Walger, Hazelbell, FA.....Seattle

Walker, Roberta, LD, FA.....	Seattle
Walker, Ruth, LA.....	Seattle
Wall, Edith Elizabeth, Spec, FA....	Seattle
Wallace, Clara L, Grad.....	Seattle
Wallace, Genelle, Unc, Sci.....	Seattle
Waller, Donald G, UD, BA.....	Seattle
Wallin, Beulah, UD, LA.....	Seattle
Wallin, Mrs. Florence L.....	Seattle
Wallin, James R, Unc, Ed.....	Seattle
Waltmeyer, Marie Claridge, Grad....	Seattle
Ward, Ethel Leota, UD, LA..Freeland, Mich	
Ward, Frank George, Fr, EE.....	Seattle
Ward, Harold James, Unc, BA.....	Seattle
Waters, Basil W, Jr, BA.....	Seattle
Watrous, Genie Ida, UD, Sci....	Bellingham
Watson, Nettie Kerr, LD Ed Vancouver, B C	
Watt, Elsie, LD, BA.....	Seattle
Watts, Gertrude L, FA.....	Seattle
Watts, Ruby Ione, LA.....	Seattle
Watts, Winifred, Unc, LA.....	Seattle
Way, Lois Edith, UD, Sci.....	Seattle
Weage, Avery Dudley, Grad.....	Seattle
Weage, Mary DeElla, UD, Sci.....	Seattle
Webster, Jessie E, Unc, LA..Port Angeles	
Weeks, Mary Louise, UD, FA.....	Seattle
Weigeldt, Mrs. M, J, Lehmann, LA.....	
Weinzirl, Adolph, LD, Sci.....	Seattle
Wentworth, Lois Janet, UD, Ed....	Seattle
Werner, Oscar B, LD, BA..Litchfield, Minn	
Werner, Winnifred, UD Bus Greenville, Mich	
West, Frances E.....	Portland, Ore
Westfall, Lenore H, Sci.....	Seattle
Weston, Merle M, UD, Sci Sacramento, Cal	
Wharton, Florence L, UD, Ed.....	Yakima
Wheeler, Chetta M, LA.....	Smithfield, O
Wheeler, Forrest Vale, Unc, Sci..Satsop	
Wheeler, Gladys Fidele.....	Seattle
Whelen, Lyle, Spec, BA.....	
Whitacre, Paul E, LD, BA.....	Ferndale
Whitaker, Leona, LD, Sci.....	Seattle
Whitcomb, Elizabeth Alice, Unc, Ed	Seattle
White, Janice M, LD, BA.....	Tacoma
White, Mrs. Lydia A, Unc, Sci.....	Seattle
White, Marion R, BA.....	Spokane
White, Marjorie Eleanor, LD, FA..Seattle	
Whitehouse, Stuart W, LD, LA Walla Walla	
Whiteside, Abby, FA.....	
Whiting, Edward P, Jr, EE.....	Seattle
Whitman, Daniel S, Unc, LA.....	Seattle
Whitnall, Helen, Ed.....	
Whitney, Frank Fleming, Unc, Ed..Yakima	
Whitney, Mrs. Jessie Losey.....	Retsil
Wichmann, Arthur Paul, Grad..Denver, Colo	
Widitz, Jack J, Fr, ME.....	Seattle
Wiel, Bodil, UD, Ed.....	Seattle
Wienand, Carl Marcus, UD, LA.....	Seattle
Wiese, Alma, Spec, BA.....	Seattle
Wilder, Hoyt G, Unc, LA.....	
Wiley, Josephine, Sci.....	Spokane
Wiley, Neva Beryl, LA.....	Spokane
Wilhelm, Frances, Unc, Ed.....	Colfax
Willard, Dorothy Elizabeth.....	Seattle
