DENR/DEH

ON-SITE WASTEWATER SECTION

Sheet 1 of 1
PROPERTY ID #: 3782733341
COUNTY: Iredell

# SOIL/SITE EVALUATION
## *for* ON-SITE WASTEWATER SYSTEM

OWNER: Howell Technologies
ADDRESS: 125 Whitehall Ln
PROPOSED FACILITY: SFD
PROPOSED DESIGN FLOW (.1949): 360gpd
LOCATION OF SITE: 224 Bluewaters Dr.
WATER SUPPLY: • Private • (Public) • Well • Spring • Other
EVALUATION METHOD: • (Auger Boring) • Pit • Cut
TYPE OF WASTEWATER: • (Sewage) • Industrial Process • Mixed

APPLICATION DATE 2-23-15
DATE EVALUATED: 3-12-15
PROPERTY SIZE: 0.761 acres
PROPERTY RECORDED: Yes

| PROFILE # | .1940 LANDSCAPE POSITION/ SLOPE % | HORIZON DEPTH (IN.) | SOIL MORPHOLOGY (.1941) STRUCTURE/ TEXTURE | SOIL MORPHOLOGY (.1941) CONSISTENCE/ MINERALOGY | OTHER PROFILE FACTORS .1942 SOIL WETNESS/ COLOR | .1943 SOIL DEPTH | .1956 SAPRO CLASS | .1944 RESTR HORIZ | PROFILE CLASS & LTAR |
|---|---|---|---|---|---|---|---|---|---|
| 1 | 29% NS | 6-8 | SCL SBK | Fr Mod SE | +51" | 47" | 47" PS | +51" | PS 0.3 |
| | | 8-21 | C SBK | Fr Mod SE | | | | | |
| | | 21-47 | BC WSBK | Fr Mod SE | | | | | |
| | | 47-51 | L SAP | Fr | | | | | |
| 2 | 29% NS | 0-7 | SCL SBK | Fr Mod SE | +48" | +48" | +48" | +48" | PS 0.25 |
| | | 7-22 | C ABK | Fr Mod SE | | | | | |
| | | 22-50 | BC micro WABK | Fr Mod SE | | | | | |
| 3 | 29% NS | 0-16 | C ABK | Fr Mod SE | +48" | 30" | 30" | ~~60~~" | PS 0.25 0.125 DRID |
| | | 16-30 | BC SAP frac in ABK | Fr Mod SE | | | | | |
| | | 30-~~60~~ 65 | SC SAP | Fr Mod SE | | | | | |
| 4 | 29% NS | 0-7 | SCL SBK | Fr Mod SE | +48" | +48" | +48" | +48" | PS 0.25 0.125 DRIP |
| | | 7-24 | C ABK | Fr Mod SE | | | | | |
| | | 24-50 | BC micro WABK | Fr Mod SE | | | | | |

| DESCRIPTION | INITIAL SYSTEM | REPAIR SYSTEM |
|---|---|---|
| Available Space (.1945) | PS | PS |
| System Type(s) | TT | I |
| Site LTAR | 0.25 | 0.125 |

OTHER FACTORS (.1946): N/A
SITE CLASSIFICATION (.1948): PS
EVALUATED BY: Justin Henderson
OTHER(S) PRESENT: N/A

COMMENTS: N/A

# LEGEND

*use the following standard abbreviations*

| LANDSCAPE POSITION | GROUP | SOIL TEXTURE | CONVENTIONAL .1955 LTAR* | LPP .1957 LTAR* | MINERALOGY/ CONSISTENCE | STRUCTURE |
|---|---|---|---|---|---|---|
| CC (Concave Slope) | I | S (Sand) | 1.2 - 0.8 | 0.6 - 0.4 | NEXP (Non-expansive) | G (Single Grain) |
| CV (Convex Slope) | | LS (Loamy Sand) | | | SEXP (Slightly Expansive) | M (Massive) |
| D (Drainage Way) | | | | | EXP (Expansive) | CR (Crumb) |
| DS (Debris Slump) | II | SL (Sandy Loam) | 0.8 - 0.6 | 0.4 - 0.3 | | GR (Granular) |
| FP (Flood Plain) | | L (Loam) | | | | SBK (Subangular Blocky) |
| FS (Foot Slope) | | | | | | ABK (Angular Blocky) |
| H (Head Slope) | III | Si (Silt) | 0.6 - 0.3 | 0.3 - 0.15 | | PL (Platy) |
| L (Linear Slope) | | SiCL (Silty Clay Loam) | | | | PR (Prismatic) |
| N (Nose Slope) | | CL (Clay Loam) | | | | |
| R (Ridge) | | SCL (Sandy Clay Loam) | | | MOIST | WET |
| S (Shoulder Slope) | | SiL (Silt Loam) | | | | |
| T (Terrace) | | | | | VFR (Very Friable) | NS (Non-sticky) |
| | IV | SC (Sandy Clay) | 0.4 - 0.1 | 0.2 - 0.05 | FR (Friable) | SS (Slightly Sticky) |
| | | SiC (Silty Clay) | | | FI (Firm) | S (Sticky) |
| | | C (Clay) | | | VFI (Very Firm v. Very Sticky) | VS (Very Sticky) |
| | | O (Organic) | None | None | EFI (Extremely Firm) | NP (Non-plastic) |
| | | | | | | SP (Slightly Plastic) |
| | | | | | | P (Plastic) |
| | | | | | | VP (Very Plastic) |

