



BERNER CONSTRUCTION, INCORPORATED PROJECT SUMMARY

Project Title: Removal of Berm and Backfill Basin at Richmond Plant for Philadelphia Gas Works (PGW)

Location: Richmond Street, City of Philadelphia, PA

Scope: Provide labor, materials, equipment, and supervision to remove lead-contaminated soil from a retention basin berm and backfill the basin to grade

Berner was contracted by Philadelphia Gas Works (PGW) to complete the remediation of a retention basin and the surrounding berm to remove lead impacted soil. The berm and retention basin were contaminated by the historical activities of a nearby lead smelter operation.

The PGW Richmond facility is 25 acres and is populated with gas holders; a network of natural gas processing equipment and transport pipelines; machine, electrical, and maintenance shops; and ancillary equipment and buildings. The largest structures at the site are the two liquefied natural gas (LNG) holders and a third gas holder.

Berner's work scope included waste profiling, excavation, transportation and disposal of approximately 525 cubic yards of lead-impacted soil. The work scope also included cleaning the bottom of the basin to remove surface particulate, perforating the bottom of the basin to allow water drainage, and backfilling the basin to grade with clean fill.



Prior to mobilization, Berner collected and submitted a soil sample from the berm for waste characterization and waste profiling purposes. Once the approval from the disposal facility was obtained, the berm was excavated and the material directly loaded into trucks for off-site disposal. Approximately 525 cubic yards of soil was excavated and disposed off-site. Once the berm was removed, Berner vacuumed the bottom of the basin with a HEPA vacuum system. After vacuuming the bottom of the basin, Berner drilled several small diameter holes, 12 inches deep, in the

bottom of the basin to facilitate drainage. Berner then backfilled the basin with approximately 4 feet of crushed recycled concrete. The top layer of the fill consisted of 4 inches of 2A modified stone. The work was completed in one week without interfering with facility LNG operations.