U.S. Army Corps of Engineers, New York District and Engineering and Support Center, Huntsville, Alabama, Worldwide Environmental Restoration Services

PROPOSED PLAN FOR SITE FTMM-53

Fort Monmouth, Oceanport, Monmouth County, New Jersey **August 2020**

INTRODUCTION

The U.S. Army is presenting this **Proposed Plan*** for the public to review and comment regarding the remedial approach proposed for Site FTMM-53 at Fort Monmouth (FTMM) in Monmouth County, New Jersey. The U.S. Army (Army) is the lead agency for FTMM in accordance with the **Defense Environmental Restoration Program (DERP)** (10 U.S.C. §2701 et. seq.). New Jersey Department of Environmental Protection (NJDEP) is the state regulatory agency which administers the State's Site Remediation Program under the Technical Requirements for Site Remediation (N.J.A.C. 7:26E). NJDEP, in consultation with the Army, will make the final selection of the response action for FTMM-53.

This site is classified as a **Petroleum, Oil, and Lubricant (POL)** site and therefore is exempt from the **Comprehensive Environmental Response, Compensation and Liability Act (CERCLA)** of 1980 (42 U.S.C. §§9601(14) and 9604(a)(2)) process. However, the Army's authority to investigate and remediate environmental contamination, as described in the Defense Environmental Response Program Manual (DoDM 4715.20, 9 March 2012), requires all such investigations and remedy selection processes be consistent with CERCLA. For POL sites, and other Resource Conservation and Recovery Act (RCRA) corrective action responses, the DoD interprets "consistent with" to mean public participation prior to remedy selection, as described in the National Oil and Hazardous Substances Pollution Contingency Plan (NCP 40 CFR Part 300). A CERCLA risk assessment was not performed, and the NJDEP soil cleanup standards and **Ground Water Quality Standards (GWQS)** were used to evaluate the need for remediation.

A Remedial Action Report (RAR) was prepared for FTMM-53 in 2019 to document the remedial actions completed at FTMM-53. A Remedial Investigation Report/Remedial Action Workplan (RIR/RAWP) was prepared in 2018 to characterize the nature and extent of site-related contamination, describe previous remedial actions, and propose a final remedial action. The RIR/RAWP identified fuel-related **volatile organic compounds (VOCs)** as **constituents of concern (COCs)** in soil and **groundwater**. The **remedial investigation (RI)** sampling results indicated that active remediation is not required at FTMM-53 based on historical investigations/remediation work and expected future industrial and institutional/civic land use.

This Proposed Plan describes the final remedial actions for FTMM-53 which will include **land use controls (LUCs)** in the form of a **Deed Notice** for fuel-contaminated soils, a **Classification Exception Area (CEA)/Well Restriction Area (WRA)** to control exposure to fuel-related VOCs in groundwater, and **monitored natural attenuation (MNA)** to document the natural degradation of VOCs over time. The CEA/WRA would remain in place until NJDEP GWQS for COCs are achieved at the site.

PLEASE MARK YOUR CALENDAR
PUBLIC COMMENT PERIOD:
August 17, 2020 – September 17, 2020
The Army will accept written comments on the Proposed Plan during the public comment period. Written comments may be postmarked or emailed by **September 17, 2020** and sent to:

BRAC Environmental Coordinator
OACSIM - U.S. Army Fort Monmouth
Attn: Mr. William Colvin
P.O. Box 148
Oceanport, NJ 07757
Email: william.r.colvin18.civ@mail.mil

The Proposed Plan can be viewed at www.fortmonmouthrecords.com or subject to COVID-19 restrictions at the Fort Monmouth Environmental Restoration Public Information Repository (the Administrative Record) at the following location:

Monmouth County Library, Eastern Branch
1001 Route 35, Shrewsbury, NJ
Phone: (732) 683-8980

* Words or phrases shown in **BOLD** are defined in the glossary at the end of this document.

