



Fort George G. Meade

Site-wide Operation & Maintenance (O&M) and Long-term Monitoring (LTM)

John Cherry
ARCADIS/PIKA Joint Venture (JV)

Restoration Advisory Board Meeting July 9, 2015



US Army
Corps of Engineers
Baltimore District





Presentation Agenda



IMCOM
SOLDIERS • FAMILIES • CIVILIANS

TOPICS

- Update on activities completed during second quarter 2015 (April–June 2015)
- System highlights
- Upcoming activities during third quarter 2015 (July–September 2015)



ARMY STRONG.™



Completed Activities Second Quarter '15



- 1st Quarter LTM Reports submitted (for regulatory review)
- 2nd Quarter monitoring well sampling
 - 42 monitoring wells tested in May 2015
 - Pesticide Shop, Manor View, and OU-4 (including on- and off-post wells)
 - Reporting for 2nd Quarter underway.
- Continued O&M of the OU-4 groundwater treatment systems including completion of a 2nd in-situ chemical oxidation (ISCO) injection



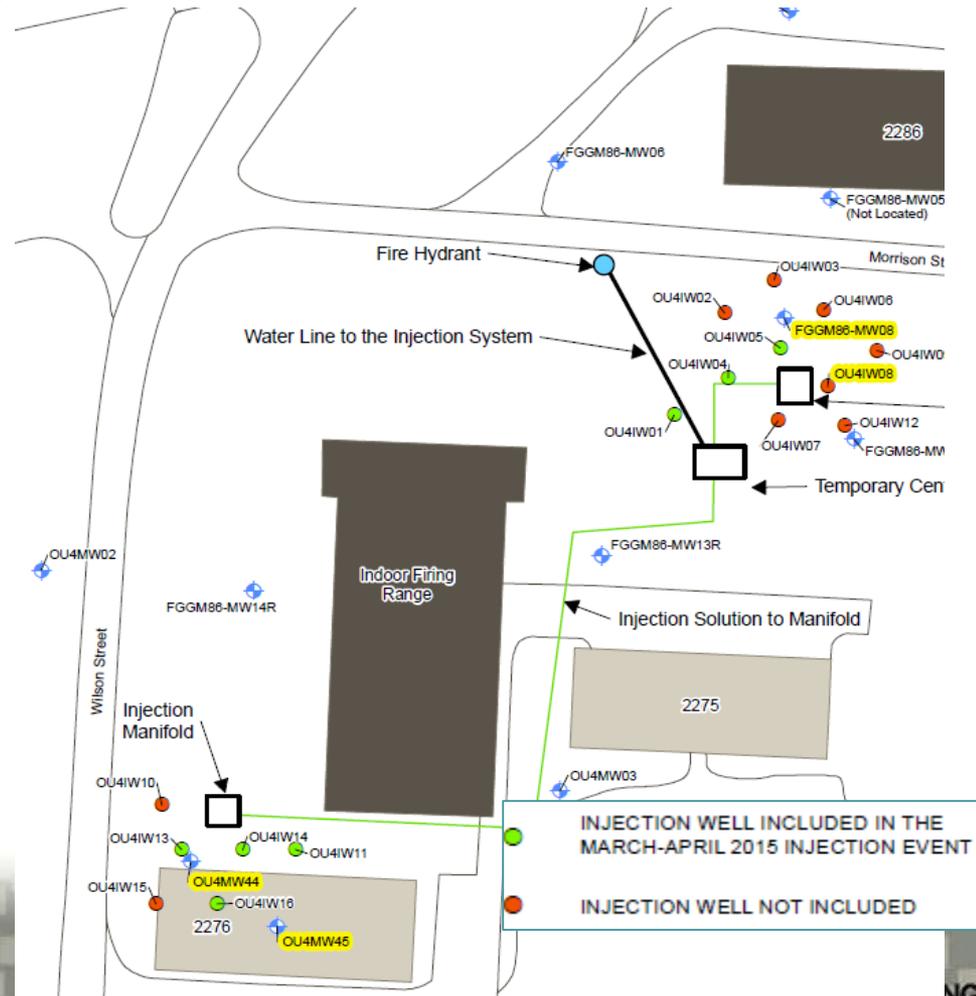
ARMY STRONG.™



Second Quarter '15 Highlights

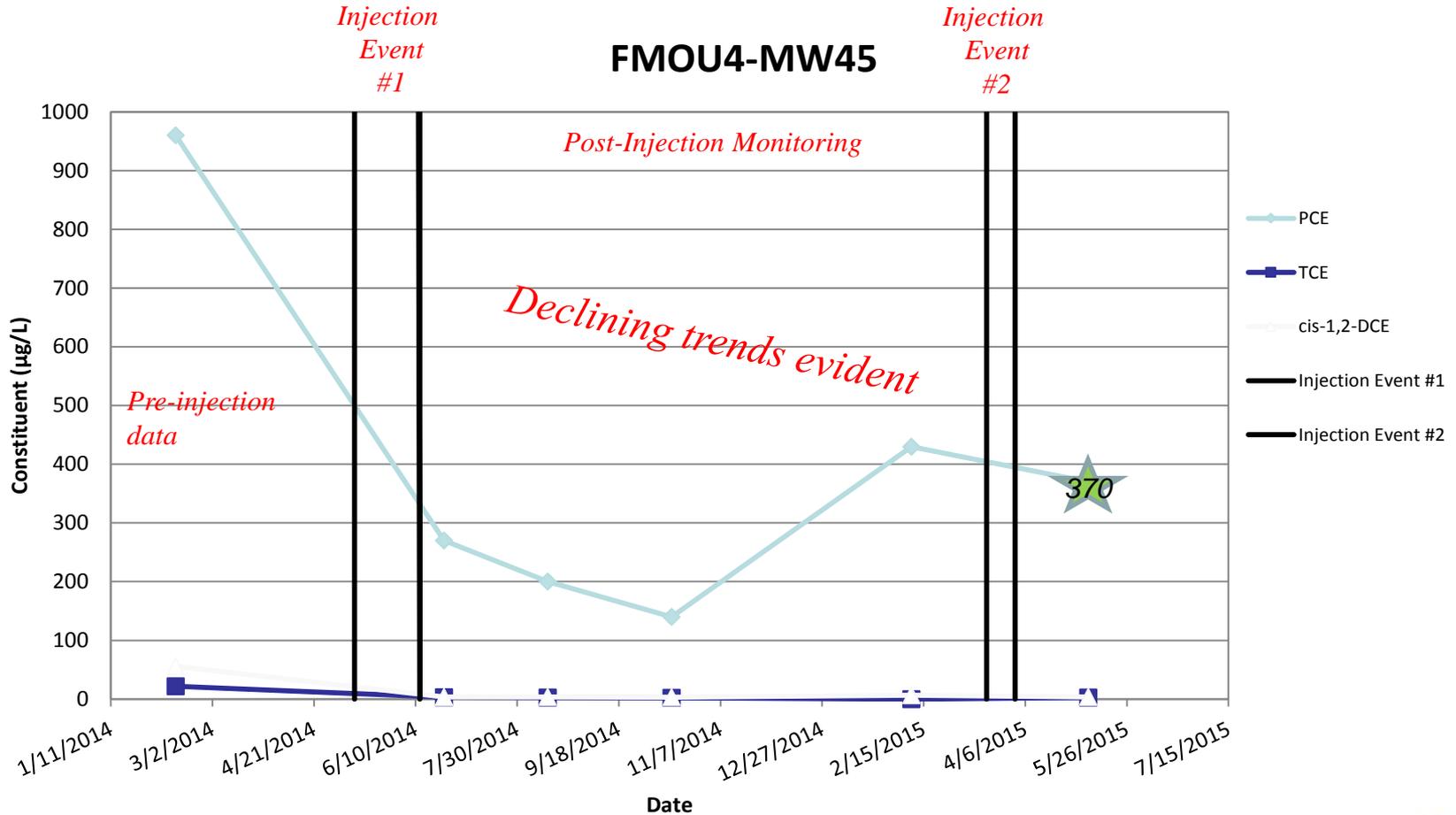


- OU-4 (AOC 1: Building 2286/2276 Area)
 - 2nd Full-scale ISCO Injection (March/April 2015) (91,895 gallons of sodium persulfate injected)