Williams, Aletta R, LD Ed..Elmhurst, Penn	
Williams, Charlotte Forsythe, Grad..Seattle	
Williams, Clara D, LD, LA.....	Tacoma
Williams, David James, LD, LA.....	Tyler
Williams, Edith Wyn, Spec, FA Oskaloosa, Ia	
Williams, Mrs. Ethel DeWitt.....	Wilbur
Williams, Hermon Porter, Grad.....	Tacoma
Williams, Jessie Evelyn, FA.....	Seattle
Williams, Lowell Eugene, UD, Sci	Seattle
Williams, Roy Arthur, Law.....	Salem, Ore
Williams, Theresa Maud.....	Seattle
Willis, Mrs. Arza McCellen.....	Naselle
Willis, Cecil Durand, LD, LA.....	Seattle
Wilson, Alice, LD, BA.....	Seattle
Wilson, S, Bertia, Grad.....	Spokane
Wilson, Doris Glasgow, Grad.....	Seattle
Wilson, Florence Markaret, Grad....	Seattle
Wilson, Frances Imogen, UD, LA.....	Seattle
Windust, Savanah, LA.....	Waitsburg
Winter, Frank H.....	Spokane
Wintler, Ella, Grand.....	Vancouver
Wisen, Byron F, LD, BA.....	Seattle
Witt, Lena E.....	Seattle
Woelber, Harry J, Sr, Mines.....	Spokane
Wolff, Marie Elizabeth, Unc, Sci....	Seattle
Wood, Florence, LD, FA.....	Seattle
Wood, Leighton Howard, LD, BA.....	Seattle
Wood, Ruth Rebecca, Spec, Ed..Helena, Mont	
Woods, William.....	Vancouver, B C
Woodward, Harriett, LD, BA.....	Seattle
Woodworth, Earl G, Unc, BA.....	Nooksack
Woolworth, Elizabeth, Grad.....	
Worcester, Eleanor Sewall, Unc.....	Spokane
Workman, Paul A, Unc, Sci..Portland, Ore	
Worth, Ernest Harding, FA.....	Seattle
Wright, Annah Barkley, Unc, LA.....	Seattle
Wright, Beatrice, LD, LA.....	Tacoma
Wright, Bernice F, Unc, Ed.....	Seattle
Wright, J, Clarence, UD, Ed.....	Seattle
Wright, Guy Samuel, Unc, EE..Victoria, B C	
Wright, Ruth H, Grad.....	Seattle
Wright, Warren Coleman, FA.....	Seattle
Wrighter, Helen Tiffany, LD, Sci..Lewiston	
Wyeth, Adeline Burnham, Grad Gresham, Ore	
Wynne, Vivian E, UD, Sci.....	Ferndale
Yancey, Della M, Grad.....	Seattle
Yeager, Lucile Marie.....	Spokane
Yenney, Ann, Unc, Ed.....	
Yerger, Bessie Pearl, Grad.....	Seattle
Yost, Carl Ross, Spec, Ed.....	Spokane
Yost, Stella Gertrude.....	Blackfoot, Ida
Young, Arthur B, Unc, LA..East Stanwood	
Young, Fay Laverne, UD, FA.....	Tacoma
Young, Paul H, Sci.....	Bellingham
Young, Wesley George, Grad.....	Seattle
Young, William W, UD, Ed..Nisland, S D	
Youngs, Marie, Grad.....	Warrensburg, Mo
Zee, Chung, Unc, BA.....	Ningpo, China
Zelgel, Henry Hall.....	Seattle
Zeltier, Ella Joanna.....	Luxemburg, Wis
Zinn, Zola, UD, Sci.....	Seattle
Zickler, Irma, Grad.....	

