

**New York State Dept. of
Environmental Conservation
Scope of Work Sheet
Fiscal Year 2014
CHO - Supplemental Site
Characterization**



Client Facility ID <u>Wheatfield</u>	Client Contact: <u>Gregory P. Sutton</u>	Contract Dates: <u>3/20/2013 to 12/31/2013</u>
Address: <u>Nash Rd</u>	CM: <u>Thomas Palmer</u>	Client Work Authorization: <u>COI 121637</u>
City/State: <u>Wheatfield, NY</u>	PM: <u>Eric D. Popken</u>	Contract Reference: <u>C100900 (NYSDEC 02/01/09-01/31/15)</u>
County: <u>Niagara</u>	GES Project No: <u>0901536</u>	

Scope of Work Description:

NYSDEC has requested that GES perform a supplemental site characterization for this site. Costs in this CHO include tasks associated with the planning and execution of such a scope of work. Additional details are included below.

- 02-283: Site Visit/Walkover - GES will conduct a site reconnaissance visit to locate and evaluate soil boring locations to conduct the subsurface investigation. A second site visit/walkover will be conducted after the investigation is completed to survey in the soil boring/well locations using a rented GPS unit.
- 02-100: Work Plan Preparation – GES will prepare and submit to NYSDEC a supplemental subsurface investigation workplan, outlining the scope of work.
- 02-103: Project Management – DEC correspondence, coordination, and any other support activities as needed.
- 02-214 – Well Installation – Costs for execution of the advancement of soil borings and installation of monitoring wells on-site. TREC Environmental will be subcontracted under the teaming agreement to provide drilling services. The scope of work is as follows:

This work is currently assumed to take seven field days to complete. GES will communicate with NYSDEC if additional time on-site is needed.

22 soil borings to a depth of 10-12 feet.

Five 2" PVC monitoring wells to approximate the same depth with 5' screens.

Stick up protective casings at each monitoring well.

Estimating 1-3 drums of cuttings. As discussed with NYSDEC, cuttings will be evaluated in the field before determining if they are to be drummed or left at the boring locations.

Skid steer for 5 days to clear brush for access – pricing assumes rental from either TREC or from a rental vendor.

Oversight by a Hydrogeologist with field equipment.

- 02-215 – Well Development – Development of the five new monitoring wells prior to sampling. Wells will be surged and either pumped or bailed. A Horiba U-52 will be used to monitor groundwater chemistry to determine when the wells have been sufficiently developed. Water to be treated through carbon bucket and discharged to the surface. Assumed to take one day to complete with to personnel.

- 02-206 – Monitoring well sampling – GES will conduct groundwater sampling at the five new monitoring wells, plus the existing OW-16. Wells will be gauged, purged and sampled for VOCs, SVOCs, Pesticides, Herbicides, and Metals. Purge water will be treated with carbon and discharged to the surface. Assumed to take one day to complete with to personnel.

- 02-211 – Reporting - GES will prepare a supplemental subsurface investigation report. Data from field events and analytical data will be included, as well as GPS data collected for data locations.

- 02-141 – Electronic Data Submission – GES will prepare the laboratory analytical EDD for submission into NYSDEC’s EQuIS database.

- 02-290 – Waste Disposal – Landfill disposal of any drums of soil cuttings generated. Waste hauler will be subcontracted for transportation and disposal. We are currently assuming that the current disposal profile and facility can be used again.

TIME AND MATERIALS

Phase-Task	Description	SubQty	Rate	Unit	SubTotal	Qty	Total
02-283	Site Visit / Walkover - Site visits for stakeout and for survey						
	-- Vendor - Equipment, Rental - Trimble GPS receiver	400	\$1.1	\$/hr	\$440.00		
	-- L-12 Hydrogeologist	20	\$62.32	\$/hr	\$1,246.40		

