



WASHINGTON STATE DEPARTMENT OF
Natural Resources
Peter Goldmark - Commissioner of Public Lands

STATE OF WASHINGTON
DEPARTMENT OF NATURAL RESOURCES
PETER GOLDMARK, Commissioner of Public Lands

MEMORANDUM OF UNDERSTANDING

MOU No. 92-091209

This Memorandum of Understanding (MOU) is between the State of Washington, acting through its Department of Natural Resources, referred to as DNR, and the State of Washington, acting through its Department of Transportation, referred to as WSDOT.

The DNR is entering into this Agreement under authority of Chapter 39.34 RCW of Washington State, Interlocal Cooperation Act.

The DNR is the steward of 2.6 million acres of state-owned aquatic lands. DNR manages the aquatic lands beneath Puget Sound, the coast, navigable rivers and lakes to encourage direct public use and access, foster water dependent uses, ensure environmental protection, and to utilize renewable resources.

The WSDOT is responsible to keep people and business moving by operating and improving the state's transportation system vital to our taxpayers and communities. A key institutional linkage between DNR and WSDOT is a mandate to ensure environmental protection.

This MOU formally recognizes the connection between marine and freshwater sediment test drilling and State Owned Aquatic Lands habitat function, and it increases coordination between the DNR aquatic lands leasing and WSDOT Geotechnical Services Division programs. This MOU defines a streamlined process for DNR to authorize WSDOT access to state-owned aquatic land for the purposes of temporarily installing test drilling equipment and collecting geotechnical survey data. This increased coordination and streamlined process will result in better environmental protection of State Owned Aquatic Lands at a cost savings to the state.

We agree to the provisions and statements outlined below.

1.01 Definitions.

DNR – an agency of the state of Washington

WSDOT – an agency of the state of Washington

Memorandum of Understanding - The DNR and WSDOT enter into this memorandum of understanding, in good faith, to collaborate on and/or coordinate programs, and to define institutional linkages along broad areas of concern. Memoranda of understanding are not legal contracts and do not strictly obligate the resources of the Department.

Drilling operations may consist of several different types of drilling methods and equipment such as portable aluminum pontoon barge with a skid mounted drill. The ultimate goal is to collect geotechnical data necessary to determine the sub-surface composition for the purpose of structure and roadway design. This memorandum of understanding applies only to work that is conducted consistent with the activities described in Exhibit A. Any work proposed to be conducted on State Owned Aquatic Lands that is outside of the activities described in Exhibit A will require the submission of a completed application for use authorization and possibly a separate use authorization before access to State Owned Aquatic Lands is granted.

Access to State Owned Aquatic Lands – After satisfying all the procedural requirements triggered by this type of work and securing all other applicable federal, state and local permits, and receiving written confirmation that no conflicts exist with aquatic habitats, sediment contamination, navigation and public access, or any prior rights granted on State Owned Aquatic Lands at a proposed drilling site, WSDOT is granted access to State Owned Aquatic Lands for the purpose of temporarily installing marine and freshwater sediment test drilling equipment to collect geotechnical data. In authorizing access to WSDOT for this specific purpose, DNR conveys no rights in property. Access to State Owned Aquatic Lands may be revoked by DNR with thirty (30) day notice to WSDOT.

2.01 Objectives.

- Create a formal cooperative agreement between DNR and WSDOT that encourages joint planning and operations in support of the WSDOT's Field Exploration Unit.
- Create a streamlined process to grant WSDOT access to State Owned Aquatic Lands for the purpose of installing marine or freshwater sediment test drilling equipment and collecting geotechnical data while ensuring environmental protection of State Owned Aquatic Lands.
- Build collaboration between DNR and WSDOT that will establish a forum for communication regarding geotechnical surveys.

3.01 Work Activities.

See Attachment A

4.01 Functions/Roles/Tasks of Agencies/Parties.

DNR shall:

- Review WSDOT proposed sediment test drilling work descriptions and locations for potential conflicts on State Owned Aquatic Lands and consistency with activities described in Exhibit A.
- Provide written notification to WSDOT granting or denying access to State Owned Aquatic Lands for temporarily installing marine and freshwater sediment test drilling equipment to collect geotechnical. Written notification will be provided to WSDOT via email or fax, within fifteen (15) working days of receipt of notice of any proposed work. Written DNR approval does not exempt WSDOT from regulatory permits.
- Maintain communication with WSDOT regarding marine and freshwater sediment test drilling results on State Owned Aquatic Lands.

WSDOT shall:

- Contact DNR at least thirty (30) days before installing drilling devices with a description and anticipated duration of the proposed work and a description of the location in the form of a vicinity map depicting Section, Township, Range and accompanying GPS coordinates. WSDOT will not proceed with the proposed work until receiving written confirmation from the DNR project coordinator that there are no conflicts after and obtaining and fulfilling all other local, state, and federal permits and permit requirements.
- Maintain communication with DNR regarding marine and freshwater sediment test drilling results and implications to potential management activities on State Owned Aquatic Lands.
- Upon request, provide to DNR all sediment quality results and any other data, results, conclusions or findings WSDOT obtains from any of the work completed under this MOU.