Puget Sound Biological Station—1920

Blanchard, IdaSeattle
 Brown, Martha A.Chicago, Ill
 Champlin, Winifred E.Manette
 Cunningham, JeffreeVictoria, B C
 Daugherty, Anna M.Newport, Ore
 Dellinger, Sarah S.Everett
 Dickey, Lloyd B.Minneapolis, Minn
 Hamm, GladysSheridan, Wyo
 Hansen, Mrs. Grace
 Hedman, Ruth LaurinaSt. Paul, Minn
 Herrick, Maude A.Seattle
 Howard, GraceSeattle
 Jolly, D. EberRandolph, Kas
 Jurgens, Hilsie B.Savanna, Ill
 Krafft, E. T. GertrudeSeattle
 Kuttler, VirginiaTribune, Kan
 Lanphere, MildredBryan, Ohio
 McLean, Arthur J.Seattle
 McConihe, MargueriteSeattle
 Mason, EdithSeattle
 Minnis, Marjorie E.Seattle

Norgore, MartinSeattle
 Norrington, AnnieExeter, England
 Pelz, FredaSeattle
 Pepper, EchoSeattle
 Redenbaugh, Dorothy D.Seattle
 Reuter, Alexia M.Seattle
 Richards, John ParkerTulsa, Okla
 Rosen, Hilda F.Monroe
 Russell, Ruth W.Newberg, Ore
 Skinner, Charles E.Yakima
 Smith, Mrs. Christina D.Seattle
 Speck, Philippa B.Peoria, Ill
 Sundquist, LeonaMt. Vernon
 Teeters, Glenna M.Kellogg, Ida
 Towler, Emmet D.LaGrande, Ore
 Townsend, Myron T.Brownville, Mo
 Weese, Asa OrrinAlbuquerque, N. Mex
 Weese, Mrs. J. M.Albuquerque, N. Mex
 Wright, MadonnaNorborne, Mo
 Young, DorothyStanwood

Short Course in Fisheries—1921

Coel, AlbertSeattle
 Connell, OmarSeattle
 Crilly, Paul HooverSeattle
 Dybwad, Peter F.Seattle
 Hoynes, Jens SundbergSeattle
 Hynes, Frank W.Seattle

McNab, JohnSeattle
 Nadeau, MadeleineSeattle
 Sekine, I.Tokyo, Japan
 Struble, Herbert SpencerJuneau, Alaska
 Watt, GeorgeSeattle

Short Course in Forestry—1921

Bernhardt, Robert O.Cleveland, O
 Boyd, J. D.Victoria, B C
 Butler, Ben F.Seattle
 Crane, Harold A.Bridal Veil, Or
 Cuthbert, W. A.Vancouver, B C
 Dighton, D. O.Victoria, B C
 Divine, L. R.Spokane
 House, Harry C.Chelan
 Hutchinson, H. H.Bradner, B C
 Johnston, Oliver W.Tulalip
 Knattle, L. D.Seattle

Lessenger, Will F.Seattle
 Ludgate, R. G.Leavenworth
 McClymont, WallaceAberdeen
 McColl, DonaldNorth Vancouver, B C
 Meigs, Samuel G.Olympia
 Moloney, L. A.Seattle
 Morris, E. E.Seattle
 Roddell, Crockett M.Tacoma
 Shannon, Edw.Seattle
 Tusler, Henry S.Seattle
 Schneider, J. R.Aberdeen

Short Course in Mines—1921

Albrecht, George W.
 Birney, Fred OwenSeattle
 Brown, Orville P.Seattle
 Durwachter, Ernest V.
 Falstrom, Nels F. G.Portland, Or
 Falk, Joshua G.Seattle
 Heaston, Rutherford Burchard
 House, James F.Livingston, Mont
 King, George M.Sumas

O'Donnell, William JoSeattle
 Lundeall, R. E.Hyder, Alaska
 Pearson, Paul W.
 Robertson, James H.Buffalo, N Y
 Sergicosky, Nicholas A.Seattle
 Stankovitch, Peter N.Everett
 Stay, Andrew H.
 Taylor, Martin S.Weiser, Ida

SUMMARY OF ENROLLMENT

1920-1921

SUMMARY OF ENROLLMENT—1920-1921

BY SCHOOLS AND COLLEGES

SCHOOLS AND COLLEGES	SUMMER QUARTER CENSUS			AUTUMN		WINTER		SPRING		REG. YR.
	1st. T.	2nd. T.	TOTAL	QUAR. CEN.	QUAR. CEN.	QUAR. CEN.	QUAR. CEN.	QUAR. CEN.	TOTAL	
	1	2	3	4	5	6	7			
Men	94	75	95	82	75	77	103			
Women	194	99	197	74	78	71	104			
Liberal Arts	346	261	350	1230	1231	1101	1396			
Men	86	71	88	415	393	328	462			
Women	260	190	271	815	838	773	934			
Science	167	175	192	578	508	513	647			
Men	62	65	67	238	233	192	266			
Women	105	110	125	340	335	321	381			
Bus. Admin.	163	156	190	1330	1358	1212	1558			
Men	99	104	119	1100	1119	988	1281			
Women	64	52	71	230	239	224	277			
Education	291	243	352	238	231	225	269			
Men	74	60	78	39	35	37	48			
Women	217	174	274	199	196	188	221			
Engineering	66	60	68	754	704	633	775			
Men	66	60	68	754	761	632	772			
Women					3	1	3			
Fine Arts	110	55	124	391	368	356	445			
Men	6	3	9	62	62	56	67			
Women	104	52	115	329	306	300	378			
Fisheries	4	6	6	39	49	34	46			
Men	4	6	6	38	49	33	44			
Women				1		1	2			
Forestry	4	5	6	118	148	106	133			
Men	4	5	6	117	146	106	131			
Women				1	2		2			
Journalism	10	10	13	29	28	27	33			
Men	4	2	4	16	16	14	16			
Women	6	8	9	13	12	13	17			
Law	41	40	45	123	112	109	125			
Men	36	39	39	116	104	102	117			
Women	5	1	6	7	8	7	8			
Lib. Econ.	5	1	6	11	9	7	11			
Men	1		1	1	1		1			
Women	4	1	5	10	8		10			
Mines	8	5	8	80	99	78	106			
Men	8	5	8	80	99	78	106			
Pharmacy	3	2	3	114	110	94	131			
Men	3	2	3	86	78	67	91			
Women				28	21	27	40			
Total	1506	1193	1064	5191	5228	4643	5882			