OU-4 ISCO Injection Area Performance Summary

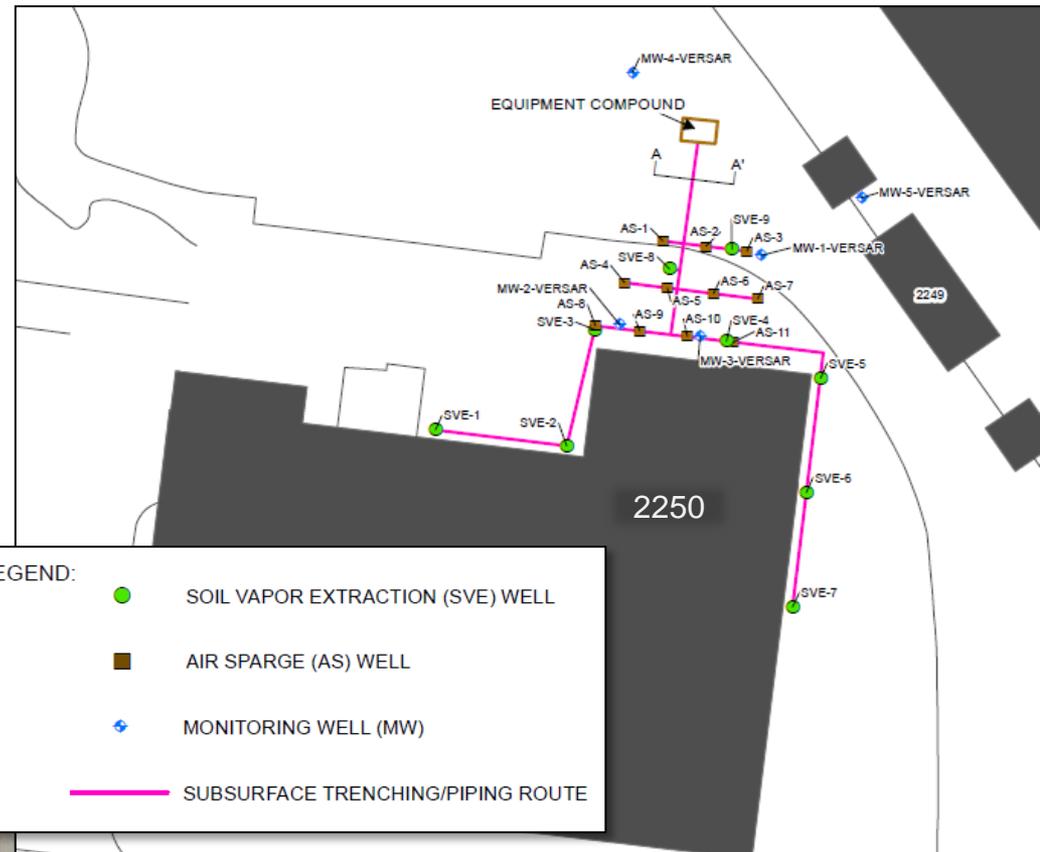




Second Quarter '15 Highlights

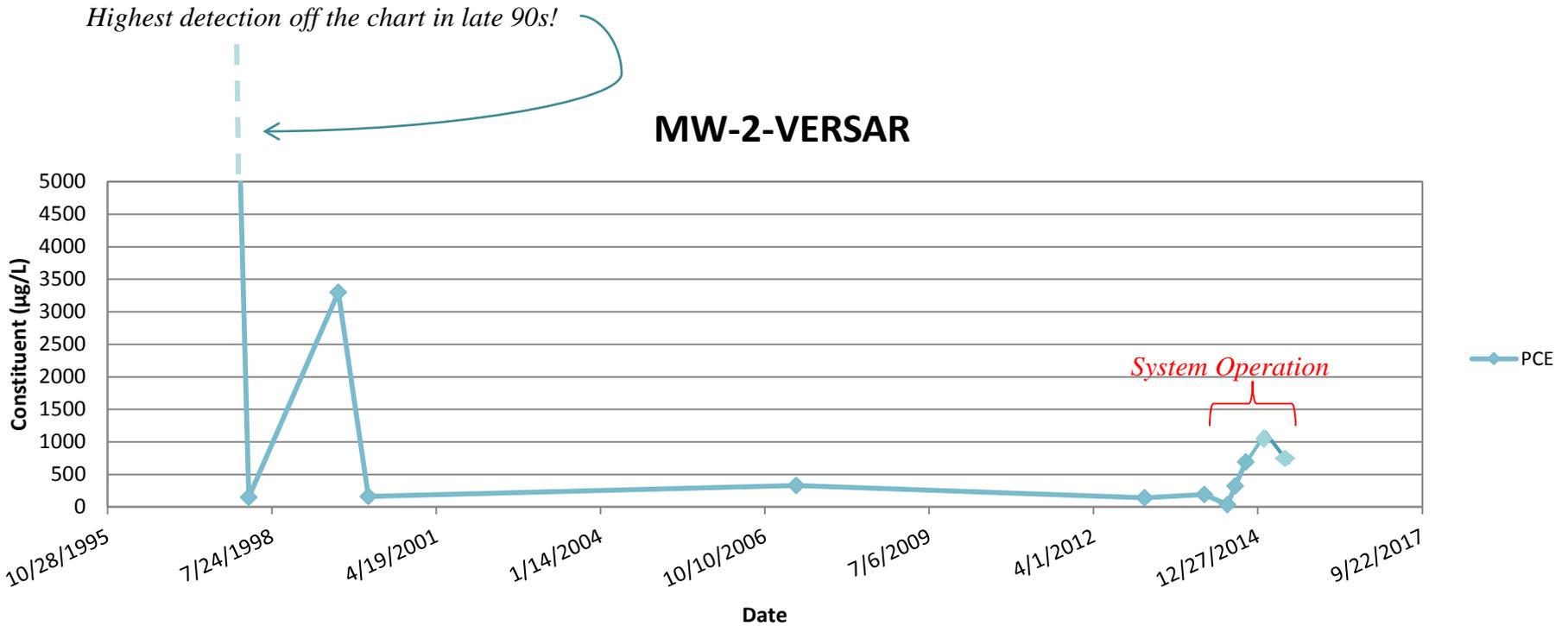


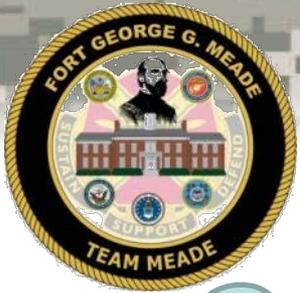
- OU-4 (AOC 2: Building 2250 Area)
 - Air Sparge/Soil Vapor Extraction System continues to operate.