PUBLIC INVOLVEMENT PROCESS

As the lead agency for implementing the environmental response program at FTMM, the Army has prepared this Proposed Plan in accordance with the public outreach requirements of the **New Jersey Administrative Code (N.J.A.C.)** 7:26C-1.7 since the release identified at FTMM-53 is petroleum hydrocarbons and therefore excluded under CERCLA. In order to continue its community awareness efforts and to encourage public participation, after the public has the opportunity to review and comment on this Proposed Plan, the Army will respond to the comments received during the public comment period. Information on the public comment period is shown in the box on Page 1.

Local community members and other interested parties are encouraged to review this Proposed Plan and submit comments. The Army will carefully consider all comments received from the public and provide responses which will be compiled into a **Responsiveness Summary**. The decision on which actions will be taken for FTMM-53 will be documented in a **Record of Decision (ROD)**, which will include the Responsiveness Summary.

This Proposed Plan summarizes information that can be found in greater detail in the RIR/RAWP for FTMM-53 (Parsons, 2018), the RAR for FTMM-53 (Parsons, 2019), and other documents contained in the FTMM **Administrative Record** file and on the website listed on the front page of this Proposed Plan. The Army encourages the public to review these documents to gain a more comprehensive understanding of the site and all associated activities.

SITE BACKGROUND

FTMM is located in the central-eastern portion of New Jersey in Monmouth County, approximately 45 miles south of New York City, New York, 70 miles northeast of Philadelphia, Pennsylvania, and 40 miles east of Trenton, New Jersey. The Atlantic Ocean is approximately 3 miles to the east. FTMM was comprised of three areas: the Main Post (MP), the Charles Wood Area (CWA), (Figure 1), and the Evans Area (EA) (not shown).

FTMM's MP and CWA were selected for closure by the Base Realignment and Closure (BRAC) Commission in 2005, and officially closed on 15.

Figure 1 - Fort Monmouth Location

September 2011. The EA was closed under BRAC in 1998 and has since been transferred from FTMM

FTMM-53 is located in the central portion of the MP (Figure 2) and includes Building 699. FTMM-53 was a former fueling station and repair facility for nonmilitary vehicles that was constructed in 1953. Gasoline was distributed from two remote pumping islands with a total of four dispensers. The tank system initially included four 4,000-gallon steel underground storage tanks (USTs) northwest of Building 699 that were removed in 1999 (Figure 3). Six 10,000-gallon USTs were installed northeast of Building 699, which were then removed in April 2007 and replaced with two 10,000-gallon aboveground storage tanks (ASTs) that were in use until base closure in 2011.

The piping and dispensing islands were replaced and a **light non-aqueous phase liquid (LNAPL)** recovery well with a dual pump system was installed after a fuel release was identified in 1990. A groundwater remediation system was installed in 2001 consisting of multiple groundwater recovery, **air sparging**, and **soil vapor extraction (SVE)** wells and a groundwater and vapor treatment system. This system was operated until FTMM closure in 2011, and then again intermittently until active remediation was discontinued with NJDEP approval in 2013. Five hydraulic lifts were located in Building 699.

SITE CHARACTERIZATION

Major vegetation zones at the MP consist of landscaped areas, wetlands, **riparian** areas, and upland forests. Much of the MP upland areas consist of extensive areas of grass lawns and landscaped areas. In contrast, FTMM-53 is

