WES ONSITE PROGRAM
WINTER RECHECK REQUEST PROCESS
FOR OWNERS OF SINGLE-FAMILY RESIDENTIAL PROPERTY

EFFECTIVE WINTER 2012-2013

Effective winter 2012-2013 and thereafter, when a Water Environment Service (WES) Soils Program letter indicates an owner may apply for a Winter Recheck Request because of inconclusive data on water levels and the owner wishes to pursue this option, the procedure is as follows:

Process Steps

- Retain an Oregon-licensed professional (Waste Water Specialist, Registered Environmental Health Specialist, Registered Geologist, or Professional Engineer) familiar with Oregon onsite rules and technology to develop a monitoring well plan in concert with soil scientists at Clackamas County WES.
- The plan should include a brief narrative, a copy of the WES Field Sheet and a Plot Plan drawn to scale that conforms to WES Field Sheet details with north arrow and dimensions to the property lines. Reference the WES File No. and provide location and contact information. The location, number and proposed depth of monitoring wells should be shown. On almost all sites, more than two wells of various lengths will be required to evaluate a proposed drainfield or repair area. There is no fee for a preliminary WES plan review.
- The effectiveness of Ground Water Interceptors (GWIs) and proposed Tile Dewatering drainfields may also require demonstration via a monitoring well program.
- After WES completes a plan review, install vertical, hand-dug monitoring wells in each location in accordance with the plan and submit the Winter Recheck Request form and as-built Plot Plan to WES Soils by December 1st. Winter Recheck Requests received after December 1st may not be accepted. There is a $530.00 fee due per lot (includes drainfield and repair area).
- Withdrawn Winter Recheck Site Evaluation applications submitted prior to WES field work are eligible for an 80% refund. No refunds are available after WES field work is initiated.
- The Owner must dig the wells him/herself and retain a registered Oregon Waste Water Specialist, qualified Registered Environmental Health Specialist, Registered Geologist or Professional Engineer to conduct field measurements. WES soils staff will not observe or report on monitoring well installation.
- WES staff will prepare a final site evaluation letter after receiving the signed consultant transmittal report with the completed seasonal water level measurements and interpreted results.

Construction Information

- Do not place monitoring wells in previous machine-dug test pits, as that is a violation of State law without a Landowner Permit from OWRD. Place two monitoring wells within approximately 25 feet and

at the same elevation as test pits, bracketing the area you would like to have approved for septic construction. More than two monitoring wells of varying depth will be required in order to understand the ground water regime. The additional wells should be placed in close proximity to the wells near the test pits.

- Monitoring wells must be constructed of white, 1 1/4-in. to 2-in. diameter PVC, schedule 40 unless otherwise preapproved by WES Soils. Single sections of smooth wall pipe without a collar are required. Screened intervals should be constructed by cutting thin slots on opposite sides of the pipe such that approximately 1/3 of the pipe diameter remains solid (a conventional shop saw blade is adequate). Slots should be closely spaced, approximately 1/8-in. to ¼-in. apart over a 4- to 6-inch interval.
- All slotted intervals of monitoring wells should be completely wrapped with conventional window screen material that is tightly secured by using a glue gun, epoxy or other non-water soluble glue to minimize the entry of soil particles. The bottom of the pipe should similarly be screened; it is important that bottom end caps not be used. An example of a typical monitoring well pipe is kept at the Soils Counter for illustration purposes.
- After placing and centering the monitoring well in the hole, all screened intervals should be backfilled with pea gravel to a height of 6-in. above the screened interval. All non-screened intervals should be backfilled with pelletized bentonite that is subsequently moistened. Extend the uppermost bentonite seal above ground to a height of about four-inches around the pipe and mound native soil over the bentonite sufficient to prevent surface water entry.
- An array of shallow monitoring wells of various depths provides the most conclusive demonstration of water table depths and in distinguishing between temporary and permanent water table conditions and sources. Where shallow restrictive layers are present, at least one monitoring well should be bottomed above and another below the restrictive layer. No monitoring wells should be less than 24-inches below ground surface and no screened intervals should be present in the upper 18-inches of any monitoring well.
- Proper construction, in particular, sealing the screened well intervals is critical to obtain useful information and to prevent possible contamination of ground water.
- Proposed depths should reflect test pit information and all feasible dispersal options. On sites where the high water table is judged to be questionably present within 72-inches of the ground surface, two planned monitoring wells should extend 7 feet (84-inches) below ground, if practical. No monitoring wells should be placed deeper than 84-inches below grade. All monitoring wells should have a riser extending a minimum 24 inches above grade.