Historical Data



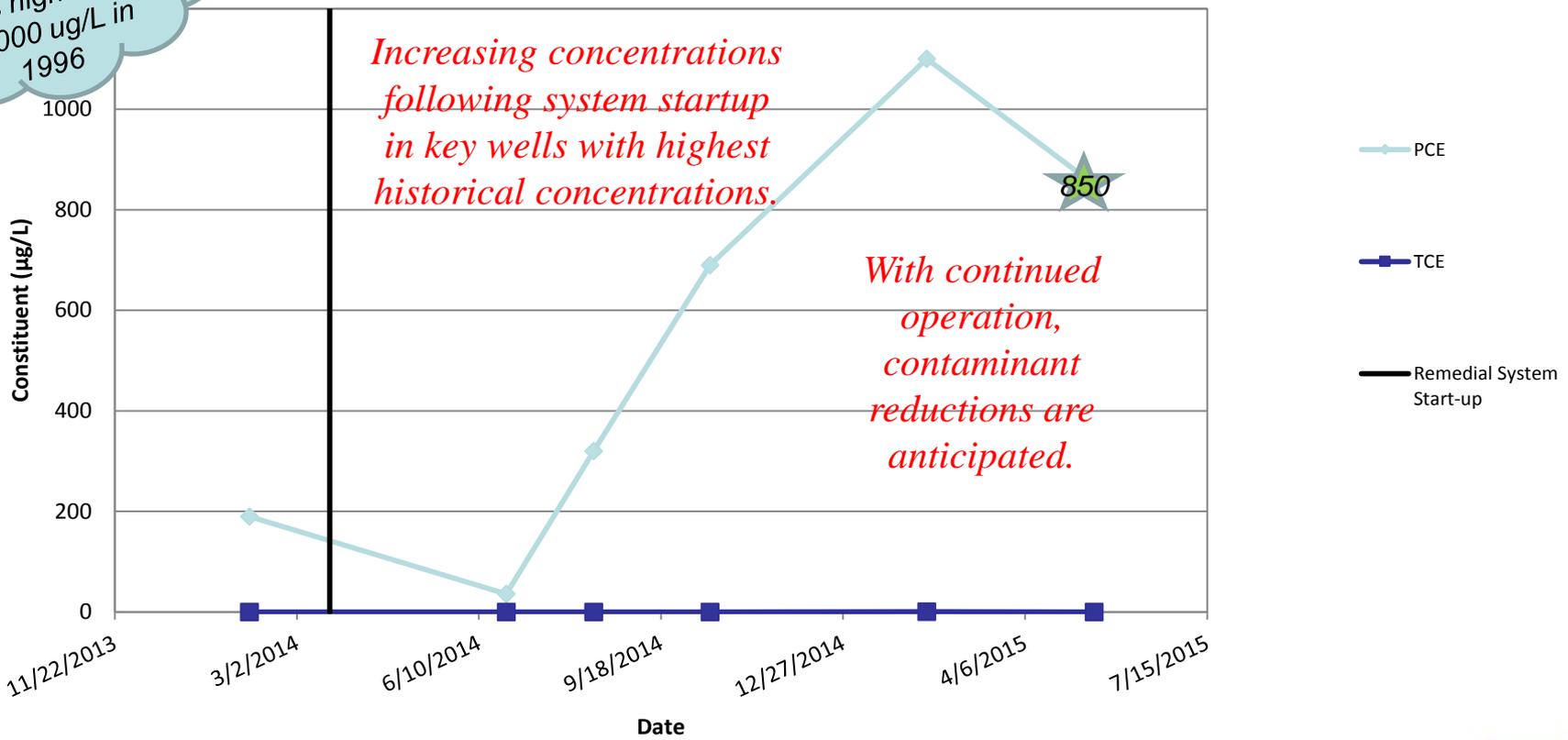


AOC 2 – Performance Summary



Historical concentrations as high as 45,000 ug/L in 1996

MW-2-VERSAR

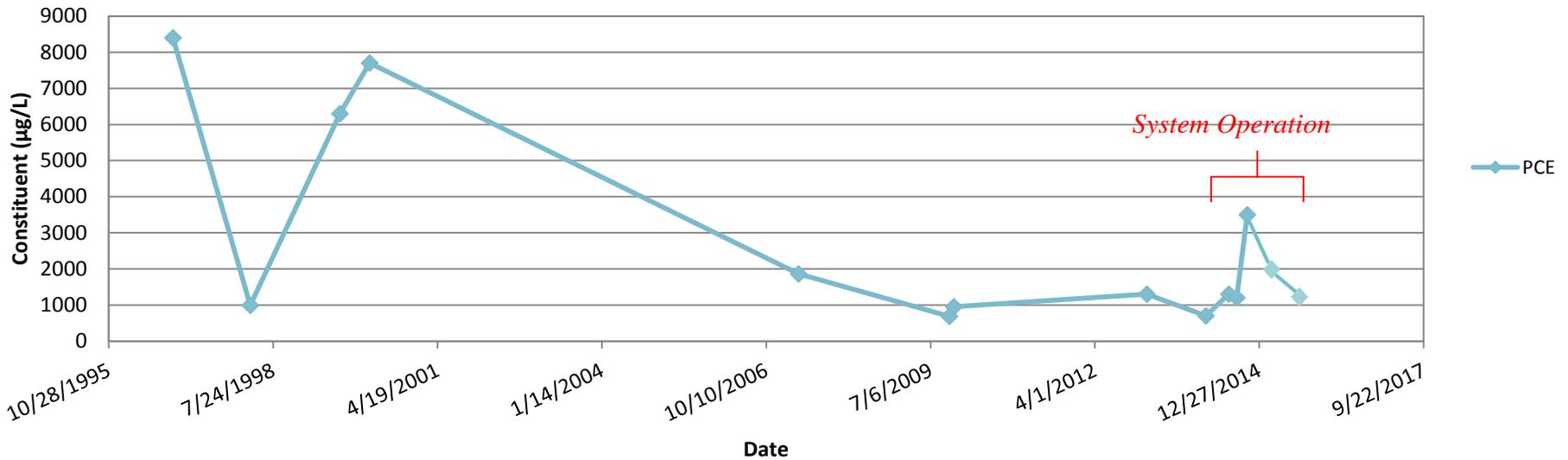


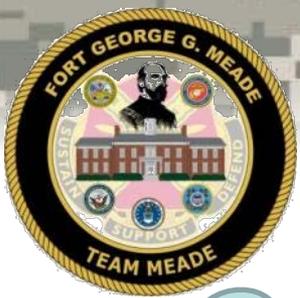


Historical Data

(to put current concentrations into perspective)