*Adjust LTAR due to depth, consistence, structure, soil wetness, landscape, position, wastewater flow and quality.

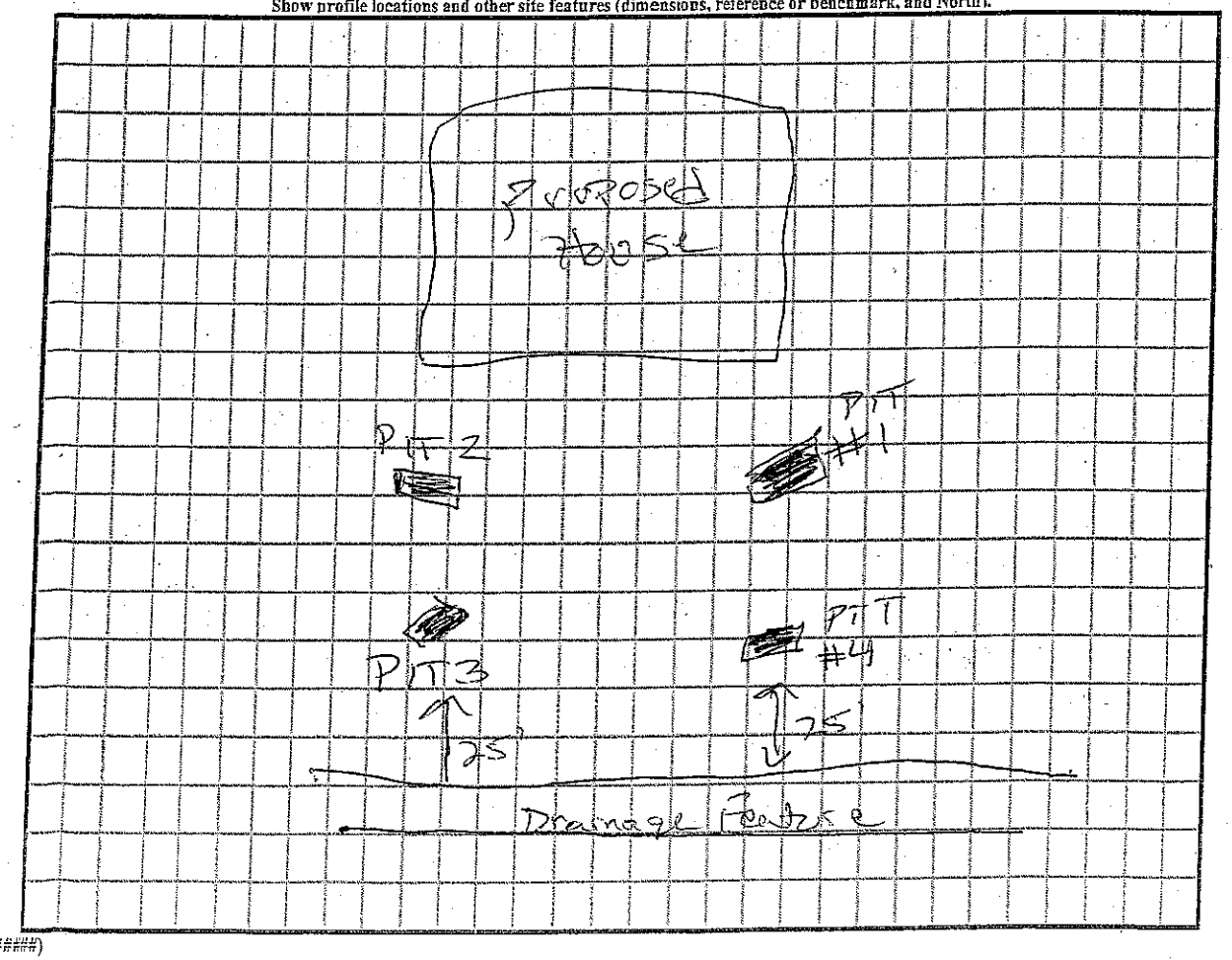
*NOTES*

| | |
|---|---|
| *HORIZON DEPTH* | In inches below natural soil surface |
| *DEPTH OF FILL* | In inches from land surface |
| *RESTRICTIVE HORIZON* | Thickness and depth from land surface |
| *SAPROLITE* | S(suitable) or U(unsuitable) |
| *SOIL WETNESS* | Inches from land surface to free water or inches from land surface to soil colors with chroma 2 or less - record Munsell color chip designation |
| *CLASSIFICATION* | S (Suitable), PS (Provisionally Suitable), or U (Unsuitable) |