5.01 Terms and Conditions.

- (1) Effective Dates. This MOU is effective between May 1, 2014 and May 1, 2019. This agreement will be reviewed every two years.
- (2) Amendments. This MOU shall be amended only by written mutual consent of the

- (2) Amendments. This MOU shall be amended only by written mutual consent of the parties.
- (3) Termination. Either party may terminate this MOU by notifying the other party, at the addresses given, of the termination and specifying the termination date. The terminating party shall deliver the notice at least fifteen (15) days prior to the termination date.

6.01 Project Coordinators.

- (1) The Project Coordinator for the DNR is Linda Farr, Telephone Number (360) 902-1065.
- (2) The Project Manager for the WSDOT is Cyndi Booze, Property & Acquisition Specialist, Telephone Number (360) 705-7377.

STATE OF WASHINGTON
DEPARTMENT OF TRANSPORTATION

Dated: 5-19, 2014

By: [Signature]

Title: Acquisition Prog. Mgr

Address: PO Box 47338, Olympia
WA 98504

Phone: 360-705-7312

STATE OF WASHINGTON
DEPARTMENT OF NATURAL RESOURCES

Dated: 5/21, 2014

By: [Signature]

Title: AQR Division Manager

Address: PO Box 47027, Olympia
WA 98504-7027

WORK ACTIVITIES

Habitat Stewardship Measures and Best Management Practices:

- (1) Species work windows will be used for the timing of any in-water construction and operational activities. This includes protection of forage fish, forage fish spawn, and associated spawning areas, as applicable.
- (2) Avoid impacts to aquatic vegetation and fish spawning habitat/vulnerable life history stages. WSDOT will avoid drilling in Puget Sound eelgrass beds.
 - (i) Fuels and other toxic materials must be stored in a location where they do not pose a risk of contaminating intertidal or nearshore areas.
 1. Maintaining pumps, boat motors, and other equipment in good condition, without leaks.
 2. Storing equipment free of fuel or in secure containment areas where any accidental leaks will be contained.
 3. Containing and cleaning up spills of fuels or other fluids without delay. Absorbent materials must be available onsite for this purpose.
 4. Removing broken-down vehicles promptly from beaches and intertidal areas.
- (3) Floating structures and boats must not rest on the substrate. Boat moorage systems must be deployed in a manner that prevents dragging of the vessel or line. NOTE: When drilling location is in a confirmed forage fish spawning beach area, either use of the portable or large barge method is required for sediment test drilling and geotechnical surveys. However, deployment needs to be from a designated boat launch or beach void of suitable forage fish spawning habitat. Only in areas where successful avoidance of forage fish, their spawn and associated spawning areas is achieved, can other methods be deployed (i.e., truck or track mounted drill).

After satisfying all requirements triggered by this type of work, the WSDOT project coordinator will provide a description and anticipated duration of the proposed work and a description of the location in the form of a vicinity map depicting Section, Township, Range and accompanying GPS coordinates to the DNR project coordinator. The DNR project coordinator will review these proposals for potential conflicts on State Owned Aquatic Lands and provide written notification to the WSDOT project coordinator within 15 days granting access to State Owned Aquatic Lands for the sole purpose of conducting marine and freshwater sediment testing activities. WSDOT projects the length of time at each location to be approximately 1-60 days.

Marine and freshwater sediment test drilling and geotechnical surveys are necessary to determine the sub-surface composition for the purpose of structure and roadway design, hazardous materials detection, and other information necessary in the design roadway structures such as bridges.

WSDOT sampling procedure is as follows:

A 4 inch casing is sealed into the lake or river bottom. The test boring is advanced through that casing with a 3 inch casing. At every 5 foot interval a split spoon sampler is lowered on a 2 1/4 inch rod through the 3 inch casing to the bottom of the hole for taking soil samples. This process is repeated to the required depth of the soil investigation.

TRUCK MOUNTED DRILL

The truck mounted drill will access boring locations that are on relatively flat, easy to access sites. Each drill will have a support truck for water, tooling, and other required supplies.

TRACK MOUNTED DRILL

The track mounted drill is a low ground pressure (2.5 pounds per square inch rubber and steel track vehicle). It is used to access soft ground areas and sites with uneven or rough terrain. Each drill will have a support truck for water, tooling, and other required supplies.

PORTABLE BARGE

The Portable Barge is used when access is needed to an area within the waterbody where none of the above methods will work. It consists of hauling transportable pontoons to the vicinity by trailer and setting them into the water with a boom truck for assembly into a barge. Drills and support equipment are placed on the barge and moved into position for the drilling operation. The barge is held in place by four anchors.

For operations in deep water, a truck mounted drill is placed on a large barge rented. Tug boats are used to maneuver the barge.

CONE PENETROMETER TEST TRUCK

The Cone Penetrometer test truck is used to send sound waves into the ground to determine the density of material underground. It uses an electronic instrumented cone assembly, hollow core sounding rods, a 20 ton hydraulic thrust frame, and a computer data acquisition/processing system to perform the analysis. This is a self-contained unit mounted on a truck. The system can be used from a barge for testing when there is deep soft sediment.