MW-3-VERSAR



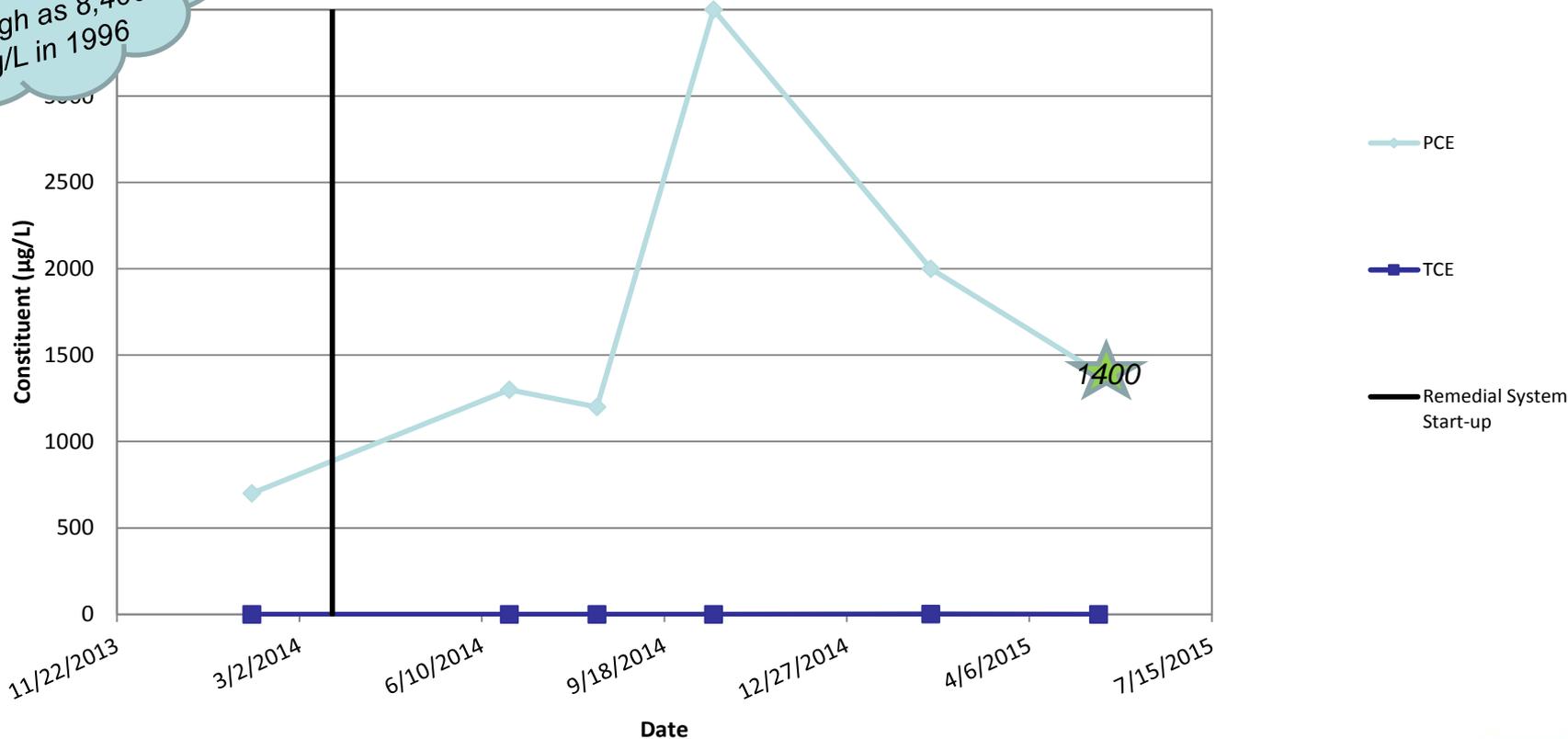


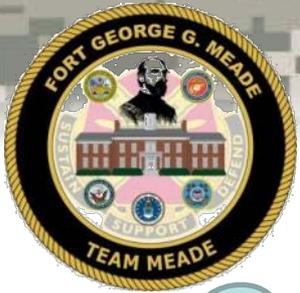
AOC 2 – Performance Summary



Historical concentrations as high as 8,400 ug/L in 1996

MW-3-VERSAR



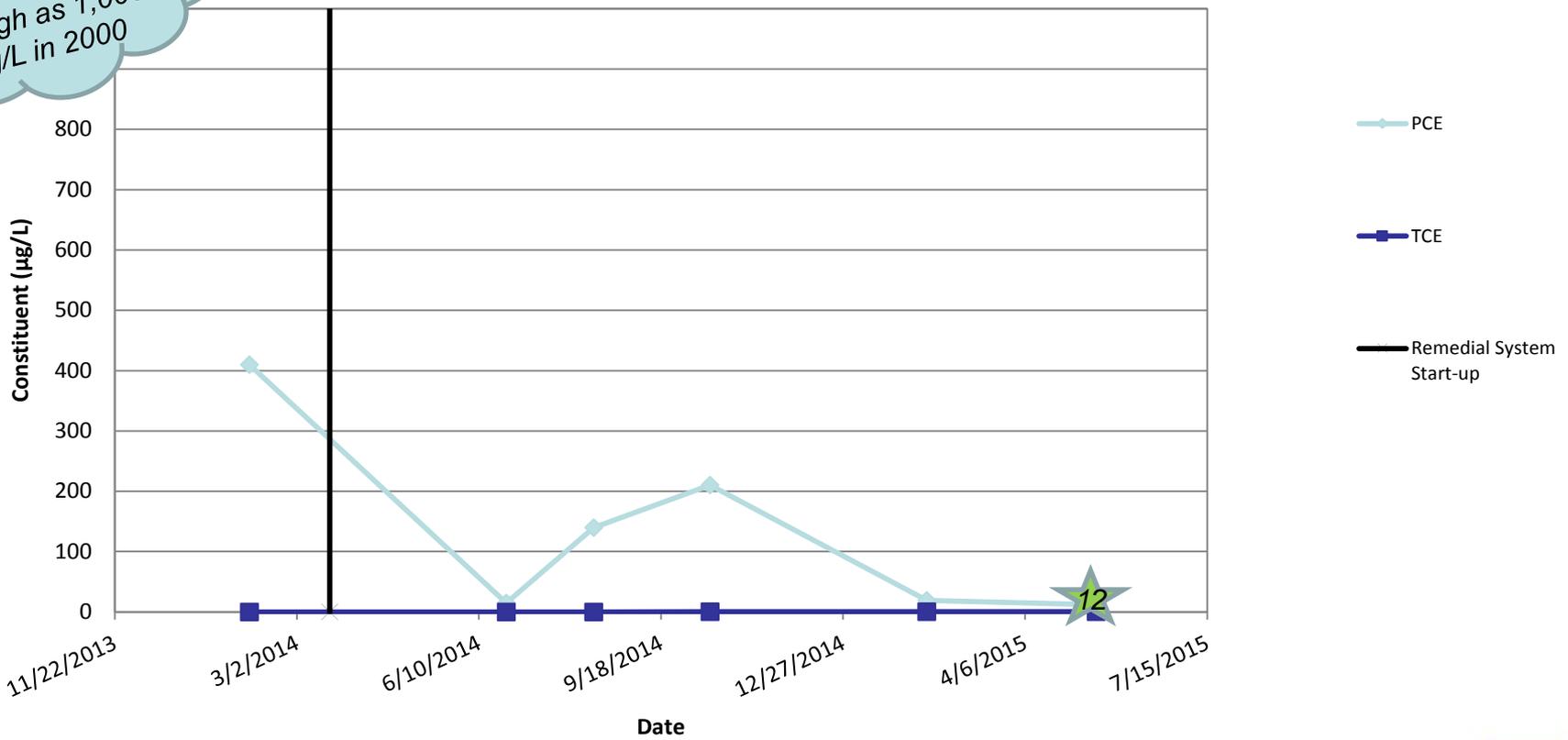


AOC 2 – Performance Summary



Historical concentrations as high as 1,000 ug/L in 2000

MW-1-VERSAR



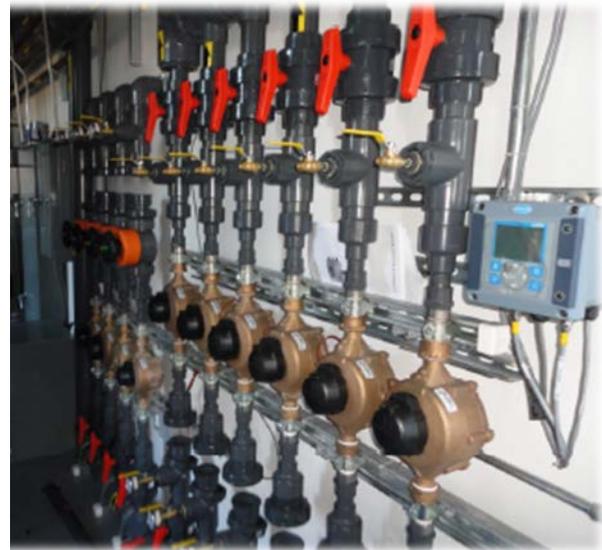
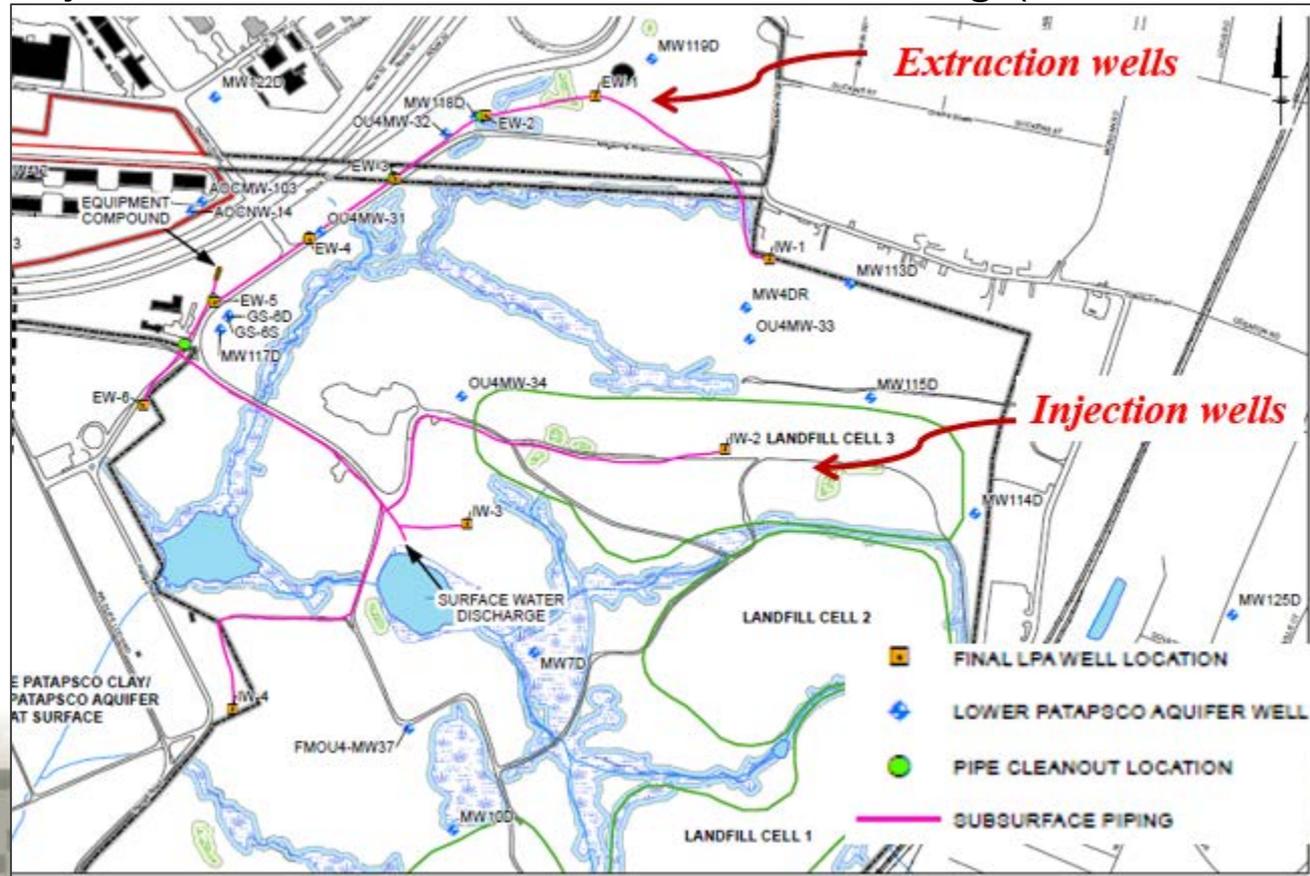


Second Quarter '15 Highlights



IMCOM
SOLDIERS • FAMILIES • CIVILIANS

- **OU-4 (AOC 3: LPA Extraction/Injection System)**
 - More than **100 million gallons** of groundwater extracted, treated, and reinjected to enhance contaminant flushing (since March '14).