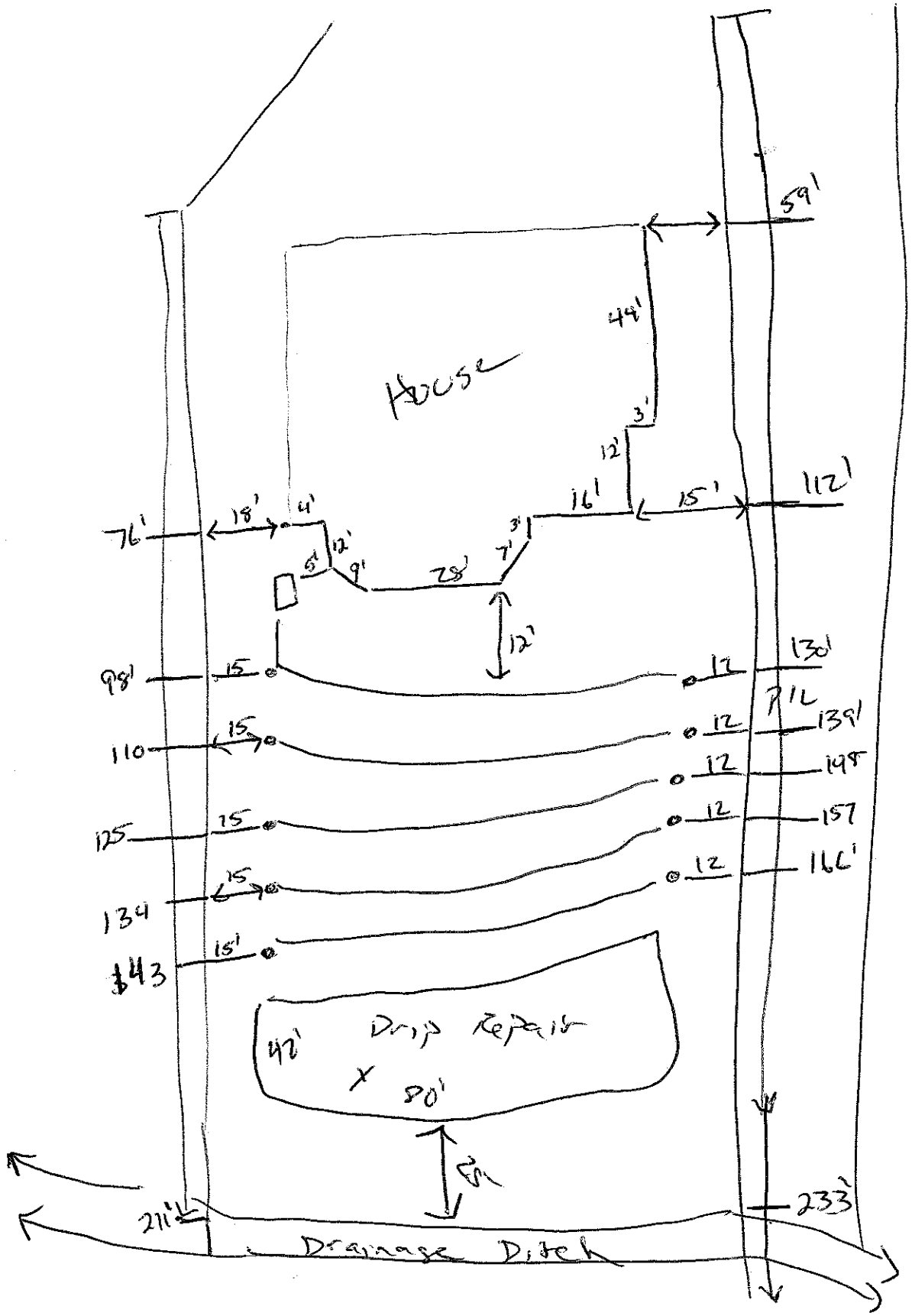
Evaluation of saprolite shall be by pits.

Long-term Acceptance Rate (LTAR): gal/day/ft$^2$

**Show profile locations and other site features (dimensions, reference or benchmark, and North).**




DENR (######)
Review (######)




$2^{0}\cancel{1}'$
$-\ 35$
$1\ 8\ 6$
$-143$
$43$

$2\cancel{3}^{2}\cancel{3}$
$-\ 25$
$17^{10}8$
$166$
$42$