Monitoring Well Network Project
Peace Region, British Columbia, Canada

EERI-11

Energy and Environment Research Initiative
Dept of Earth, Oceans, & Atmospheric Sciences
University of British Columbia

Date Drilled	: 6/28/2019-6/30/2019	Drilled By	: Omega Environmental Drilling
Location	: Groundbirch, BC		
Equipment	: Boart Longyear LS600 Sonic Track	Sonic (O.D. = 15.24 cm)	: 0-46.0 m
Logged By	: Max Goetz	HQ Core (O.D. = 8.89 cm)	: 46.0-77.5m
Sampled By	: Alex Nott	Grout Mixture (Artesian)	: 176/176/40 lbs Portland/Barite/Gel

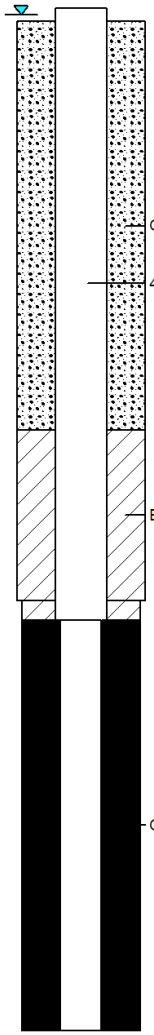
Depth in Meters

Water Info

Driller reports water loss to formation (18.3 - 20.1m)

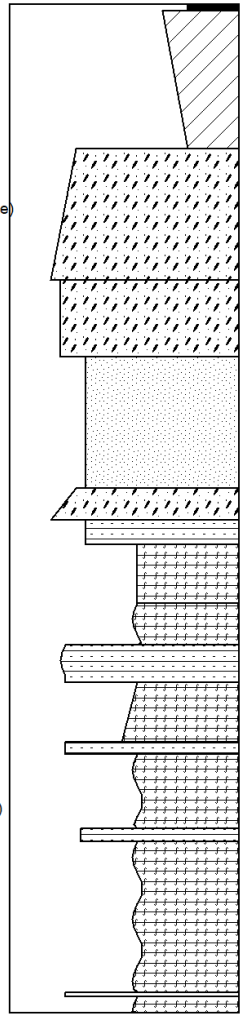
Driller reports inflow (46 - 46.9 m)

Well: 4" PVC, open hole bedrock



GRAIN SIZE & LITHOLOGY

gravel sand silt clay



DESCRIPTION

- Topsoil, black, organic matter, clayey loam.
- Silty clay, fining down to clay. Brown/grey, <1% clasts, no irion oxidation. Silt content decreases with depth.
- Silty clay diamict, coarsening to fine sandy clay diamict. Grey and not very dense, some zones with coarse sand in matrix. 25-35% clasts, mostly pebbles/granules and secondarly cobbles. Subrounded Jasper, medium sandstone pebbles. No iron oxidation.
- Clayey silt diamict. Minor very fine sand in matrix. Extremely dense, 35% clasts, subrounded to subangular, mostly pebble/cobble size. Minor iron oxidation in clasts. @22.7-22.9 m: very fine sand layer.
- Very fine sand. Grey, homogenous, no clasts, no structures visible. Some minor clay. No oxidation, potentially saturated.
- Silty clay diamict coarsening to fine sandy silt diamict. Grey matrix, 15% clasts. Rounded cobble/boulders (quartz, jasper). Angular pieces of fine/medium sandstone, highly oxidized. At base of unit: highly weathered and oxidized, very compact.
- Very fine grained sandstone. Minor iron oxidation.
- Siltstone with fine sandstone interlayers. 1-3cm wide interlayers of fine sandstone. Irregular wavy bedding in some sections, cross bedding and 1mm wide coal seams.
- Medium sandstone interbedded with siltstone. Interbeds are up to 30cm, crossbedding in medium sandstone.
- Siltstone with medium sanstone interlayers. <1cm interlayers. Organic rich interval with 1-2mm coal seems. Major fault from 52.1-53.1 m.
- Medium sandstone.
- Siltstone with fine sandstone interlayers.
- Fine sandstone
- Siltstone with fine sandstone interlayers.
- Medium sandstone
- Silstone with medium sandstone interlayers. Interlayers are 1-2mm, sparse.