

**Utah State University
Research Council Minutes
March 27, 2008 - 3:00 p.m.
Champ Hall**

RESEARCH COUNCIL MEMBERS PRESENT:

Brent Miller, Chair
Clifford Skousen
for Doug Anderson
Jeff Broadbent
Byron Burnham

Nat Frazer
Jagath Kaluarachchi
for Scott Hinton
Mary Hubbard

James MacMahon
Paul Rasmussen
Tim Shahan
for Carol Strong
Vincent Wickwar

INVITED GUESTS:

DeeVon Bailey
Jeff Broadbent
Jeri Brunson
Adam Fowles

Gretchen Gimpel-Peacock
Ed Glatfelter
Irene Jorgensen
David Paul

Sara Rule
Lorraine Walker
Ned Weinschenker
Morris Whitaker

ACTION ITEMS

1. **Approval of Minutes of February 28, 2008** (Brent Miller)
Nat Frazer motioned to approve the minutes of February 28, 2008. Paul Rasmussen seconded the motion; motion carried unanimously.

DISCUSSIONS

1. **Welcome & Introductions** (Brent Miller)
2. **Presentation: "Animal Models of Drug and Alcohol Abuse"**
Tim Shahan (Principal Investigator) and Amy Odum (Co-Investigator)

Addiction is characterized as very compulsive and persistent drug seeking consumption regardless of encountering negative outcomes or consequences as a result of taking drugs. Relapse is a serious problem associated with drug and alcohol abuse even after treatment has been part of the rehab process. It is widely believed that individuals who are treated through rehab and are placed back into their natural environment end up craving drugs again. They do not necessary want the drugs again, but they cannot control the cues that ultimately lead to their cravings.

Through empirical human research it is known that compulsive reaction is based on very basic conditioning in the learning processes. Animal models are used for this type of research because they are useful in studying genetic and environmental contributions under controlled circumstances. It is much easier to study the underlying neurobiology with

animals because researchers can test novel and experimental treatments (behavioral & pharmacological) that are not possible with humans.

Tim shared details of how animals respond to drug/alcohol stimulus. Cues hijack the brain's reward circuitry, which is the portion involved in conditioning and learning about new things. This low level part of the brain is taken advantage of with drug interaction. Focus then becomes directed toward how we address and understand the problem and thereby address the reward cues associated with the behavior. Once the drug cues are identified, it is important to understand the same quantitative theories of learning and what they tell us about the motivational impact on seeking out drugs.

Over the past several years, USU's research team developed an animal model of drug use and analyzing the cues of predictive drug use. Findings from early procedure models showed that once the attending drug is established, it is very difficult to eliminate. The attending cues can be decreased, but the desire for cues stays persistent after the desire for the drug has left. Additionally, it was discovered the attending cue is more persistent if it is associated with greater alcohol consumption. It is also presumed that this would extend to other drugs as well. How much drug use in the cue determines how persistently the animals attend to the drugs. After attending to the cue, the animal drinking is much more consistent as they work harder and longer to get the drug. If you decrease their attending to an alcohol cue, they drink less. Increase the cue and they consume more.

Tim commented that research will be extended from existing models to understand the effect of relapse in animals and the competing cues that contribute to relapse. He noted that one of the most important findings from this research is that treatment for drug and alcohol abuse is most effective when individuals have alternative forms of reward in their lives.

3. **Responsible Conduct of Research (RCR) Training** (Jeff Broadbent)

USU's interest in RCR training stems back to 1992 when the federal government passed a requirement that anyone receiving a NIH training award was also required to acquire RCR ethics training. In the year 2000, NIH sought to extend that requirement to all grantees, but it was later suspended. In 2004, USU began to offer a Research Integrity course (6900); however, the course has received low participation. In 2007, Byron Burnham, School of Graduate Studies dean, approached the research office to discuss the possibility of the two offices partnering together to expand RCR training at USU.

A handout was distributed with an overview of USU's RCR progress to date. Jeff described a Graduate Scholars Certification program, which consists of the following three elements:

- Yearly forum held in conjunction with the Graduate Student and New Faculty Orientation each fall.
- Graduate Scholars Forum (offered in April) will have dedicated sessions about data management and authorship/publication topics.
- Electronic modules available "on-line" where the user can proceed at their own pace and then take a quiz at the conclusion.

Utah State's RCR training is currently voluntary; however, the America Competes Act, which was passed this last year, increased NSF's budget over the next 3 years. Part of

the requirements associated with this new act is that all undergraduate, graduate, or postdoc researchers who are supported by an NSF grant must receive RCR training from their institution. Information will be provided to USU researchers who need this training so that they are aware of the requirement and programs available to assist them. In the future, work will continue at USU to expand the RCR program based on best practices nationally.

Comments & Observations

- Jim MacMahon asked how the Graduate Council determined that RCR training would not be mandatory. He commented that central implementation should be considered based on the potential impact to the University. Byron Burnham responded that faculty representatives who attend this council noted that similar RCR training is already being covered in methodological courses; therefore, the motion for mandatory implementation was declined.
- Brent Miller commented that discussion on this topic could be addressed with Faculty Senate as well as the college deans to educate and help broaden the acceptance and importance of RCR training. Questions remain as to the best approach to proceed.
- Jeri Brunson commented that the Graduate Student Senate reviewed the RCR training in detail and their concerns were focused towards the format of the training and whether or not the results would be worthwhile. Jeff agreed and stated the best way to evaluate the effectiveness of the training is to participate and then make the determination if the training is beneficial.
- David Paul stated that when an award is received from NSF and the University accepts it, USU agrees the requirements will met. SPO distributed information to individuals who have NSF supported projects to identify and alert them that their certification in RCR training is mandatory.

