University of Washington
Faculty Council on Research
February 12, 2014, 9:00 a.m. – 10:30 a.m.
Gerberding 142

Meeting Synopsis:

1. Call to Order
2. Approval of the Minutes from November 13, 2013
3. Applied Physics Laboratory at UW
4. Request for FCR Approval of Classified Contract: “2014 ONR Joint Active/Passive Sonar Review” from the Office of Naval Research
5. Request for FCR Approval of Classified Contract: “Arctic Ice-cap Submarine Top Sounder Recording”
6. Restrictions on Publication
7. Adjourn

1) Call to Order

The meeting was called to order by Chair Miller at 9:00 a.m.

2) Approval of the Minutes from November 13, 2013

The minutes from November 13, 2013 were approved as amended.

3) Applied Physics Laboratory at UW

Jeffrey Simmen and Bob Miyamoto (UW Applied Physics Laboratory – “APL”) provided background of UW-APL. The origins of the lab date back to 70 years ago when APL was created by the US Navy to address technological challenges experienced from World War 2 with a focus primarily on anti-submarine warfare. UW-APL is among 4 other (one pending) APL units across the country including:

- Pennsylvania State University
- Johns Hopkins
- University of Texas
- University of Hawaii (pending)

Supported by the US Navy UW-APL is committed to maintaining navel expertise such as underwater acoustics and engineering. UW-APL has the resources and knowledge available in order to quickly respond when US Navy requires research and development (R&D) on particular projects. UW-APL also provides the unique opportunity for faculty and students who have security clearances to work on Navy-related R&D. About 15–20% of all UW-APL work is categorized as classified research.

UW-APL is horizontally/vertically integrated and connects disciplines across campus. The model was created during World War II in order to take scientific discovery and quickly use it for practical applications. UW-APL creates a great deal of technology transfer, not just in the traditional sense like licensing to a company, but in transferring technology solutions directly to the US Navy. UW-APL has 60 joint appointments with 11 departments with 41 graduate students advised across 9 departments.
Core R&D areas include:

- **Dynamics of Ocean Environments**
  - Ocean physics
  - Polar research
  - Ocean engineering
  - E.g. Probing the Arctic to understand the changing ice extent and concentration

- **Acoustic and Electromagnetic Sensing and Applications**
  - Underwater acoustics
  - Remote sensing
  - Medical ultrasound
  - E.g. Developing advanced wave sensing radars for ship motion forecasting

- **Environmental and Information Systems**
  - Operational METOC
  - Sonar and signal processing
  - Information and control systems
  - E.g. Developing a pilot control interface to control fleet of undersea gliders

- **Electronic and Photonic Systems**
  - Sonar-related systems
  - Operational mobile-undersea platforms
  - Ocean observing systems
  - E.g. Designing and building SSN acoustic data recording/processing systems

UW-APL is much different now that it was two decades ago during the Cold War. At that time UW-APL was purely funded by the US Navy. In 1990 US Navy funding was 92% of the lab’s budget and now consists of 45%. UW-APL is still conducting the same activities but has become broader and more capable with stable funding/growth and less dependence on the US Navy. Additionally, the lab has expanded to other defense research and development such as its Improvised Explosive Device program, combat casualty care and cybersecurity. In addition, UW-APL has expanded into non-research development such as ocean observatories, ultrasound therapy, climate change and marine ecosystems.

Staff size is approximately 300 individuals including 200 scientists and engineers. Annual funding averaged $76 million in FY12-13 with 31% from the National Science Foundation, 26% from the Office of Naval Research, 6% from NASA and 22% from Department of Defense (including US Navy).

Approximately half of employees have security clearances and the majority of staff (80%) is housed in Henderson Hall. All faculty associated with UW-APL are non-tenure tracked faculty.