	-- E-002 Light Duty Vehicle - Hr	20	\$15.98	HR	\$319.60		
	-- LVE NYSDEC	20	\$1.08	HR	\$21.60		
					\$2,027.60	1	\$2,027.60
02-100	Work Plan Preparation - Subsurface Investigation Workplan						
	-- L-12 Hydrogeologist - report prep	8	\$62.32	/hr	\$498.56		
					\$498.56	1	\$498.56
02-103	Project Management						
	-- L-12 Hydrogeologist	16	\$62.32	/hr	\$997.12		
					\$997.12	1	\$997.12
02-214	Well Installation - assume 7 days of work						
	-- Miscellaneous - TREC Environmental, Inc. (Estimate)	21000	\$1	\$	\$21,000.00		
	-- L-12 Hydrogeologist	84	\$62.32	/hr	\$5,234.88		
	-- E-002 Light Duty Vehicle - Hr	84	\$15.98	HR	\$1,342.32		
	-- E-054 Sonic InterfaceHr	84	\$8.56	HR	\$719.04		
	-- E-055 PID w/calibration kit/HNU Hr	84	\$15.22	HR	\$1,278.48		
	-- LVE NYSDEC	84	\$1.08	HR	\$90.72		
					\$29,665.44	1	\$29,665.44
02-215	Well Development - 5 new wells, assume 1 day on-site						
	-- L-10 Foreman	8	\$47.58	/hr	\$380.64		
	-- Vendor - Equipment, Rental - Horiba U-52 rental	100	\$1.1	\$+10%	\$110.00		
	-- L-12 Hydrogeologist	8	\$62.32	/hr	\$498.56		
	-- E-002 Light Duty Vehicle - Hr	8	\$15.98	HR	\$127.84		
	-- E-054 Sonic InterfaceHr	8	\$8.56	HR	\$68.48		
	-- E-055 PID w/calibration kit/HNU Hr	8	\$15.22	HR	\$121.76		
	-- LVE NYSDEC	16	\$1.08	HR	\$17.28		
					\$1,324.56	1	\$1,324.56
02-206	Monitoring Well Sampling - 5 new wells plus OW-16, bail, treat w/carbon						
	-- L-10 Foreman	8	\$47.58	/hr	\$380.64		
	-- L-12 Hydrogeologist	8	\$62.32	/hr	\$498.56		
	-- E-002 Light Duty Vehicle - Hr	8	\$15.98	HR	\$127.84		
	-- E-054 Sonic InterfaceHr	8	\$8.56	HR	\$68.48		
	-- LVE NYSDEC	16	\$1.08	HR	\$17.28		
					\$1,092.80	1	\$1,092.80
02-122	Reporting - Supplemental Site Char. Report						
	-- L-2 Data Processor	3	\$16.02	/hr	\$48.06		
	-- L-12 Hydrogeologist - Report Preparation	20	\$62.32	/hr	\$1,246.40		
	-- L-12 Hydrogeologist - Graphics	4	\$62.32	/hr	\$249.28		
					\$1,543.74	1	\$1,543.74
02-141	Electronic Data Submission Prep - EQUIS database						
	-- L-12 Hydrogeologist	8	\$62.32	/hr	\$498.56		
					\$498.56	1	\$498.56
02-290	Waste Disposal - Disposal of drums generated from investigation						
	-- L-10 Foreman	3	\$47.58	/hr	\$142.74		
	-- Waste Subcontractor - Soil Disposal	600	\$1.1	\$+10%	\$660.00		

	-- E-002 Light Duty Vehicle - Hr	3	\$15.98	HR	\$47.94		
	-- LVE NYSDEC	3	\$1.08	HR	\$3.24		
					\$853.92	1	\$853.92

TOTAL T&M COSTS: \$38,502.30

TOTAL UC COSTS: \$0.00

TOTAL GES CONTRACT AMOUNT: \$38,502.30

TOTAL DIRECT COSTS: \$0.00

TOTAL CLIENT AMOUNT: \$38,502.30

Approvals:

This breakdown is provided for informational purposes only. Actual costs will be submitted on applications for payment for the DEC's review and approval in accordance with the terms of the standby contract. Standby contractor will proceed with call out authorization in accordance with the terms of the standby contract without DEC approval of this estimate.

Client: _____ **Date:** _____

GES: _____ **Date:** _____

Groundwater & Environmental Services, Inc.
 Proposal No. NY/W-2013-0010-03

3/19/2014