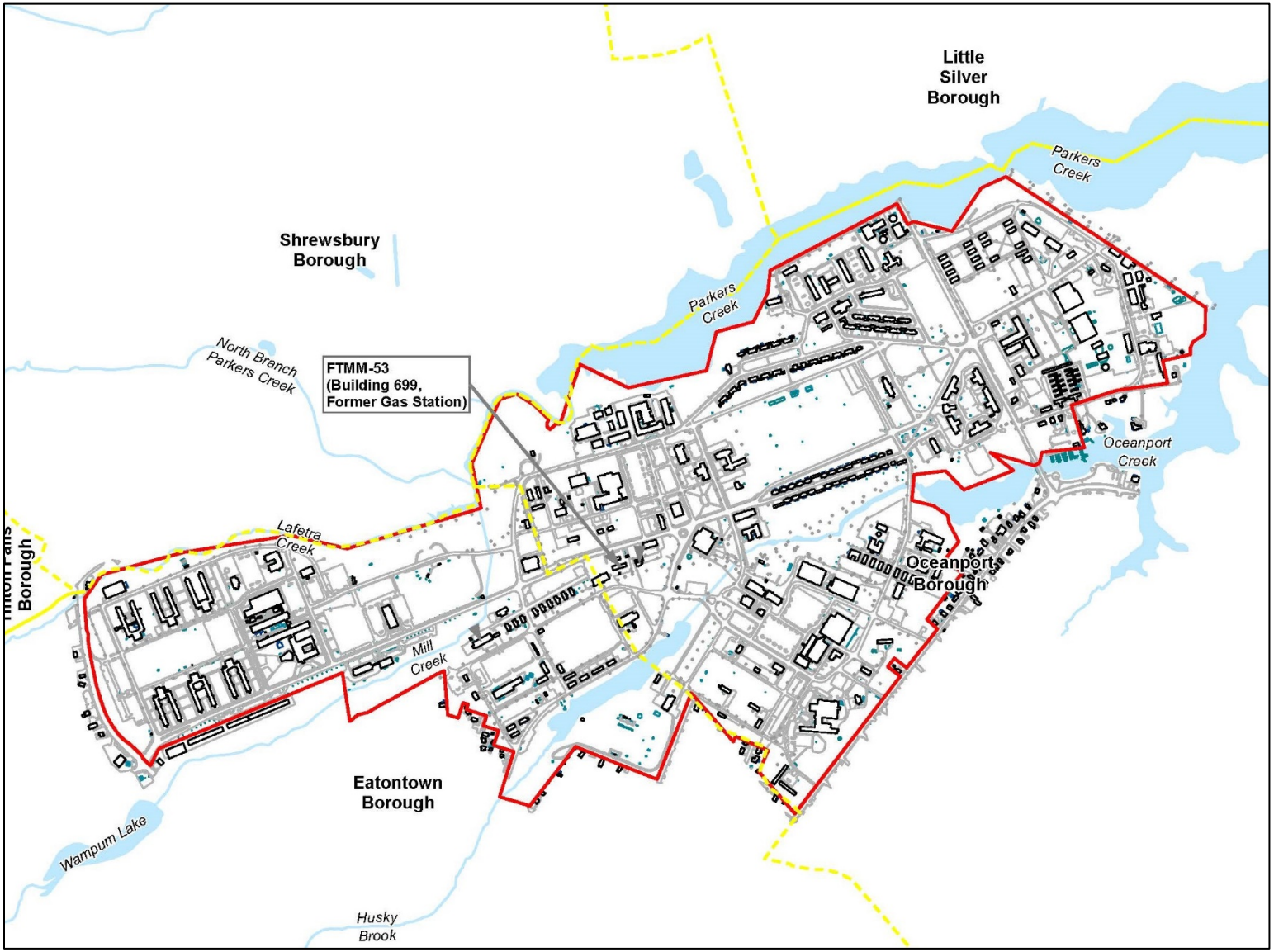

Figure 2 – Location of FTMM-53

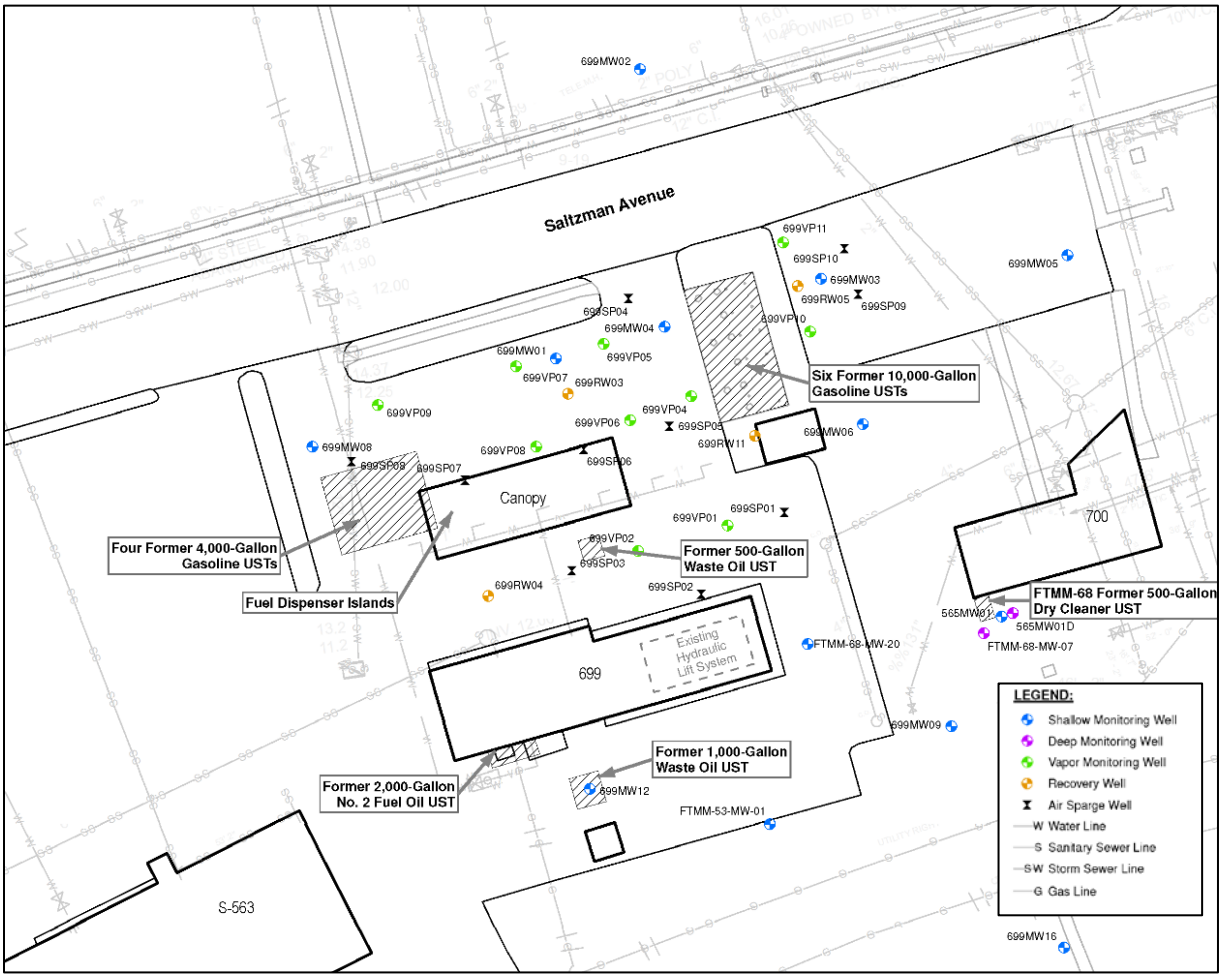

Figure 3 – FTMM-53 Site Layout

covered with pavement and therefore without vegetation. Detailed vegetation information can be found in the Baseline Ecological Evaluation (BEE) Report (Shaw, 2012).

FTMM is situated on Coastal Plain deposits which are unconsolidated material that has not been cemented or compacted. Soil encountered at FTMM-53 is comprised of medium to fine, orange and tan sand and silty sand, and clay, and is likely some combination of fill material and surficial deposits belonging to the Cape May Formation Unit 2.

New Jersey GWQS classify groundwater for FTMM as Class II-A: **potable water** with secondary uses including agricultural and industrial (NJDEP, 2010). The depth to groundwater at FTMM-53 typically ranges from 6 to 9 feet below ground surface (bgs). Groundwater migrates towards the south and southeast (i.e., toward Husky Brook).

