

June 4, 2024

Weber County Planning Commission
2380 Washington Blvd.
Ogden, UT 84401

RE: Subdivision **Determination**
Hadlock Subdivision 2nd Amendment, 2 lots
Parcel #22-410-0004
Soil log #15486

An evaluation of the site and soils at the above-referenced address was completed by staff of this office on July 3, 2023, October 4, 2023, and May 2, 2024. The exploration pit (s) is located at the referenced GPS coordinate and datum. The soil texture and structure, as classified using the USDA system, are as follows:

Exploration Pit #1 (**Lot 2**) (UTM Zone 12T, Nad 83, 0426553E 4578213N)
0-12" Gravelly loam, granular structure, gravel 20%
12-40" Gravelly loam, massive structure, gravel 30%
40-96" Gravelly sandy loam, granular structure, gravel-cobble 80%

Exploration Pit #2 (**Lot 1**) (UTM Zone 12 Nad 83 0426651 E, 4578317 N)
0-11" Gravelly Loam, Granular Structure, 20% Gravel
11-37" Gravelly Sandy Loam, Massive Structure, 45% Gravel-cobble
37-114" Gravelly Loamy Sand, Single Grain Structure, 85% Gravel-cobble

Exploration Pit# 2 deemed feasible for a Mound, Packed Bed Media with a drip maximum trench depth 0", or Packed Bed Media with an 18" trench depth and non-chemical Disinfection

Exploration Pit #3(**Lot 1**) (UTM Zone 12T, Nad 83, 426597E 4578332N)
0-24" Gravelly Loam, Blocky Structure
24-60" Coarse Sandy Loam, Blocky to Granular Structure, Gravel to Cobble

Exploration Pit #4(**Lot 1**) (UTM Zone 12T, Nad 83, 426624E 4578352N)
0-20" Gravelly Loam, Granular Structure
20-64" Coarse Sandy Loam, Blocky to Granular Structure, Gravel to Cobble- Few Red Mottles 2%

DESIGN REQUIREMENTS

The soil and percolation information for the above-referenced lot have been reviewed. Culinary water will be provided by a private well. **The placement of the well is critical so as to provide the required 100 foot protection zone.** The well will need to be dug, tested and the water supply approved prior to issuance of a wastewater disposal permit

Lot 1 OPTION 1: Conventional System:

Area of Exploration Pit #3 UTM Zone 12T, Nad 83, 426597E 4578332N & Exploration Pit # 4 UTM Zone 12T, Nad 83, 426624E 4578352N. Anticipated ground water tables not to exceed 48 inches, fall within the range of acceptability for the utilization of a Conventional Wastewater Disposal System as a means of wastewater disposal. Maximum trench depth is limited to 12 inches. The absorption system is to be designed using a maximum loading rate of 0.5 gal/sq. ft./day as required for the gravelly sandy loam, blocky structure soil horizon.

Lot 1 OPTION 2 & 3: Mound or Packed Bed Media with 0" max trench depth

Area of Exploration Pit #2 UTM Zone 12 Nad 83 0426651 E, 4578317 N. Anticipated ground water tables are not expected to exceed 48 inches. Due to the gravelly loamy sand, single grain structure soil horizon beginning at 37 inches below grade with a percolation rate of 0.2 minutes per inch the property falls within the range of acceptability for the utilization of a Wisconsin Mound Treatment System or a Packed Bed Media System as a means of wastewater disposal. As defined in the Utah Administrative Code R317-4 Table 6 the absorption area is to be designed using a maximum loading rate of 0.22 gal/sq. ft./day for a Wisconsin Mound absorption area, or 0.45 gal/sq. ft./day for the Packed Bed Media absorption area as required for the gravelly sandy loam, massive structure soil horizon. Maximum absorption area depth is limited to 0 inches.

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Lot 1 OPTION 4: Packed Bed Media with non-chemical disinfection and max trench of 18"

Area of Exploration Pit #2 UTM Zone 12 Nad 83 0426651 E, 4578317 N. Anticipated ground water tables not to exceed 48 inches. Due to the gravelly loamy sand, single grain structure soil horizon beginning at 37 inches below grade with a percolation rate of 0.2 minutes per inch the property fall within the range of acceptability for a Packed Bed Media Treatment System with **non-chemical disinfection** followed by a conventional trench with a maximum trench depth limited to 18 inches. The absorption system is to be designed using a maximum loading rate of 0.45 gal/sq. ft. /day as required for a gravelly sandy loam, massive structure with high gravel content soil horizon.

Lot 2: Conventional System

Area of Exploration Pit #1 UTM Zone 12T, Nad 83, 0426553E 4578213N): Anticipated ground water tables not to exceed 48 inches, fall within the range of acceptability for the utilization of a Conventional Wastewater Disposal System as a means of wastewater disposal. Maximum trench depth is limited to 24 inches. The absorption system is to be designed using a maximum loading rate of 0.40 gal/sq. ft. /day as required for the gravelly loam, massive structure soil horizon.


Plans for the construction of any wastewater disposal system are to be prepared by a Utah State certified individual and submitted to this office for review prior to the issuance of a Wastewater Disposal permit.

The following items are required for a formal **subdivision review**; application, receipt of the appropriate fee, and a full sized copy of the subdivision plats showing the location of exploration pits and percolation tests as well as the documented soil horizons and percolation rates. A subdivision review will not occur until all items are submitted. Mylars submitted for signature without this information will be returned

Each on-site individual wastewater disposal system must be installed in accordance with R317-4, Utah Administrative Code, Individual Wastewater Disposal Systems and Weber-Morgan District Health Department Rules. Final approval will be given only after an on-site inspection of the completed project and prior to the accomplishment of any backfilling.

Please be advised that the conditions of this letter are valid for a period of 18 months. At that time the site will be re-evaluated in relation to rules in effect at that time.

Sincerely,


Summer Day, LEHS III, Program Manager
Environmental Health Division
801-399-7160