Upcoming Activities July - September '15



OU-4

- Quarterly sampling at AOCs 1 and 2 (August 2015)
- Continued Operation and Maintenance activities on OU-4 groundwater remedial systems.
- Extensive annual O&M operations on the LPA extraction/injection system:
 - Well Redevelopment (at all 10 injection/extraction wells)
 - Granular Activated Carbon (GAC) change-out (four 2,000 lb vessels)
 - Backwash tank clean-out
 - Pressure transmitter replacement
- Survey ISCO injection-area wells in AOC 1 following paving.
- Third full-scale ISCO injection in AOC 1 (tentatively scheduled for Q4 2015)



ARMY STRONG.



Upcoming Activities July - September '15



Manor View

- Annual mowing, maintenance of soil cover, soil gas monitoring, groundwater sampling, and indoor air sampling

Closed Sanitary Landfill (CSL)

- Semi-annual groundwater monitoring event

Former Mortar Range

- Annual inspection for LUCs, including signage.
- Quarterly reports summarizing 3rd quarter activities will be prepared for each site.



ARMY STRONG.™



U.S. Army Garrison Fort George G. Meade
Directorate of Public Works-Environmental Division
4216 Roberts Ave, Suite 5115
Fort Meade, Maryland 20755-7068

Points of Contact:

Mr. George B. Knight, PG, Environmental Restoration Manager
301.677.7999

george.b.knight7.civ@mail.mil

Ms. Denise Tegtmeyer, PE, Senior Project Manager, Sundance Consulting, Inc.
301.677.9559

denise.a.tegtmeyer.ctr@mail.mil



ARMY STRONG.