

FISP Meeting Minutes

March 19, 2012, NCTC, Shepherdstown, WV

This meeting was held at the National Conservation Training Center to prior to the CUAHSI workshop on hydroacoustics for sediment measurement (<http://www.cuahsi.org/ws-hydroacoustics.html>).

Members Present:

Roger Kuhnle (USDA-ARS, chair)
Mark Landers (USGS, chief)
John Gray (USGS)
Rob Hildale (Reclamation, vice-chair and secretary)

Members via teleconference:

Dan Cenderelli (USDA-FS)

Visitors Present:

Joe Schubauer-Berigan (USEPA)
Myron Brooks (HIF)
Matt Romkins (USDA-ARS)

Visitor via teleconference:

Jim Selegan (USACE)

1. Introduction, announcements, review agenda (Kuhnle)
 - No web-ex available for this meeting. No participation by funded partners.
 - Those not present participating via teleconference
 - Roger announced that the chair will rotate on the calendar year, not the FY.
2. Approve minutes of previous meeting (Kuhnle)
 - Minutes from Fall 2011 were approved as is. They will be posted on the TC website (<http://water.usgs.gov/fisp/>).
3. Report on FISP Budget (Landers)
 - Mark handed out copy of budget (attached to this document) and ran through the items.
 - Roger is pursuing 2011 funding, money left ARS hands but never received by FISP
 - USGS proposed to contribute \$125k but final contribution was only \$120k
 - Truck is the only equipment owned by FISP (aside from sampler archive)
 - Joe is working on EPA funding. Perhaps Watershed Management, in the
 - Office of Water is the most appropriate to look to for funding. He will also check to see if ORD may be able to contribute? \$79k has been earmarked for contract research
 - Only WA-WSC has been funded as of the meeting
 - \$8k held over for WI-WSC (Selbig) for DISA research

4. FISP MOU (Gray)
 - Old MOU lapsed in 2006
 - **ACTION ITEM** – John and Roger to revise current MOU
 - Shorten significantly, do not include obligations for financial contribution
 - List most details in a TC “Terms of Reference” as non-binding items
 - Include brief history of FISP
 - **ACTION ITEM** – Roger, Rob, Dan to determine a funding mechanism for future contributions to FISP and how the new MOU can be used to accomplish that
 - Roger says ARS no longer uses MOUs, he’ll have to change the title of the document.
5. Update on FISP Chief visit to ADCP/ADVM manufacturers, San Diego (Landers)
 - Mark provided handout with Q&A notes from the meeting
 - FISP and sediment community are looking for generalized, accurate acoustic methods to measure sediment
 - Met with T-RDI, SonTek, and Rowe Technologies
 - Rowe is a start-up and are about a year out from production
 - They’re developing a narrow band device
 - Did not meet with Nortek
 - Discussed Sediment Acoustics Leadership Team (SALT)
 - SALT members and charter attached at end of document
 - Discussed hydroacoustics forum – OSW
 - Will send invitation to committee members
 - Perhaps use sharepoint site for information/data?
6. Update/Results of workshop with FISP, USGS, and Sequoia Scientific (Landers)
 - Discussion turned to the FISP approval of LISST technology
 - Is the LISST ready for approval with caveats? Range of concentrations and particle sizes and only available for volumetric concentrations. No mass concentrations without physical samples and a density.
 - **ACTION ITEM** – Mark to provide a write-up that will be a draft LISST acceptance document/memo (by May 30). This document to be reviewed by:
 - TC members
 - Sequoia Scientific
 - Optical Sensors Workgroup
7. Update: Efficiency of FISP bag samplers (Landers)
 - Sub-isokinetic sampling problem raised by Topping (USGS report to be released upon completion of final edits).
 - Need to determine why this occurs
 - **ACTION ITEM** – John and Mark to hash out parameter codes for field testing so that USGS practitioners can enter isokinetic information

