MEMORANDUM

DATE: November 10, 2014

TO: Graduate Students and Faculty working in Water Resources

FROM: Roel Lopez, Interim Director
Texas Water Resources Institute (TWRI)

SUBJECT: Request for Proposals

The Texas Water Resources Institute announces a request for research proposals for its 2015-2016 TWRI grant program. This program is made possible by support from the U.S. Geological Survey and the National Institutes for Water Research. It is aimed at supporting graduate research on water resources at universities in Texas.

TWRI anticipates funding 2 graduate research enhancement grants of up to $5,000 each in the area of water resources. We expect the funds will become available to graduate students in March 2015. Funding amount and availability is pending availability of funds from USGS, who has notified TWRI that congressional funding for this program is uncertain, but anticipated.

- Applications from graduate students at any Texas university doing water resources-related research in Texas are eligible and encouraged. This program can support either ongoing or new studies.
- Graduate students who previously received a TWRI USGS competitive grant are not eligible. Graduate students who previously received a Mills Scholarship are eligible.
- Proposals should strengthen graduate student research and education programs in water resources at a Texas university. This program provides an opportunity for graduate students to prepare, submit and implement a competitive grant.
- **Research Priorities for RFP:** Proposed research can deal with a wide range of water resources topics. But, priority will be given to research addressing the science, technology, policy or socio-economics of:
  - Implementation of State Water Plan Water Management Strategies including agricultural and urban water conservation, development of new surface and groundwater sources, desalination, reuse and aquifer storage and recovery
  - Addressing major water quality impairments in Texas including bacteria, dissolved oxygen and mercury
  - Impacts of endangered species listings on water management in the state
  - Oil and gas industry water use, reuse, and reclamation or disposal of produced water
  - Impacts of climate variability and drought on water resources and adaptation measures
- Proposals on other water-related concerns will also be considered. However, this program generally focuses on non-marine water resources (e.g. waters in rivers, lakes, estuaries, bays, and groundwater systems), and we do not consider proposals dealing with the Gulf of Mexico or ocean concerns. Recently funded projects are shown on the web at [http://twri.tamu.edu/what-we-do/education/scholarships/usgs/](http://twri.tamu.edu/what-we-do/education/scholarships/usgs/).
- Based upon funding availability, TWRI anticipates the grants will cover the period from March 1, 2015 through February 28, 2016. Extensions will not be given.
- **Proposals are due to TWRI by 5:00 p.m. CST on December 12, 2014.** Pending notification from USGS that Congressional funding is available, awards should be announced by TWRI on or before February 2015.
• Proposals should be developed by the graduate student applying for the grant in collaboration with his or her faculty advisor. Priority will be given to students of junior faculty.

• A maximum of $5,000 may be requested, and as much as $2,500 can be used to offset tuition and fees that are not otherwise waived by the university.

• Grant funds may also be used for travel, equipment, lab materials, supplies, analytical devices or services, or other items that improve the quality of the student's research program.

• Grants require a 2:1 match of non-federal:federal funds. Priority will be given to proposals with match exceeding the required 2:1. A letter of commitment signed by an official authorized to commit matching funds must be provided with the proposal.

• The 2:1 match can include the following: salaries, wages, and fringe benefits of faculty advisors and graduate students funded by non-federal dollars; in-kind services and direct funding provided by non-federal sources; equipment or lab use; supplies furnished by student's department; and graduate teaching or research assistantships. Matching funds can also contain indirect costs and the negotiated indirect cost rate may be applied to federal (waived) and non-federal costs as match. Indirect costs used for match cannot be applied to tuition and equipment costs.

• Indirect costs may not be charged to the federal portion as part of the requested funds.

• Students will be required to submit a final report in May 2016. The final report may include the student’s thesis or dissertation or a summary of it, a manuscript suitable for publication as a TWRI technical report, or a journal article. In addition, those receiving funds must work with the TWRI communications team to publicize their results in the form of photo(s) and a story. Acknowledgement must be given to TWRI’s USGS 104b grant program in any resulting publications for efforts partially funded by these funds.

• If the student is unable to complete their project as proposed and approved, the funds will be returned to TWRI and will be allocated to another student.

• Proposals will only be accepted from students’ university office of sponsored programs or grants and contracts office and not directly from individual students or departments. This is to ensure that the institution has approved the proposal and matching requirements.

