



## DEPARTMENT OF THE ARMY

OFFICE OF ASSISTANT CHIEF OF STAFF FOR INSTALLATION MANAGEMENT  
U.S. ARMY FORT MONMOUTH  
P.O. 148  
OCEANPORT, NEW JERSEY 07757

July 24, 2013

Ms. Linda Range  
New Jersey Department of Environmental Protection  
Case Manager  
Bureau of Southern Field Operations  
401 East State Street, 5<sup>th</sup> Floor  
P.O. Box 420/Mail Code 401-05F  
Trenton, NJ 08625-0028

**Re: Summer 2013 Comprehensive Groundwater Sampling Event using LFPS & PDB Methods at Fort Monmouth, Oceanport, Monmouth County, New Jersey**

Dear Ms. Range:

A comprehensive round of groundwater sampling is scheduled to be performed in monitoring wells at Fort Monmouth (FTMM), Oceanport, Monmouth County, New Jersey (the Site) from 5 August 13 to 5 September 13. The purpose of the sampling is to obtain a good "snap shot" of groundwater conditions at the Site to help guide future investigation and long-term monitoring programs.

The proposed groundwater sampling program this summer includes the use of the low flow purge and sampling (LFPS) method (similar to previous sampling programs); in addition, FTMM would like to use passive diffusion bag (PDB) samplers in wells where VOCs are the only target analytes. In total, 164/87 wells will be sampled as part of this summer sampling program, and we propose to use PDBs at 107/53 of the wells. The PDBs are anticipated to be deployed for a period of 14 days (2 weeks) for this sampling program. The PDBs will be deployed within the saturated screened interval at least 2 feet below the anticipated low water table in each well during the sampling event; in general, we anticipate less than 10 feet of saturated well screen in most wells since the sampling event will be in the summer months. At a subset of the wells proposed to be sampled using PDBs, we intend to first collect duplicate samples using LFPS, which will generate data that will be useful in evaluating the performance of the PDBs at FTMM.

We have evaluated the use of PDBs at FTMM in the context of the general requirements in the New Jersey Department of Environmental Protection's Field Sampling Procedures Manual (and other relevant EPA guidance documents on the use of PDBs) and determined that this method is applicable for use at selected wells at FTMM. The use of PDBs at FTMM is appropriate considering 1) that the shallow groundwater occurs in the Red Bank and Tinton Sands (both unconsolidated), both of which are generally clayey, medium to coarse-grained sands that contain glauconite, 2) that groundwater is expected to flow through the water table wells constructed in these formation materials (i.e., no flow diversion around the wells), 3) there

are no anticipated preferential flow paths in the formation materials in which the wells are screened, and 4) the volatile constituents being sampled are consistent with the use of passive diffusion bags.

Given that the wells at FTMM have previously been sampled many times using LFPS methods, exploring the use of PDBs at selected wells at this stage in the long-term monitoring process makes logical sense.

Also, in the next several months, FTMM will be providing you with a *Long-Term Groundwater Monitoring Work Plan for Remedial Investigations, Feasibility Studies and Decision Documents* that will contain details on the scope of work, sampling methodologies, and proposed use of PDB samplers at the Site. This letter is intended to provide you with advance notice of our planned use of PDBs in the short-term, given the timing of our upcoming comprehensive sampling program this summer.

Should you have any questions or require additional information, please contact the undersigned at (732) 380-7064 or by email at [wanda.s.green2.civ@mail.mil](mailto:wanda.s.green2.civ@mail.mil).

Sincerely,

A handwritten signature in cursive script that reads "Wanda Green".

Wanda Green  
BRAC Environmental Coordinator