WES ONSITE PROGRAM
WINTER RECHECK REQUEST PROCESS
FOR OWNERS OF SINGLE-FAMILY RESIDENTIAL PROPERTY

EFFECTIVE WINTER 2012-2013

- Do not place monitoring wells in a landscape position that would allow surface runoff to enter the well. Be sure the riser is at least 12-inches above the ordinary high water level of any nearby perennial stream and that a non-screw cap with a small air vent is on top of the riser. If there is a concern with vandalism, secure the cap with a bolt and padlock and provide WES with a spare key.
- Number each riser with an indelible marker or etched mark that corresponds to the numbering scheme on the plot plan submitted with the application.

Water Level Measurements

- All water level measurements must be made using a commercially manufactured electrical sensor with a visual and/or audible signal. The sensor must be certified by the manufacturer to be accurate to 1/100ths of a foot.
- Use the enclosed Clackamas County form or approved equivalent to document measurements. A professional standard of care is required to accurately record water levels and to prevent the accumulation of spurious data.
- WES-Soils will independently spot-check water levels in monitoring wells throughout the winter. Consultants are welcome to contact WES Soils and compare interim results during the monitoring period. A final monitoring well report, signed by the monitoring well consultant, should be submitted to WES by June 1st. of the following summer. Include any rainfall, snowfall, temperature or other data as may be appropriate, with a focus on the days immediately preceding and following field measurements.
- 24-hr temperature and precipitation data is available at 10-minute intervals from the National Weather Service who maintains a reporting station at Welches (C6318) and other pertinent Clackamas County locations. See: http://www.wrh.noaa.gov/mesowest/gmap.php?map=pqr.
- A minimum ten site visit readings will be required to validate field results. At least two readings should be taken after significant rain events. Not including next-day post-rain event measurements may invalidate the results, subject to the judgment of WES Soils (the Agent).

Questions? Please Call: Clackamas County- Water Environment Services -Technical Services Division- Soils Program at
(503) 742-4740

February 7, 2012

WES ONSITE PROGRAM
WINTER RECHECK REQUEST PROCESS
FOR OWNERS OF SINGLE-FAMILY RESIDENTIAL PROPERTY

EFFECTIVE WINTER 2012-2013

Seasonal Extensions and Decommissioning Information

- All monitoring wells must be properly decommissioned within the monitoring period. Use of monitoring wells beyond one season, for whatever reason, is subject to site-specific review and approval by WES and will result in additional fees. Failure to properly decommission monitoring wells could result in project delays and the filing of a Recorded Notice on the property. Proper decommissioning of monitoring wells will prevent both vertical movement of water within the well bore and infiltration of surface water into the well.
- Decommissioning of monitoring wells hand-installed by owners without a Landowner Permit from OWRD must be done by one of two methods:
    1. Removal: Extract the pipe from the ground using Handyman jacks or other hand tools. Fill any remaining void or depression with pelletized bentonite and cover with native soil. Remove all other temporary or permanent field markers, stakes, monuments, or flagging. Submit a Monitoring Well Abandonment Certificate to WES signed by the supervising professional.

    2. Abandon-in-Place: Cut the pipe off at 6-inches below ground surface and completely fill the remaining pipe and surface depression with pelletized bentonite, taking care to tamp the material to the bottom interior of the pipe. Moisten the bentonite. Remove surface monuments and submit a Monitoring Well Abandonment Certificate to WES per No. 1, above.
- Monitoring wells installed with a Landowner Permit from OWRD must follow OWRD decommissioning procedures. Refer also to OAR 690-240-0510: "Abandonment of Monitoring Wells." Specific questions not answered here about decommissioning monitoring wells installed under a Landowner Permit issued by OWRD should be directed to OWRD at (503) 986-0900; or visit their website at www.wrd.state.or.us.

Questions? Please Call: Clackamas County- Water Environment Services -Technical Services Division- Soils Program at (503) 742-4740

February 7, 2012

Monitoring Well Measurements

Monitoring Well No. _____ Page ____ of ____

Property Owner: _____ WES File No. _____

Legal Description: T _____ S R _____ E Section _____ Tax Lot _____

Subdivision Lot/Block or Other _____

Water Year _____ Consultant _____ Phone: _____

Definitions

Riser Ht (**A**) = _____ in. Total Well Depth, BGS = _____

Top of Riser to Water Level = **B** Depth of Water, BGS = **C** and **C=B-A**

	B	C	Weather	5-day Precip.*	Initials
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					
Date:					
Comments:					