NOTE.—Columns 1, 2, 4, 5, and 6 represent census figures—i. e. the enrollment taken on a stated day within the first month of a term or quarter. Columns 3 and 7 show figures representing the number of individuals: column 3 the number registered during the summer quarter, column 7 the number registered during the regular academic year. For comparison with other institutions the figures in columns 3 and 7 should be used, as these are the customary catalogue figures.

SUMMARY OF ENROLLMENT

BY CLASSES

CLASSES	SUMMER QUARTER CENSUS			AUTUMN		WINTER		SPRING		REG. YR. TOTAL
	1st. T.	2nd. T.	TOTAL	QUAR. CEN.	QUAR. CEN.	QUAR. CEN.	QUAR. CEN.	QUAR. CEN.	QUAR. CEN.	
CLASSES	1	2	3	4	5	6	7	8	9	10
Graduates ..	288	174	292	156	153	148	207			
Men	94	75	95	82	75	77	103			
Women	194	99	197	74	78	71	104			
Seniors	94	18	100	569	538	476	597			
Men	46	16	47	297	276	231	309			
Women	48	2	53	272	262	245	288			
Juniors	362	291	379	732	757	704	811			
Men	119	109	127	396	424	384	434			
Women	243	182	252	336	333	320	377			
Sophomores ..	304	244	331	1515	1505	1396	1608			
Men	173	143	186	1015	978	880	1022			
Women	131	101	145	500	527	489	586			
Freshmen	359	404	434	2083	2055	1775	2443			
Men	156	138	161	1251	1239	1009	1481			
Women	203	266	273	832	816	766	962			
Specials	90	92	128	136	220	171	216			
Men	27	25	34	103	179	129	155			
Women	72	37	94	33	41	42	61			
Total ..	1506	1193	1664	5191	5228	4643	5882			

TOTAL STUDENTS IN RESIDENCE

During regular academic year	5882
During summer quarter	1664
	7546
Deduct summer quarter duplicates	531
Net total for the year	7015

EXTENSION STUDENTS

Correspondence	505
Men	203
Women	302
Extension Classes	1318
Men	786
Women	532
Total Extension	1823

NOTE—Columns 1, 2, 4, 5, and 6 represent census figures—i. e. the enrollment taken on a stated day within the first month of a term or quarter. Columns 3 and 7 show figures representing the number of individuals: column 3 the number registered during the summer quarter, column 7 the number registered during the regular academic year. For comparison with other institutions the figures in columns 3 and 7 should be used, as these are the customary catalogue figures.

NOTE—The Extension Service enrolls students at any time during the twelve months. The figures given indicate the number actually studying by correspondence, or in extension classes during some part of the year beginning July 1, 1920.