Brent Miller concluded that future workshops and discussions will also be offered to NSF funded investigators to help educate them on what is required with this certification.

4. Association for Accreditation of Human Research Protection Process (AAHRPP) Site Visit Schedule (Gretchen Gimpel-Peacock)

Utah State University is in the early to middle stages of the accreditation process for our human research protection program. The self assessment portion was recently completed and submitted. The next step is a site visit which will take place sometime this year. Gretchen noted that accreditation is not currently required for research protection programs; however, attention in this area is gaining support, and it is believed that the accreditation process will ultimately become a priority at all research universities.

Gretchen outlined USU's accreditation timeline as follows:

- March 5, 2008 – Application submitted to AAHRPP
 - Report from AAHRPP expected back to USU in 6 weeks

- USU will then have a “soft” deadline of 30 days to respond to the report
- Fall, 2008 --- Site Visit by AAHRPP (2-3 days)
 - Individuals and departments involved will be notified in advanced
- AAHRPP site visit report will follow thereafter

Comments & Observations

- Jim MacMahon asked what benefits USU would see from this accreditation. Gretchen noted we have already seen areas where USU will benefit from streamlining some processes. Accreditation will help identify areas where improvement is needed as well as areas of success. At the same time, accreditation will help better protect USU human research participants. Brent Miller commented that he foresees this accreditation as being more of an expectation and necessity similar to animal research. Although accreditation is not required at this time, USU wants to assure that we conduct all research as ethically and appropriately as possible.

5. Overview of USU’s International Program Development (DeeVon Bailey)

USU’s goal is to expand international research and training as well as engage all students by striving to integrate them here at USU with international opportunities. This integration includes training that will allow international students to acclimate and enhance their experiences while attending Utah State.

USU has introduced 100 + major programs in international research over the years, which amounted to ~ \$ 400 million. These programs have included water resources and irrigation, natural resources, and arid land research. Many countries have partnered with USU in international research, but the major regions include: The Middle East, North Africa, Latin America and Asia. Over the past 10 years, 60+ cooperative action groups in both Kenya and Ethiopia have been developed. Through academic training, they have been taught how to establish savings associations. These groups have invested savings into a central pool and learned how to lend money to each other, which has been a remarkable economic and educational experience for them.

There are currently over 800 international students attending Utah State with representation from nearly 80 countries. Additionally, Utah State has study abroad programs with almost 300 different universities in 40 countries. These locations also offer teaching opportunities for those who want international teaching experience. Degree programs have also been very successful in the Dominican Republic, China, Taiwan, and Hong Kong. The Jon M. Huntsman School of Business expands USU’s abilities internationally. Additionally, programs have been enhanced in irrigation engineering in the Middle East, as well as new programs in China.

In summary, DeeVon noted President Albrecht’s support of international programs and the need to establish new partnerships beyond our current classrooms and borders that will build upon the legacy that USU has enjoyed in the past.

Brent Miller commented that USU has committed \$150,000 a year (cumulative for the next five years), that will be dedicated towards study abroad programs. DeeVon noted that in

the future, he is planning to spend time with each of the college deans to discuss new ideas about international program development.

6. Undergraduate Research/Research Week Update (Brent Miller)

Brent distributed a handout which highlighted Research Week activities for 2008. Approximately 90 undergraduate students will participate during Student Showcase on 4/1/08. Jeff Broadbent and David Paul gave an overview of planned workshops that will cover new seed funding programs and proposal support. Jeri Brunson commented that 75+ students will participate in either posters or oral presentations during the grad student symposium.

Jeff Broadbent explained the process of selecting the College Researcher of the Year award. The recipient for 2008 will be recognized at Robins Awards on April 19th.

Jeff asked for input if the colleges would like to see the nominee criteria modified for the D. Wynne Thorne and College Researcher of the Year awards.

Comments & Observations

- Nat Frazer stated that he believes the distinctions between the two awards are clear as they are two different awards for two different things. The D. Wynne Thorne award is a **career** award that spans accomplishments over many years, whereas the Researcher of the Year recognizes accomplishments in a specific time span and should be part of the Robins Awards. Jeff noted that he would like the Researcher of the Year award to mirror what the colleges are trying to accomplish when they select their recipient.
- Consensus from the group is that criteria for the Researcher of the Year award could be revised to reflect the most recent three (3) year productivity of each nominee. If selected, the recipient would then be ineligible for this award for the next 3 years.

7. Other Issues & Upcoming Calendar Events (Brent Miller)

Calendar Events

- March 31st – April 4th, 2008 -- USU Research Week
- March 31st – April 1st, 2008 – Spring Runoff Conference
- April 18, 2008 – Uintah Basin Research Conference, Vernal Ut
- April 19, 2008 – USU Robins Awards
- April 21, 2008 -- International Program Development Reception
- April 24, 2008 – Research Council
- April 25, 2008 – Sunrise Session (7:30 am), Little America Hotel, SLC

Meeting adjourned at 4:30 p.m.

Minutes Submitted By: Teresa Seeholzer, Research Council Secretary