The FTMM Reuse and Redevelopment Plan (EDAW, 2008) indicates that the anticipated future land use at FTMM-53 is for mixed use industrial and institutional/civic purposes; institutional/civic uses may include schools (educational) and administrative uses. A residential scenario is not currently anticipated for the site; however, the applicable remediation standards for remedial efforts at FTMM-53 are the September 2017 NJDEP Residential Direct Contact Soil Remediation Standards (RDCSRS) for soil and July 2010 GWQS for groundwater. As described below, at FTMM-53 there are exceedances of the RDCSRS and GWQS for both soil and groundwater, respectively.

To determine the nature and extent of contamination at the site, chemical concentrations measured during the RI were compared to NJDEP residential, non-residential, and **Impact to Groundwater (IGW)** screening criteria as well as FTMM-specific background

concentrations for metals (Weston, 1995). NJDEP comparison criteria included:

- RDCSRS, Non-Residential Direct Contact Soil Remediation Standards (NRDCSRS), and IGW screening levels (SLs) for soil;
- GWQS for groundwater; and
- NJDEP nonresidential Soil Gas Screening Levels (SGSLs) for **soil gas/vapor intrusion (VI)**.

The above criteria were used to identify those chemicals that are COCs at FTMM-53. Based on the RI sampling performed in 2015, COCs in soil that exceed the RDCSRSs include benzene and naphthalene. COCs in groundwater that exceed the GWQS include benzene, xylenes, 1,2,4-trimethylbenzene (TMB), and 1,3,5-TMB.

The following subsections describe site characterization activities for soil, groundwater, and soil gas/indoor air and a summary of the remedial measures conducted at FTMM-53. The Final RIR/RAWP was submitted to NJDEP in January 2018 and the Army received NJDEP's comments with no objections to the proposed remedy in May 2018.

Summary of Investigations and Remedial Measures

In 1989, approximately 11,000 gallons of gasoline were released into soil surrounding the gasoline USTs and associated fuel dispenser piping. The piping and dispensing island were replaced and an LNAPL recovery well with a dual pump system was installed immediately after the release. A total of 6,733 gallons of LNAPL were recovered by the summer of 1990. These recovery wells are no longer active.

In September 1999, four abandoned 4,000-gallon steel gasoline USTs were removed. The tanks were located northwest of Building 699 near the western end of the fueling island canopy. Numerous corrosion holes in the USTs were observed, and the surrounding soil was visually contaminated. A fuel sheen was observed on the groundwater surface at a depth of 10 feet bgs (Versar, 2001). NJDEP approval of No Further Action (NFA) for the four 4,000-gallon steel gasoline USTs was received in a letter dated January 10, 2003 (NJDEP, 2003).

The removed USTs were replaced with six 10,000-gallon USTs that were installed northeast of Building 699. The six USTs were removed in April 2007 and replaced with two 10,000-gallon aboveground storage tanks (ASTs) which were in use until base closure in 2011. The ASTs were pumped out, fuel piping was blown out with nitrogen, and any residual product was drummed and properly disposed of. The ASTs, associated piping, and the dispensing islands were removed in April 2019.

In 1993, 27 soil samples were collected on the east side of the site at 5.5 feet below ground surface (bgs) at the soil-groundwater interface to define the extent of gasoline contamination from the 1989 release from the gasoline USTs (GES, 1999). In 1993 and 1999, respectively, FTMM prepared a RAWP and subsequent RAWP Addendum at the request of NJDEP that proposed the installation of an SVE system and a groundwater pump and treat system with one recovery well to augment LNAPL recovery (GES, 1999). A groundwater remediation system consisting of multiple groundwater recovery, air sparging, and SVE wells as well as a groundwater and vapor treatment system was subsequently installed and began operation in 2001. This system was operated until FTMM closure in 2011, and then again intermittently until active remediation was discontinued with NJDEP approval in 2013.

A 1,000-gallon, single wall, steel waste oil UST located south of the western half of Building 699 (Figure 3) was removed in January 1992. No holes were noted during removal, and there was no visual evidence of contaminated soil. Monitoring well 699MW12 was installed at the location of the former waste oil UST in October 1992 (Weston, 1993a). Verbal approval of the tank closure report was received from NJDEP in January 2004 (Appendix G of U.S. Army, 2007).