8. Discussion: USGS Professional Paper 1774, “Field Evaluation of Error Arising from Inadequate Time Averaging in the Standard Use of Depth-Integrating Suspended-Load Sediment Samplers”
 - Tried to call Topping and Melis – no luck
 - Tabled discussion
9. Report on HIF’s FISP activities, sales (Brooks)
 - Total sales \$71,383 (sales frequently pick up toward end of year).
 - HIF awaiting guidance on carrying inventory of the P-6
 - Does HIF have P-6 drawings? Did Wayne ever release them?
 - Mark would like to see additional side-by-side testing of P-6 prior to making it available
 - Jim S. and Thad P. will be collecting suspended-sediment data in July; they graciously offered to do side-by-side testing of the P-6
 - Mark brought up the lack of a formal agreement between HIF and FISP.
 - Is existing verbal agreement regarding rental/sales sufficient
 - **ACTION ITEM** – Mark and Myron should discuss this and perhaps draft a memo to document the partnership between FISP and HIF that explains the formal relationship and how business is carried out between these two organizations
 - Maybe place in “terms of reference”?
 - To be reviewed by TC in the fall
 -
10. Update on current and recent FISP projects (Landers)
 - Funded partners did not participate in this section because funds haven’t been received by anybody but WA-WSC
 - No funds to IL-WSC
 - Paperwork started for ID-WSC
11. Status of sediment hydroacoustics report from Wright and Topping (Gray)
 - Wright and Topping were to “report on methodologies for using hydroacoustics for measuring suspended sediment”. They also promised to put on a symposium.
 - To be completed by late spring/early summer per email from Topping last month.
 - FISP can file this as a lettered report, but there is a precedence for co-publishing it as a USGS report (to be resolved by the USGS)
12. Perspectives on FISP membership (Gray)
 - **ACTION ITEM** – Mark to follow up with Craig Goodwin regarding March 6 e-mail regarding Goodwin’s inability to participate. They have been contributing funds, however we need a BLM representative.
 - **ACTION ITEM** – Jim to share minutes with Jerry Web and request that the USACE begin annual contributions again.
 - FISP is looking for advice from Joe S.-B. on who to contact from EPA to solicit participation
 - Need to look toward EPA-OSW. ORD less likely, no money

- John thinking that Mary Riley should talk with a higher level EPA manager regarding FISP participation and support
- **ACTION ITEM** – Joe will contact Mary Reiley (OW) and Jennifer Orme-Zevaleta (ORD) to determine who FISP or higher level USGS should talk to about EPA's participation in FISP.
- **ACTION ITEM** – John to work on TVA for participation through Mike Eiffe, TVA.
- **ACTION ITEM** – Rob to pursue NOAA – Fisheries for participation Try Tim Beechie and George Pess as first contacts).
- **ACTION ITEM** – John to get the USGS labs to obtain consensus/provide education on how to handle and prepare bag samples for transport to sediment labs

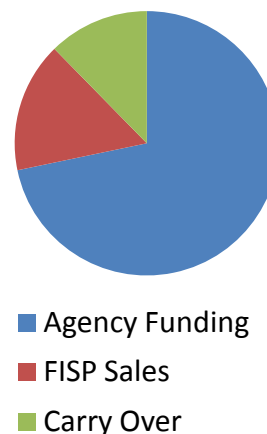
13. Arrangements for next meeting

- Decided on a 2-day meeting, Oct. 16 and 17, 2012
 - Considering Lakewood or Ft. Collins, CO so Dan can attend
 - Perhaps Washington DC to get EPA and perhaps NOAA to participate

Draft Budgeted FY 2012 Funding:

Budgeted Income Source	Budgeted Income	
Carry Over	\$32,494	
US Bur Rec Carry Over	\$24,000	see note
US Bureau of Reclamation	\$0	
US Bureau of Land Management	\$15,000	
USACE	?	
USDA Forest Service	\$15,000	
ARS	\$15,000	
USGS	\$120,000	
FISP-HIF Sales 25%: Oct-Mar	\$21,000	
FISP-HIF Sales 25%: Apr-Sep	\$21,000	
Total	\$263,494	

FISP FY12 Funding



Note: US Bur Rec may be \$19,000 if contract to Ole Miss/ NCPA does not clear before Sept 30; but these dollars have been expended either way.

Expenses: Budgetd and Actual

Budgeted Expense Category	Budgeted Expense	
Salary	\$ 135,000	\$ 67,500
Overhead (USGS 12 pct)	\$ 8,100	
Travel	\$ 15,000	
Conferences and Exhibits	\$ 2,100	
Supplies and Equipment	\$ 1,000	
Vehicles (Fuel and maintenance)	\$ 1,200	
Shipping and Communication	\$ 1,500	
In-house research	\$ 20,594	
Contract research	\$ 79,000	\$ 28,000
	\$263,494	
	\$0	

FISP FY12 Funding



percent

Agency Fundir	\$189,000	71.7283885
FISP Sales	\$42,000	15.9396419
Carry Over	\$32,494	12.3319696
		100

note: \$53K through June 15 (about) total sales -- so addl \$12K
\$ 13,095

Salary	\$135,000
Contract Rese	\$79,000
Travel	\$15,000
Equipment	\$1,000.00
In-house Rese	\$20,594.00
Other	\$12,900.00
	\$263,494.00

Charter for Sediment Acoustic Leadership Team U.S. Geological Survey, Office of Surface Water

Introduction

Methods are rapidly advancing to estimate sediment characteristics in aquatic systems using acoustic metrics. The advantages of hydroacoustic metrics as surrogates of suspended sediment include greater accuracy due to high temporal resolution, a large sample volume, environmental robustness, a technology that is now ubiquitous in streamflow monitoring, and simultaneous velocity measurement. In tested fluvial, estuarine, and marine systems, this approach is effective for continuous monitoring of suspended-sediment concentrations. It also may be effective for estimating particle-size categories, bedload transport, and bed-material composition. However, best methods have not been determined for measuring acoustic attenuation and adjusted backscatter amplitude and for computing suspended sediment concentration and other sediment characteristics.