Application Checklist:

All items due via email to Danielle Kalisek at dmkalisek@tamu.edu by 5:00 PM CST on December 12, 2014. Electronic submissions only. Please do not send hard copies.

A. Basic Information. Basic information is limited to one page, items 1-10 on page 3. (Microsoft Word Document). This can be in the same Word document as item B.

B. Proposal. Proposals are limited to three pages of text. These three pages do not include the citations and references (if any), budget, budget justification, and/or vitaes. Please provide the telephone number, postal address and email address of all project participants in your proposal (Microsoft Word Document). This can be in the same Word document as item A. Page 4 has further specifics.

C. A project budget is required (page 5). A budget form is available (Microsoft Excel Spreadsheet).


E. A 1-page vita for the student and each of the faculty involved (Microsoft Word Document).

F. Matching Funds Letter. Documentation of matching in the form of a signed letter of support from their university showing matching funds are present and have been approved must be emailed to TWRI (example letter provided on page 7) along with the application package by December 12, 2014. Please provide the letter in a scanned PDF or jpg file format. The original hard copy should be retained by the student and may be requested if the student is funded.

If you have any questions, please contact Danielle Kalisek, Texas Water Resources Institute, at dmkalisek@tamu.edu (e-mail) or 979.845.2781 (phone).
Basic Information

Basic Information is limited to 1 page maximum of text. This page must include items #1-10 listed below. Submit the Basic Information via email as a Word document to Danielle Kalisek at dmkalisek@tamu.edu. We will manually enter this into online form.

1. **Title of Proposal**

2. **Focus Category:** Choose only 3 of the following categories that apply to your project with the most preferred focus category first:

   - ACID DEPOSITION;
   - AGRICULTURE;
   - CLIMATOLOGICAL PROCESSES;
   - CONSERVATION;
   - DROUGHT;
   - ECOLOGY;
   - ECONOMICS;
   - EDUCATION;
   - FLOODS;
   - GEOMORPHOLOGICAL PROCESSES;
   - GEOCHEMICAL PROCESSES;
   - GROUNDWATER;
   - HYDROGEOCHEMISTRY;
   - HYDROLOGY;
   - INVASIVE SPECIES;
   - IRRIGATION;
   - LAW, INSTITUTIONS, AND POLICY;
   - MANAGEMENT AND PLANNING;
   - METHODS;
   - MODELS;
   - NITRATE CONTAMINATION;
   - NON POINT POLLUTION;
   - NUTRIENTS;
   - RADIOACTIVE SUBSTANCES;
   - RECREATION;
   - SEDIMENTS;
   - SOLUTE TRANSPORT;
   - SURFACE WATER;
   - TOXIC SUBSTANCES;
   - TREATMENT;
   - WASTEWATER;
   - WATER QUALITY;
   - WATER QUANTITY;
   - WATER SUPPLY;
   - WATER USE;
   - WETLANDS

3. **Keywords:** Enter keywords descriptive of your work.

4. **Duration:** March 1, 2015 through February 28, 2016

5. **Federal Funds Requested:** A maximum of $5,000 may be requested, but graduate students may choose to request less.

6. **Non-Federal (matching) Funds Pledged:** Work with your grants and contracts or office of sponsored research for matching funds. We need a letter signed by someone at your university who can verify that $2 of non-federal funds are being matched by your institution for every $1 you request from these federal funds. This matching fund letter must be submitted electronically along with your application package by the December 12, 2014 deadline.

7. **Principal Investigator (graduate student):** Include the name and contact information (university, department, classification, email, phone number, postal address).

8. **Co-Principal Investigator (faculty advisor):** Include the name and contact information (university, department, title, email, phone number, postal address).

9. **Congressional District(s) where project will occur.**

10. **Abstract.** Please provide a 200 word or less abstract of your proposed research problem, methods and objectives and describe how your research will address RFP research priorities.
Project Proposal

Proposals are limited to 3 pages of text. These 3 pages must include items #11-17 listed below. Investigator’s qualifications (#18) and citations and references (if any) are not included in the 3 page limit. Submit the proposal via email as a Word document to Danielle Kalisek at dmkalisek@tamu.edu. The Basic Information and Project Proposal can be within the same Word document, but must adhere to each’s specific page limitation requirements.

11. Title. Please use the same title as was entered on your Basic Information #1, above.

12. Statement of Critical Regional or State Water Problem. Describe how your research will address RFP research priorities and explain the need for the project, who wants it and why.

