

Date: September 19, 2000
To: C. Brandt
From: D.R. Geist
Subject: SAFETY PLAN FOR RIVER WORK; SNAKE RIVER SEDIMENT PERMEABILITY STUDY; IDAHO POWER COMPANY – PROJECT 28918

Attached is a current copy of the safety issues identified for the Idaho Power Company (IPC) Snake River Sediment Permeability Project. The issues that are identified below are covered in the appropriate sections of the Environmental Safety and Health (ES&H) Management System and Standards-Based Management Systems (SBMS) subject areas that cover vehicle safety, boating, and working with cryogenics. A separate work plan has been developed for collecting freeze cores, operating the jackhammer and installing piezometers. The work plan is attached.

Three Battelle staff and one AWU staff will be conducting the field work associated with this project; the Battelle staff include Tim Hanrahan, Evan Arntzen, and myself while the AWU staff is Darren Thornhill. We will depart Richland on September 26 and plan on returning either the night of September 30 or the morning of October 1. On September 26, 27, and 28 we will be operating out of Kirby Creek Lodge which is owned by Mike and Jody Luther of Snake River Adventures (Lewiston office ph. 208-746-6276). They have a satellite phone at Kirby Creek and in the event of an emergency, we can be contacted there (888-875-1579; note that this number should only be used for emergencies). On the evening of 9/29 and 9/30 (tentative) we will be staying in Lewiston Idaho at the Red Lion (208-799-1000).

We will be working in remote locations within the Hells Canyon Reach of the Snake River. The nearest town, Riggins, Idaho, is approximately 30 miles away. As such, we will not have ready access to emergency services, should the need arise. However, in addition to the satellite phone at Kirby Creek, Idaho Power Company staff have established procedures to contact the US Forest Service in the event of an emergency. Our contacts at IPC are Jim Chandler (ph. 208-388-2974) and Phil Groves (ph. 208-388-2597).

I will discuss all safety concerns with staff prior to performing work on this project. We will follow the safety guidelines, work safely, and report needed changes in the subject areas as required by the work and/or conditions at work sites. We will sign the review sheets that are included in the subject area checklist. The signed sheets are in the project office (Sigma V, Rm 2623). Copies of the signed sheets will be available for the individual Ecology safety files.

cc: P. Wright

Distribution:
D. R. Geist, file
D. Thornhill
E. V. Arntzen
T. P. Hanrahan

Field Work Safety Considerations

Codes, Standards, and Regulations:

Governing documents include:

1. DOE orders 440.1, Worker Protection; 5438.1, Occupational Safety and Health program for Government-owned contractor-operated Facilities.
2. Occupational Safety & Health Act (OSHA)
3. Washington Industrial Safety & Health Act (WISHA)
4. PNNL Integrated ES&H Management System and SBMS Subject Areas

Project 28918- Field Work Safety Considerations

Signature Page

Read the appropriate subject areas under the Subject Based Management System (SBMS) and indicate understanding by signing and dating the appropriate lines on this page. Find the SBMS by opening an internet browser and navigating to the PNNL Home Page. On the left side of the screen scroll down until you see the button for "Policies and Procedures (SBMS)". Once this page appears, click on "Subject Areas > Categories," then on the next page select "Environmental, Safety, and Health." Use the table of contents to find the appropriate subject area. Non-SBMS documents are attached to this list.

Safety Consideration	SBMS Subject Area	Signature/Initial	Date
Vehicle safety	Operating vehicles for business purposes		
Water safety	Boat operations		
Personal safety	Noise		
	Personal protective clothing and equipment (covers cryogens)		
	Occupational illness or injury		
	Working alone		
	First aid and medical assistance		
	Chemicals, Working with		
Equipment operation	Jackhammer operation (not in SBMS)		
	Work plan for installing piezometers (attached)		
	Work plan for freeze coring (attached)		

FOR ALL EMERGENCIES FIRST call 911

For non-emergency events:

Clarkston Police Department (509) 758-2331

Lewiston Police Department (208) 799-5151

Tri-State Memorial Hospital in Clarkston, 1221 Highland Avenue, (509) 758-4650

St. Joseph Medical Center in Lewiston, 4th Avenue and Sixth, (208) 743-2511

Charlie Brandt, Technical Group Leader: (509) 376-5345

David Geist, Project Leader: (509) 372-0590 Home: (509) 582-4829

Cellular Phone Number for Geist: (509) 539-3451

Cellular Phone Number for Arntzen: (509) 539-3457

Cellular Phone Number for Hanrahan: (509) 521-7116

Operating Jackhammer

TASK	CONSIDERATION	SAFETY RULE & SAFE PRACTICES
Operating jackhammer or other pounding instrument to install piezometers	Hearing, eye and limb injuries from pinching, impact, or loose air hose.	Wear ear and eye protection at all times when operating jack hammer or other pounding instrument. Wear gloves and good working shoes. Maintain good hose connections and hose. Wear life jacket when working over the water. Do not attach anything to yourself should you fall in. Have throw ring available
	Fall into water when installing mid channel piezometers	

Working with liquid nitrogen

Task	Consideration	Safety Rule and Safe Practices
Transferring liquid nitrogen between containers and/or freeze tubes	Exposure to skin and eyes	Wear safety goggles and face shield at all times while working with or near liquid nitrogen. Wear insulated gloves over long-sleeved jacket and/or shirt. Never touch any frozen material (e.g., pipes, funnels, valves) without first protecting the skin with insulated gloves. Open pressure release valve and fully vent the dewar before removing the liquid withdrawal device from the dewar. Leave liquid withdrawal device safety leash connected to dewar until pressure is sufficiently reduced.
	Pressure build-up in dewar	

Task	Consideration	Safety Rule and Safe Practices
General safety		<p data-bbox="1024 263 1395 440">Avoid clothing arrangements (e.g., glove tops, shoe tops) that could catch liquid nitrogen if it spills.</p> <p data-bbox="1024 486 1395 736">If liquid nitrogen comes in contact with your skin, immediately shake/brush it off to prevent freeze-burn. If necessary, wash the liquid nitrogen off with COLD water.</p> <p data-bbox="1024 782 1395 889">If you get freeze-burn, seek medical treatment – it is just as serious as a heat burn.</p>
