

APPROVAL GUIDELINES FOR INDIVIDUAL WASTEWATER TREATMENT SYSTEMS GENERAL REQUIREMENTS

In order to obtain approval for the installation of a wastewater treatment system the two most basic requirements are for suitable soils and adequate groundwater separation.

Soil Requirements

Suitable soils must exist to a depth of four feet (4') below the bottom of the absorption system. Suitable soils are those capable of accomplishing two goals. The soil must be permeable enough to allow the effluent to move downward or percolate through the soil. The soil also must not be so permeable that it allows the effluent to flow downward without adequate treatment. Suitable soils can generally be defined as those that have a percolation rate of between 1 and 60 minutes per inch.

Groundwater Requirements

The maximum groundwater table must be a least two feet (2') below the bottom of the absorption system. There are two reasons for this rule. Most obvious to the homeowner is slow or non-existent drainage, this will most likely occur when the groundwater rises into the absorption system. This is known as a mechanical failure. A biological failure occurs whenever the effluent is not adequately treated before entering the water table and being carried away without further treatment. A minimum of two feet (2') of suitable naturally existing soil is required to adequately treat effluent. Since the minimum trench depth for the absorption system is twelve inches (12") with an additional twelve inches (12") capping fill, the maximum groundwater table is 36" from the original surface or 48" below the finished grade.

PROCEDURES FOR OBTAINING WASTEWATER TREATMENT APPROVAL

1. **Soil and Site Evaluation**

Provide a soil exploration pit, dug by a backhoe, in the area of the proposed absorption field. This pit is to be of sufficient size to permit visual inspection of the sidewall area to a depth at least four feet (4') below the bottom of the proposed absorption field. The absorption field must be located a minimum of 100 feet from any open watercourses (such as ditches, canals or drainages), wells, springs, lakes, ponds, land drains or reservoirs.

Health Department personnel will evaluate the exploration pit in terms of soil type and groundwater table. The soil horizons will be logged and the level at which the percolation test is to be conducted will be established. The actual

groundwater table will be noted and the maximum groundwater table will be evaluated in terms of the above-referenced ground features.

2. **Percolation Test**

The percolation test is to be conducted by a representative of the Davis County Division of Environmental Health or an Environmental Health Scientist or Engineer registered in the State of Utah. The test must be conducted in the required soil horizon by the method described in the State Wastewater Disposal regulations. A certificate of percolation results in minutes per inch is to be provided to the Division of Environmental Health.

3. **Culinary Water Supply**

If culinary water is to be provided by a public water supply company, a letter stating that service will be provided is required. If culinary water is to be provided by a private well, the well must be approved by the Division of Environmental Health.

In order for a well to be approved, three satisfactory bacteriological samples, chemical analysis, well drillers log and evidence of water rights are required.

Spring water supplies will have additional requirements.

4. **Application for Wastewater Treatment Permit**

An application for a wastewater treatment permit must be completed and submitted along with the appropriate fees. If the site is determined to be suitable in terms of site, soil, groundwater table, and culinary water, an approval for construction will be given.

It is prudent to consult with the planning commission prior to submitting an application for any additional requirements.

These guidelines are being provided for your convenience and information only. Any official approvals must be in strict accordance with the State of Utah *Individual On-Site Wastewater Disposal Regulations and Drinking Water*.