A former No. 2 fuel oil UST located immediately south of Building 699 (Figure 3) was removed in June 1998 (GES, 1999). NJDEP approval for NFA for the No. 2 fuel oil UST was received in a letter dated January 10, 2003 (NJDEP, 2003).

In October 2000, a 500-gallon waste oil UST was removed from the north side of Building 699 (U.S. Army, 2000). Signs of corrosion were observed, but no holes were apparent. Soil samples were collected, and the results exceeded the RDCSRS for benzene and naphthalene. This area will be included in the LUCs for the site.

Proprietary biological enhancements (i.e., enzymes, nutrients, and a bacterial consortium) were injected into the shallow subsurface in November 2000 to accelerate remediation of petroleum contaminants in "hot spot" areas that were not being effectively addressed by the SVE system. Prior to the injection, soil at 83 locations across the site was sampled using a Geoprobe®, and select locations were re-sampled six months after the injection (Versar, 2000b and 2002).

From April 1997 through June 2011, FTMM-53 monitoring wells were sampled quarterly. In August 2013 a groundwater sampling event was conducted at 21 FTMM sites (including FTMM-53) to re-establish baseline groundwater conditions following temporary suspension of groundwater sampling in late 2011. Groundwater monitoring at a subset of site wells occurred quarterly at FTMM-53 from March 2014 until November 2015. NJDEP agreed to a temporary suspension of quarterly monitoring (letter dated March 16, 2016). In September 2015, Parsons performed an RI data gap investigation at FTMM-53 that involved soil and groundwater sampling and performance of aquifer slug tests. Results of this investigation are summarized in the RIR/RAWP (Parsons, 2018). Areas identified during the RI data gap investigation with RDCSRS exceedances will be included in the Land Use Controls (LUCs) for the site. Groundwater monitoring will resume following completion and final review/acceptance of the Classification Exception Area/Well Restriction Area (CEA/WRA) by NJDEP.

Five in-ground hydraulic lifts were located in each of the service bays on the east end of Building 699. Visual inspections of the hydraulic oil within each of the lifts was initiated in October 2017, and additional sampling and analysis of soil and groundwater was performed in July 2019 to address NJDEP comments related to the hydraulic lifts. Soil sampling results from borings adjacent to the lifts indicated no evidence of a release to soil. However total **semi-volatile organic compound (SVOC) tentatively identified compounds (TICs)** in temporary wells exceeded the GWQS; some of the TICs were similar to brake fluids or antifreeze, and therefore may be related to the FTMM-53 former gas station operations. The residual oil was completely removed from the hydraulic lifts in October 2019, and the lift reservoirs are now empty. The hydraulic lifts area will be included in the CEA/WRA for the site.

Soil Gas/Indoor Air

Near-slab soil gas samples and indoor air samples were collected adjacent to and within Building 699, respectively, in 2007. A subsequent sampling event in 2012 included collection of sub-slab soil gas samples and indoor air samples beneath and within Building 699, respectively. Based on historical groundwater analytical data and VI data collected in 2012, it was concluded that groundwater was acting as a source for VOC contamination detected in sub-slab soil gas at Building 699. However, given that the VOCs were not detected in indoor air, the VI pathway for targeted VOCs at Building 699 was considered incomplete.

Conceptual Site Model

Current or potential future human receptors at FTMM-53 include workers, institutional/civic users, school and administrative personnel and students, and possibly future residents (with groundwater used as a potable water source). Potentially complete exposure pathways (either currently or under hypothetical future scenarios) include incidental ingestion of or dermal contact with contaminated soil or groundwater, inhalation of dust or vapor containing volatilized chemicals, and ingestion of groundwater as a potable water source.

REMEDIAL ACTION APPROACH

This Proposed Plan recommends actions to address residual soil and groundwater contamination at FTMM-53 that exceed NJDEP criteria and may pose a risk to human health and the environment. The objective of the remedial action is to protect human health by eliminating exposure to fuel hydrocarbon contamination that will remain in-place in soil and groundwater at FTMM-53 at concentrations greater than the RDCSRS and GWQS, respectively.