INDEX

- Accredited schools, admission from, 41; list of, 41.
- Academic and vocational guidance, 52.
- Administration, officers of, 8; administrative boards, 22.
- Admission to the University, 40; by certificate, 40; on examination, 42; freshman standing, 43; as a special student, 45; unclassified standing, 45; advanced undergraduate standing, 45; of normal school graduate, 47; graduate standing, 47; requirements of different colleges, 44; to the Bar, 148; to extension courses, 308.
- Aeronautical Engineering, 179.
- Anatomy, 179.
- Architecture, 180.
- Arts and Law curriculum (combined), 69.
- Assistant Professors, 11.
- Associate Professors, 11.
- Associates, 12.
- Associations and clubs, 58; alumni, 58; associated students, 58; Christian associations, 58; department clubs, 58; debating 58; musical, 58; philological, 58; honor, 59; historical, 59.
- Astronomy, 182.
- Bacteriology, 184.
- Bailey Babbette Foundation for Child Welfare, 35.
- Bequests, 24.
- Bibliography, 311.
- Biological station, 305.
- Board of Regents, 7.
- Botany, 185.
- Buildings of University, 25.
- Business Administration, College of, 105; faculty, 105; admission, 106; degrees, 106; curricula, 108; courses, 203.
- Calendar, 6.
- Certificate of Proficiency for music supervisors, 129; for winter session miners, 158.
- Ceramics, 188.
- Chemistry, 190.
- Child Welfare, Bailey & Babbette Gatzert Foundation, 35.
- Chinese, see Oriental History.
- Classical Languages and Literature, 190.
- Clubs, see associations and clubs.
- Committees of the faculty, 22; of the board of Regents, 7.
- Commons, University, 51.
- Correspondence courses, see Extension Service.
- Curricula, business administration, 107; education, 91; engineering, 124; fine arts, 130; fisheries, 140; forestry, 145; home economics, 81; journalism, 118; law, 149; liberal arts, 66; library, 104; mines, 156; nurses, 80; pharmacy, 165; physical education, 85; pre-medical, 80; science, 75.
- Dean of Men, 52.
- Dean of Women, 52.
- Definitions and Explanations, 38, 40, 178.
- Degrees, 53; graduate, 38, 173; with honors, 53; normal diplomas, 95; business administration, 36; 106; education, 36, 97; engineering, 36, 122; fine arts, 36, 129; fisheries, 37, 138; forestry, 37, 142; journalism, 37, 118; law, 37, 151; liberal arts, 36, 66; library, 37, 104; mines, 37, 153; pharmacy, 38, 161; professional degrees, 177; science, 35, 73; conferred in 1920, 317.
- Departments of Instruction, 178; aeronautical engineering, 179; anatomy, 179; architecture, 180; astronomy, 182; bacteriology, 184; botany, 185; ceramics, 188; chemistry, 190; civil engineering, 196; classical languages, 199; dramatic art, 202; economics and business administration, 203; education, 212; electrical engineering, 217; English, 220; fisheries, 225; forestry, 227; geology, 231; German, 235; history, 237; home economics, 241; journalism, 246; law, 248; library science, 250; mathematics, 252; mechanical engineering, 255; military science, 256; metallurgy, 261; mining, 263; music, 266; nursing, 271; Oriental history, literature and languages, 272; painting, sculpture and design, 273; pharmacy, pharmaceutical chemistry, materia medica and food chemistry, 275; philosophy, 277; physical education and hygiene, 279; physics, 283; physiology, 300; political science, 285; psychology, 287; Romanic languages, 289; Scandinavian languages, 293; sociology, 295; zoology, 299.
- Design, 273.
- Diploma fee, see expenses.
- Dormitories, University, 51.
- Dramatic art, 202.
- Economics, 203.
- Education, College of, 87; faculty, 86; requirements, 90; admission, 87; degrees, 37, 90; curricula, 91; courses, 212.
- Endowment and support, 23.
- Engineering, College of, 121; faculty, 121; degrees, 122; admission, 123; curricula, 124; courses, civil engineering, 196; mechanical engineering, 255; electrical engineering, 217; engineering experiment station, 35, 127.
- English, 220.
- Enrollment, Summary of, 380.
- Entrance Information, 36.
- Equipment, 25.
- Examination, entrance, 42; regular, 61; for exemptions in English, 42.
- Expenses, tuition, 47; A. S. U. W. fee, 47; laboratory deposits, 49; graduation fee, 49.
- Extension Service, 308; faculty, 308; division of instruction, 309.