The Office of Surface Water (OSW) recognizes the need to provide training and to develop standardized techniques and practices, which do not currently exist (May 2012). In order to provide assistance to meet this need, the Sediment Acoustic Leadership Team (SALT) is established by the OSW to develop technical guidance and training for using acoustic metrics to monitor aquatic sediment. The SALT purpose, member composition, tenure, functions, authorities, and duties are described in this document. The SALT is patterned after, and will operate with consultation from the OSW Hydroacoustics Workgroup (HaWG), and will closely coordinate with the Office of Water Quality (OWQ) Continuous Water Quality Committee (CWQC).

Purpose

The SALT provides assistance and guidance to the OSW regarding all aspects of the development and use of hydroacoustic instrumentation for monitoring characteristics of aquatic sediment, with a focus on fluvial environments. The purposes of the SALT are to:

- Provide a focal point for research and monitoring aquatic sediment using hydroacoustics.
- Assist in the development and application of new methods;
- Provide advice and direction regarding
 - technical issues,
 - instrument development needs,
 - ancillary tool needs,
 - testing, and
 - training;
- Provide advice on work and funding priorities;
- Serve as a developing and reviewing body for draft policies, reports, and similar documents; and
- Facilitate communication within USGS between OSW, OWQ, the CWQC, and NWIS on subjects relevant to sediment monitoring using acoustics

- Facilitate communication between the USGS, Sediment-Acoustic users, other federal agencies, the research community, and vendors.

Functions

In order for the SALT to accomplish its purpose, SALT members are expected to:

- Participate in conference calls;
- Participate in and address questions on the SALT Forum;
- Identify, review, prioritize, and participate in developing the essential research and methods development needed to provide generalized guidance for methods;
- Report to OSW on progress, issues, and their relative importance;
- Review and recommend specific training on sediment hydroacoustics;
- Plan, prepare, conduct, and evaluate user training as needed and funded;
- Organize and conduct sediment hydroacoustic presentations at conferences and meetings;
- Encourage use of sediment-hydroacoustic technology where appropriate;
- Assist in the preparation and review draft policy memoranda;
- Recommend technology or methods-development investments to OSW;
- Communicate and coordinate with the HaWG and other user groups; and
- Provide an interface between users, HaWG, and OSW;

All members of the SALT are encouraged to communicate with the OSW Chief and/or OSW-supported SALT and HaWG members regarding accomplishments and concerns in the area of sediment hydroacoustics within the USGS. Also, SALT members are encouraged to facilitate communication with OWQ and specifically the CWQC.

Approach

The SALT will hold conference calls every 2 months to discuss items of interest, review progress on various tasks, and discuss current and proposed policy. In-person meetings may be held, funding permitting. Ideally, one face-to-face meeting will be held every 18 months either as a separate gathering or in conjunction with a workshop or conference. The SALT will attempt to reach decisions by consensus; when consensus is not possible, a simple majority will suffice.

Composition

SALT members represent those active in developing, using, and/or guiding acoustic sediment surrogate instrumentation and methods. Membership should represent a cross section of experts from USGS disciplines, other federal agencies, and other members as invited. Participation on the SALT is voluntary. Members may be added to the group, if the OSW believes their participation is beneficial to the group, regardless of their location or affiliation. Nominations, including self-nominations are welcomed. Total USGS membership should not exceed 12, including members supported by the OSW. The HaWG should have at least one representative on the SALT.

Membership terms for all SALT members except those supported by the OSW shall be for a period of three years, but may be extended upon agreement between the member and the OSW.

Membership may be extended at the discretion of the OSW when such extension serves the needs of the SALT.

Leadership

The Chairperson will initially be selected by OSW, and SALT members will select a vice-chairperson. The chairpersons may be re-elected as long as they are members of the SALT. It is suggested that at least one non-OSW person should be chair/co-chair.

Chairperson Duties

The Chairperson gets input and feedback from the SALT regarding topics of interests and establishes an agenda prior to each meeting. The Chairperson facilitates the meeting and leads the SALT through each of the agenda items.

Minutes

The chair shall make sure that someone at the meeting or on the conference call records minutes with special emphasis on recording decisions and action items. The minutes, including decisions and action items, should be sent to the SALT members for approval and shared with the HaWG chair and OSW Chief after approval.

Facilitator

In the event that the chairpersons cannot attend a scheduled meeting or conference call, the chairperson shall appoint another SALT member to serve as facilitator for that meeting. SALT activities and minutes will be available on the OSW or FISP public Web page.

Authority and Funding

The SALT is sponsored by and reports to the OSW. SALT participation is voluntary and no salary is expected to be funded by the OSW, except where a specific and significant task has been assigned and agreed to by a member of the SALT. For example, funding may be provided for specific tasks such as the development of training classes and materials, and for writing and publication of key guidance or policy documents.