(1) Only professional engineers, designers, or local health officers may perform soil and site evaluations. Soil scientists may only perform soil evaluations.

(2) The person evaluating the soil and site shall:

(a) Report:

(i) A sufficient number of soil logs to evaluate conditions within:

(A) The initial soil dispersal component; and
(B) The reserve area.

(ii) The groundwater conditions, the date of the observation, and the probable maximum height;

(iii) The topography of the proposed initial system, the reserve area, and those areas immediately adjacent that contain characteristics impacting the design;

(iv) The drainage characteristics of the proposed initial system, the reserve area and those areas immediately adjacent that contain characteristics impacting the design;

(v) The existence of structurally deficient soils subject to major wind or water erosion events such as slide zones and dunes;

(vi) The existence of designated flood plains and other areas identified in the local management plan required in WAC 246-272A-0015; and

(vii) The location of existing features affecting system placement, such as, but not limited to:

(A) Wells and suction lines;
(B) Water sources and supply lines;
(C) Surface water and stormwater infiltration areas;
(D) Abandoned wells;
(E) Outcrops of bedrock and restrictive layers;
(F) Buildings;
(G) Property lines and lines of easement;
(H) Interceptors such as footing drains, curtain drains, and drainage ditches;

(I) Cuts, banks, and fills;
(J) Driveways and parking areas;
(K) Existing OSS; and
(L) Underground utilities;

(b) Use the soil and site evaluation procedures and terminology in accordance with Chapter 5 of the On-site Wastewater Treatment Systems Manual, EPA 625/R-00/008, February 2002 except where modified by, or in conflict with, this chapter (available upon request to the department);

(c) Use the soil names and particle size limits of the United States Department of Agriculture Natural Resources Conservation Service classification system;

(d) Determine texture, structure, compaction and other soil characteristics that affect the treatment and water movement potential of the soil by using normal field and/or laboratory procedures such as particle size analysis; and

(e) Classify the soil as in Table V, Soil Type Descriptions:

**TABLE V**

<p>| Soil Type Descriptions |</p>
<table>
<thead>
<tr>
<th>Soil Type</th>
<th>Soil Textural Classifications</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Gravelly and very gravelly coarse sands, all extremely gravelly soils excluding soil types 5 and 6, all soil types with greater than or equal to 90% rock fragments.</td>
</tr>
<tr>
<td>2</td>
<td>Coarse sands.</td>
</tr>
<tr>
<td>3</td>
<td>Medium sands, loamy coarse sands, loamy medium sands.</td>
</tr>
<tr>
<td>4</td>
<td>Fine sands, loamy fine sands, sandy loams, loams.</td>
</tr>
<tr>
<td>5</td>
<td>Very fine sands, loamy very fine sands; or silt loams, sandy clay loams, clay loams and silty clay loams with a moderate or strong structure (excluding platy structure).</td>
</tr>
<tr>
<td>6</td>
<td>Other silt loams, sandy clay loams, clay loams, silty clay loams.</td>
</tr>
<tr>
<td>7</td>
<td>Sandy clay, clay, silty clay, strongly cemented or firm soils, soil with a moderate or strong platy structure, any soil with a massive structure, any soil with appreciable amounts of expanding clays.</td>
</tr>
</tbody>
</table>

(3) The owner of the property or his agent shall:
(a) Prepare the soil log excavation to:
   (i) Allow examination of the soil profile in its original position by:
      (A) Excavating pits of sufficient dimensions to enable observation of soil characteristics by visual and tactile means to a depth three feet deeper than the anticipated infiltrative surface at the bottom of the soil dispersal component; or
      (B) Stopping at a shallower depth if a water table or restrictive layer is encountered;
   (ii) Allow determination of the soil's texture, structure, color, bulk density or compaction, water absorption capabilities or permeability, and elevation of the highest seasonal water table; and
(b) Assume responsibility for constructing and maintaining the soil log excavation in a manner to prevent injury as required by chapter 296-155 WAC.
(4) The local health officer:
(a) Shall render a decision on the height of the water table within twelve months of receiving the application under precipitation conditions typical for the region;
(b) May require water table measurements to be recorded during months of probable high-water table conditions, if insufficient information is available to determine the highest seasonal water table;
(c) May require any other soil and site information affecting location, design, or installation; and
(d) May reduce the required number of soil logs for OSS serving a single-family residence if adequate soils information has previously been developed.

[Statutory Authority: RCW 43.20.050. WSR 05-15-119, § 246-272A-0220, filed 7/18/05, effective 7/1/07.]