- Faculty, in order of academic seniority, 11; alphabetical list, 14; professors, 11; associate professors, 11; assistant professors, 11; associates, 12; instructors, 12; lecturers, 12; teaching fellows, 13; assistants, 13; library staff, 10.
- Fellowships and scholarships, 54; graduate fellowships, 54; Mars fellowship, 55; University teaching fellowships, 55; Columbia University fellowship, 55; Isabella Austin scholarships, 55; chemistry scholarship, 55; Rosenberg scholarship, 55; Washington alumnae scholarship, 55; Du Pont scholarship, 54; Imperial Order of the Daughters of British Empire scholarship, 55; awarded in 1920, 327.
- Fine Arts, College of, 128; faculty, 128; admission, 128; curricula, 130; degrees, 129; courses, architecture, 180; dramatic art, 202; painting and design, 273; music, 266; sculpture, 273.
- Fisheries, College of, 137; faculty, 137; degrees, 138; curricula, 140; courses, 225.
- Forestry, College of, 142; faculty, 142; admission, 143; degrees, 144; curricula, 145; courses, 227.
- Fraternity and sorority pledging, 61.
- French, see Romanic languages.
- Freshman standing, admission to, 48.
- Geology, 231.
- Germanic Languages and Literature, 235.
- Government of the University, 23.
- Grades, see scholastic regulations.
- Graduate School, 168; faculty, 168; admission, 172; degrees, 34, 173; degrees conferred in 1920, 321.
- Greek, see Classical Languages.
- Grounds, 25.
- Health Service, University, 52.
- History, department of, 237; of University, 23.
- Home Economics, department of, 241.
- Honor societies, 59.
- Hygiene, see Physical Education.
- Infirmiry, University, 9, 52.
- Instructors, 12.
- Italian, see Romanic Languages.
- Journalism, School of, 115; faculty, 115; admission, 117; curriculum, 119; courses, 246.
- Laboratories, 26.
- Laboratory deposits, 49.
- Latin, see Classical Languages.
- Law, School of, 147; faculty, 147; degrees, 149; courses, 248.
- Lecturers, 13.
- Liberal Arts, College of, 62; faculty, 62; admission, 64; curricula, 66; degrees, 66; courses, see Departments of Instruction.
- Library, The, 25; staff, 10; law library, 147.
- Library School, 103; faculty, 103; admission, 103; curricula, 104; courses, 250.
- Loan Funds, 57.
- Lower Division, Requirements of the, 66, 74.
- Map of the University Grounds, 3.
- Mathematics, 252.
- Mechanical Engineering, 255.
- Metallurgy, 263.
- Military Science, 258.
- Mine Safety Station, 33.
- Mines, College of, 152; faculty, 152; admission, 156; curricula, 157; winter session, 158; courses, 263.
- Museum, 25.
- Music, 266.
- Normal Diplomas, 95, see Degrees.
- Normal School Graduates, admission of, 47, 93.
- Nursing, 271.
- Officers of Administration, 8.
- Organization of the University, 36.
- Oriental History, Literature and Languages, 272.
- Painting, Sculpture and Design, 273.
- Pharmacy in Washington, Requirements to practice, 161.
- Pharmacy, College of, 160; faculty, 160; admission, 164; curricula, 165; degrees, 165; courses, 275.
- Philosophy, 277.
- Physical Education and Hygiene, 258; courses for men, 270; courses for women, 280.
- Physical Examinations, 60.
- Physics, 283.
- Physiology, see Zoology.
- Political Science, 285.
- Prizes in Public Speaking and debate, 56; for essays, 56; for Italian, 56; for Latin, 56; for French, 56; for military science, 56; for Chinese literature, 56; for architecture and design, 57; awarded in 1920, 327.
- Professors, 11.
- Psychology, 287.
- Public Speaking and Debate, see Dramatic Art.
- Puget Sound Biological Station, 305.
- Register of Students, 1920-1921, 329; of summer quarter, 367; of short course students, 378.
- Registration, 42; changes in, 42; late, 42.
- Romanic Languages, 289.
- Scandinavian, 293.
- Scholarships, see Fellowships and scholarships, 327.
- Scholastic regulations, 59; studies, 49; withdrawal, 60; scholarship standing, 60; grades, 61.
- Science, College of, 72; faculty, 72; admission, 73; curricula, 73; degrees, 73; courses (see Departments of Instruction.)
- Sculpture, 273.
- Secondary schools, see accredited schools.
- Senior Scholars, 53; list of, 295.
- Short courses in Fisheries, 140; Forestry, 143; Mines, 158.
- Sciology, 295.
- Spanish, see Romanic Languages.
- Special Students, 45.
- Student Fee, see Expenses.
- Student Loan Funds, 57.
- Student Government, 53.
- Student Help, 52.
- Summary of Enrollment, 380.
- Summer quarter, 302; registration, 303; admission, 303; fees, 304.
- Teaching Fellows, 13.
- Tuition, see Expenses.
- Unclassified Students, 45.
- Unit, Definition of, 43.
- U. S. Bureau of Mines Northwest Experiment Station, 33.
- Upper Division, requirements of the, 68, 74.
- Withdrawal, 60.
- Winter Session, Mines, 158.
- Zoology, 299.

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