4) **Request for FCR Approval of Classified Contract: “Arctic Ice-cap Submarine Top Sounder Recording”**

The request was submitted by Mark Wensnahan requesting $184,100 over 5 years to support the development of an ice thickness recorder to be deployed on US Navy Submarines. Ice thickness is an important parameter for scientific research such as monitoring of global climate change, validation of climate models, and verification of satellite measurements. The bulk of high resolution historical thickness data come from measurements made by US Navy submarines traveling through the Arctic. These data are initially classified but with suitable processing they will be declassified and made
available to anyone via a public archive. Submarines continue to measure thickness but over the last decade little of this data has been available due to lack of a suitable data recorder. Wensnahan will have the following responsibilities within the contract:

- Provide science requirements for the design and construction of the recorder,
- Develop software for the processing of the data,
- Process data from multiple cruises over the next several years and
- Submit the processed data to the public archive.

The classified portions of this work include:

- Specific design details of the recorder and the interface with submarine systems,
- Information on upcoming submarine cruises and
- The initial unprocessed thickness data.

It should be emphasized that while much of this work is classified, the ultimate goal is to produce a declassified, publicly-available product that is of great value to the scientific community. Vogt explained that the subcommittee asked their usual six questions and UW-APL did a good job in responding to concerns.

The request received unanimous approval.

5) Request for FCR Approval of Classified Contract: “2014 ONR Joint Active/Passive Sonar Review” from the Office of Naval Research

Bob Miyamoto has submitted a request from the Office of Naval Research (ONR) through a company known as MANDEX to organize and manage a classified meeting of researchers funded by the Office of Naval Research Code 321 US (Undersea Signal Processing). The Principal Investigator on the project is David Krout and the amount of requested funding is $29,000. FCR has approved similar requests for the last six years and the meetings have been so successful that ONR would like the University of Washington to host it again this year. The meeting is scheduled for three days in August and Miyamoto explained this is a good opportunity for students and faculty to network and learn from each other.

The request received unanimous approval.

6) Restrictions on Publication

Wylie Burke, Ben Marwick and Alison Wylie discussed restrictions on research publications and Marwick’s recent FCR request related to a site excavation and research agreement from The University of Queensland (Australia). Marwick is a UW professor in Anthropology with Australian citizenship. The subcontract was approved by the University of Queensland (UQ) with requested funding in the amount of $260,000 over 5 years. The project is for site excavation and research specifically in the Northern Territory of Australia that explores the nature of human behavior when people first colonized Southeast Asia and Australia. The project incorporates Marwick’s expertise on a project coordinated between UW and UQ in which Marwick and his students would sift through samples in the site. The site is controlled by the Gundjeihmi Aboriginal Corporation (GAC) which has already been sampled. However, this project would go through the samples again in more detail to see if they come up with results that they
hypothesized. The red flag on this project from OSP was that the GAC is a tribal organization in charge of the site and is very sensitive of the display of human remains. GAC is concerned about the release of information of the site itself and publishing the location to ensure outsiders do not descend upon the site. As a result GAC made a restriction that anything published must go through them as well as UQ before UW can publish any work. GAC is not interested in the theory involved with the project but wants to ensure that their cultural traditions are respected.

Miller explained that this proposal generated a lot of discussion at the last meeting, specifically on the conditions established by GAC which put restrictions on what can be reported. Marwick explained that the project is studying the first trace of human activity on the landmass. GAC has expressed enthusiasm about the study, but there is a complicated legal arrangement. For example, the agreement did not come into existence until the excavation was finalized. During the fieldwork there was a lot of consultation directly with GAC which resulted in a final Memorandum of Understanding (MOU) with the tribal organization. The primary issue in the MOU is that GAC must review the publication before he can communicate his findings.

Discussion ensued. Burke explained that this issue addresses very sensitive issues including faculty intellectual property (IP) rights and protecting cultural heritage. In reviewing the MOU against similar agreements with tribal groups across the world the language is pretty average in terms of restrictions. Specifically, it does not allow GAC the right to prevent publications but the ability to review the publication before it is distributed. If GAC thinks the publication puts forward a conjecture that is not supported by the tribal organization, and Marwick does not address the concerns expressed by GAC, then his publication must include a disclaimer that GAC does not agree with the findings. Burke reiterated the fact most tribal groups will simply prevent any publications if they do not agree with a researcher’s study, so the MOU established by GAC is relatively lenient.

