



GLOBAL

ENVIRONMENTAL ENGINEERING INC.

PROJECT BUDGET

\$4,000,000.00

CONTRACT START DATE

JUNE 2014

CONTRACT END DATE

NOVEMBER 2014

Sediment Dewatering - Morrow Lake

Calhoun County, Michigan

Global was contracted by Terra Contracting Services, LLC to serve as Water Treatment Specialists in response to the 2010 Enbridge Oil Spill along the Kalamazoo River. An oil pipeline rupture caused 877,000 gallons of heavy crude oil to spill into Talmadge Creek in Calhoun County, Michigan, which flows into the Kalamazoo River. Global engineered a processing plan for material and slurry dredged from the Morrow Lake, Morrow Lake Delta, and adjacent areas.

Treatment began with Del Tanks, which received the initial flow directly from three dredges and two Toyo Pumps, to remove the debris and coarse sediment. Effluent overflow was then pumped into 1.7 million-gallon LakeTanks™ and from there into 200-foot long Geobags after flocculating polymers were added. Decanted water was then pumped through three 1.2 million-gallon clarifiers, sand filters, bag filters, and Granular Activated Carbon tanks before being returned to the river.

Dredging and treatment of contaminated water and sediment of the Morrow Lake and adjacent areas began in June 2014 and was completed in November 2014. 70,000 cubic yards of material and 200 million gallons of water were treated during the course of this project. Throughout the project, the contractors collaborated to minimize traffic, light, noise, and other impacts to the public.