13. Statement of results or benefits. Specify the type of information that is to be gained and how it will be used.

14. Nature, Scope and Objectives of the Research, including a timeline of activities. This is the major emphasis of your proposal, but keep it in the 3-page limit.

15. Methods, procedures and facilities. Provide sufficient information to permit evaluation of the technical adequacy of the approach to satisfy the objectives.

16. Related research. Demonstrate through literature and communication citations the similarities and dissimilarities of the proposed project or completed or on-going work on the same topic.

17. Training potential. Estimate the number of graduate and undergraduate students, by degree level, who are expected to receive training in the project.

18. Investigator’s qualifications. Include a one-page resume(s)/vitae of the student and each faculty involved. Do not list more than 15 pertinent publications. Resume(s)/vitae are not included in the proposal page limit.
Budget

A budget is required for each project. A budget form is available in Microsoft Excel. Please submit budget via email (as a Microsoft Excel Spreadsheet) to Danielle Kalisek at dmkalisek@tamu.edu.

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Budget Justification

Submit the complete budget justification including information on federal and non-federal funds via email as a Word document to Danielle Kalisek at dmkalisek@tamu.edu.

A. Salaries and wages. Provide personnel, title/position, estimated hours and rate of compensation for each proposed individual. Specify if personnel are professionals, graduate students, undergraduate students or others.

B. Fringe Benefits. Give fringe benefit rate for each type of personnel paid from this grant. For example at Texas A&M University in College Station, graduate student fringe benefits are 10.3% of salaries plus a fixed cost for medical expenses ($300/month) for each month of employment; for professionals fringe benefits are 18% of salaries plus a fixed cost for medical expenses ($647/month) for each month of employment.

C. Tuition. Indicate the tuition/fee rate, hours and student status (graduate or undergraduate). Up to $2,500 may be requested to offset tuition and fees that are not otherwise waived by the university.

D. Supplies. List all supplies needed to conduct and disseminate research; for example, computer software, lab glassware, fuel for research vehicles, computer expendables, reagents, chemical supplies for poster sessions, etc. Provide a breakdown of supplies by category, as needed: office, laboratory, computing and field supplies.

E. Equipment. Identify non-expendable personal property having a useful life of more than one year and an acquisition cost of more than $5,000 per unit.

F. Services or Consultants. Identify specific tasks for which these services, consultants or subcontracts would be used. Provide a detailed breakdown of services or consultants to include personnel, time, salary, supplies, travel, etc.

G. Travel. List traveler(s), destination, purpose of trip, number of days, mode of transport and approximate cost for each trip. (This includes hotel [lodging] meals [per diem], vehicle mileage, rental cars, airfare, incidental costs; whatever is applicable.) Travel paid for by this grant must occur between the grant period of March 1, 2015 – February 28, 2016.

H. Other direct costs. Itemized costs not included elsewhere. Please provide a breakdown for costs under this category.
   1. Publications costs. Funds to cover costs of printing of technical reports, page charges for reprints of papers in referred journals published as a result of research conducted under this grant.
   2. Other costs. Analytical services, data processing costs, etc.

G. Indirect costs (to be applied to 2:1 match). Please furnish the indirect cost rate for facilities and administration approved by your institution. This information can be obtained from the Sponsored Research Office or Office of Contracts and Grants. Remember, indirect costs cannot be charged to the federal portion of the grant as part of your requested funds, but you may use indirect costs for your match and apply it to both the federal and non-federal (match) costs. Indirect costs used for match cannot be applied to tuition and equipment costs.
Matching Funds Letter

Email (dmkalisek@tamu.edu) to TWRI by December 12, 2014 the signed, scanned letter of support from your university showing matching funds are present and have been approved. PDF or JPG file format. The original hard copy should be retained in case it’s requested at a later date.

DATE

Dr. Roel Lopez
Texas Water Resources Institute
2118 TAMU
College Station, TX 77843-2118

Dear Dr. Lopez,

This letter of commitment applies to the proposal, “Management of Produced Water in Oil & Gas Operations: Produced Water Reuse in Field Demonstrations of Natural Habitat Restoration” to be submitted to the U.S. Geological Survey.

The Texas A&M University Department of Wildlife and Fisheries Science supports the efforts of this project. This letter serves to commit one month of time ($8,148) plus fringe benefits ($1,887) for the next year for Dr. Jane Doe’s participation. In addition, the proposal includes $5,413 of waived indirect costs on federal and non-federal funds.

Sincerely,

Jack Smith
Department Head