Burke explained that universities and researchers involved with site excavations should get their agreements in writing before conducting research. This would allow all parties to work out the details before data is obtained and findings produced. Most tribes in the US are authorized to have their own governance and oversight which allows them ownership everything within their jurisdiction, including ownership of publications that result from research on tribal property. This allows tribes to set their own guidelines and the ability to shut down projects completely at their discretion. When dealing with tribal organizations it is important to remember that research is owned by the institution, not the individual researcher. Burke explained this is probably why the publication requirements need institutional backing to support this particular agreement.

Burke explained there are several contexts in which the MOUs are written:

- Community-written and commercially-controlled projects
- Agency-sponsored projects
- Researcher-initiated projects

Since there are many ways in which project agreements are structured it is always important to know how the MOUs assign IP and who owns the primary data.

Concern was raised that when researchers are operating under restrictions they are likely to be inadvertently influenced by the restrictions set upon them. A question was raised asking if it is common
to post a disclaimer on a research publication explaining they are operating under certain restrictions. For example, FCR agree on the following disclaimer for Marwick’s study:

“The information contained in this communication was subjected to the following test: no publication, presentation or reporting at conferences or public gatherings will proceed until the concerns of the Gundjeihmi Aboriginal Corporation (GAC) are resolved or the GAC consents in writing to such publication or reporting.”

Burke explained that disclaimers like these are not common. These studies are working with tribal organizations that have a long history of colonial oppression. Since this working environment is well known to all archeologists there is an expectation that any researcher is already working under these restrictions. Burke suggested that the study could be published while providing detailed information about the restrictions. This would allow the publisher to provide a detailed account about GAC’s participation which could actually enhance the publication by recognizing the complex historical and cultural elements that exist within the study.

Burke reiterated the importance of community-based participation in research and the commitment to bringing stakeholders together and identifying the appropriate practices that benefit the community while communicating research finding in a responsible manner. Burke suggested looking at this as a quality-control measure that allows experienced tribal members to provide helpful feedback, rather than as censorship.

Discussion ensued about colleagues’ experiences in suppressing sensitive material during research studies. There are a number of occasions in which authors collaborate with co-authors from government agencies, such as the Center for Disease Control. In these situations the agency will be concerned in how they are represented and require the publication to show them in a better light. This issue is also common with drug manufacturers.

Discussion ensued about having a disclaimer. A suggestion was made to develop creative methods to recognize the multiple voices that influence a researcher’s finding. One suggestion was to include the agreement as an addendum to the report explaining the project underwent external review. Other alternatives include adding this to the researchers’ acknowledgments or within their methodology sections.

During the last council meeting FCR agreed on language for a disclaimer which Marwick accepted. Marwick explained that the language might be re-worded based on feedback from other collaborators, but in general the idea is fine. A question was raised asking how the council will address this issue in the future. Discussion ensued. The council could suggest a generic policy or handle this on a case-by-case basis. A comment was raised that the conditions change rapidly over the years and if there is generic language the wording should be neutral. For example, the language could state that restrictions to publications are required but not explain why the restrictions are required.

A suggestion was raised that Marwick could include a detailed description about the agreement in his methodology section, rather than a simple sentence stating there was censorship during his research. The council agreed this would be consistent with its original suggestion to Marwick and supported the idea. A suggestion was made that FCR facilitate a conversation between representatives from UW and tribal organizations to identify the correct language to use in the future.
7) Adjourn

The meeting was adjourned by Chair Miller at 10:30 a.m.

Minutes by Grayson Court, Faculty Council Support Analyst. gcourt@uw.edu

Present: Faculty: Miller (Chair), Aragon, Beauchamp, Scheuer, Shields, Vogt
President’s Designee: Lidstrom
Ex-Officio Reps: Dhungana

Absent: Faculty: Demiris, Rosenfeld, Slattery
Ex-Officio Reps: James, Louden, Fridley