

SITE INFORMATION

Site Overview

Site history indicated that several sources may be present at the site. Chlorinated solvents may have previously been used during equipment maintenance activities conducted at the site, and a drum storage area was present immediately north of the area where high solvent concentrations, predominantly TCE, were reported in soil, gas and ground water. These two areas drained, via surface and subsurface pipes, to a small culvert. A TCE source area was identified at this location.

Site Geology

The Site is underlain by granitic bedrock which is overlain by varying thicknesses of decomposed granite. One area has a layer of colluvium and decomposed granite approximately 30 feet thick comprised of brown and yellowish silty sand deposits. Below the decomposed granite, a zone of fractured granitic bedrock extends to a depth of approximately 70 feet below ground surface (bgs). The degree of weathering decreases with depth and relatively fresh, unweathered zone of granitic bedrock is present to the total depth drilled at the site, approximately 100 feet bgs.

Contaminants of Concern (COCs): PCE & TCE

APPROACH

- Thermal Conduction Heating (TCH)
- Target Treatment Zone (TTZ):
 - ◇ Area= 4,950 ft²
 - ◇ Volume= 18,333 cy

PROJECT TEAM

Our client provided one of their field technicians to assist with operations monitoring activities on a regular basis.

OBJECTIVES

- Heat the entire TTZ to near the boiling point of water, or higher if possible, and maintain this temperature for at least 30 days.
- Continue heating past the period of peak mass removal and long enough to achieve diminishing returns, also called the asymptotic mass removal rate.
- Substantially reduce concentration in all extraction wells prior to ceasing heating.

CHALLENGES & SOLUTIONS

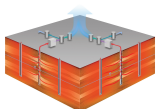
The biggest challenge encountered on this project was bringing power to the site in a timely fashion. The solution to this obstacle was to practice continuous communication and to offer any assistance possible to expedite the process.

RESULTS

All project objectives were reached, resulting in the successful completion of the project. The objectives were reached on schedule and within budget.



TECHNOLOGY



TCH

TIMEFRAME

Fall 2015
to
Fall 2016

LOCATION



California

REGULATORY

DTSC