The proposed remedial approach for FTMM-53 was developed in accordance with the N.J.A.C 7:26E-5.1, and will include **Land Use Controls (LUCs)** in the form of a Deed Notice to control exposure to COCs in soil, a CEA/WRA to control exposure to COCs in groundwater, and MNA to

document the natural degradation of COCs over time.

LUCs will be used to prevent uncontrolled exposure of potential receptors to contaminated media. A groundwater use restriction will be established in the form of a CEA/WRA in accordance with NJDEP's Technical Requirements for Site Remediation (TRSR) (N.J.A.C. 7:26E) and Administrative Requirements for the Remediation of Contaminated Sites (N.J.A.C. 7:26C).

Groundwater at FTMM-53 is not currently used as a drinking water source. Concentrations of the fuel hydrocarbons 1,2,4-TMB, 1,3,5-TMB, benzene, m,p-xylene, tetrachloroethene (PCE), total xylenes, and total volatile and semivolatile TICs have recently been detected in FTMM-53 groundwater at concentrations greater than their NJDEP GWQS (Figure 4). A CEA/WRA application will be prepared pursuant to N.J.A.C. 7:26C-7.3. The CEA/WRA is a groundwater use restriction to protect a hypothetical residential user from potential risk associated with groundwater used as a potable water source. The CEA/WRA will remain in place until NJDEP GWQS are achieved.

A Deed Notice will be prepared and filed pursuant to N.J.A.C. 7:26C-7.2 to address the presence of the fuel hydrocarbon contamination (i.e., benzene and naphthalene) above NJDEP RDCSRS remaining in site soil (Figure 5). The Deed Notice will serve to prevent potential exposure to contaminants that will remain in-place at the site. Use of the site will be restricted to non-residential purposes.

MNA relies on natural processes to achieve applicable groundwater remediation standards. Based on the long-term monitoring (LTM) results reflecting decreased COC concentrations in groundwater and conclusions of the RIR/RAWP, MNA has been selected as an appropriate remedy for fuel hydrocarbon contamination in groundwater at FTMM-53. The site has an existing network of monitoring wells that have been sampled for site-related contaminants for 17 years. Fuel hydrocarbon concentrations in groundwater have decreased substantially since quarterly monitoring began in 1997. The groundwater contaminant plume (Figure 4) is mature and stable to diminishing, and fuel hydrocarbon concentrations in groundwater have been reduced substantially due to a combination of in situ remediation and natural attenuation. The MNA program at FTMM-53 will be conducted in accordance with NJDEP's Site Remediation Program MNA Guidance (NJDEP, 2012) with periodic monitoring to evaluate changes in groundwater contaminant concentrations.

The Army will prepare a **LUC Implementation Plan (LUCIP)** to document the controls and identify procedural responsibilities including groundwater monitoring and MNA reporting, and long-term stewardship responsibilities. When the property is transferred to private ownership out of federal control, the LUCs will be recorded against the property, and the new owner will be responsible for complying with the LUCs. While the Army may later transfer its procedural responsibilities to another party by contract, property transfer agreement, or through other means, the Army retains ultimate responsibility for remedy integrity until groundwater contaminant concentrations are in compliance with NJDEP GWQS.

COMMUNITY PARTICIPATION

Public participation is an important component of remedy selection. The Army is soliciting input from the community on the proposed remedial approach identified for FTMM-53. The Army and the NJDEP encourage the public to gain a more comprehensive understanding of the site and the remedial activities that have been conducted at FTMM-53. The dates for the public comment period and the locations of the Administrative Record files are provided on the front page of this Proposed Plan.

The Army will respond to the comments received during the public comment period. Information on the public comment period is provided in the box on Page 1.

Local community members and other interested parties are encouraged to review this Proposed Plan and submit comments. The Army will carefully consider all comments received from the public and provide responses which will be compiled into a **Responsiveness Summary**. The decision on which actions will be taken for FTMM-53 will be documented in a ROD, which will include the Responsiveness Summary.

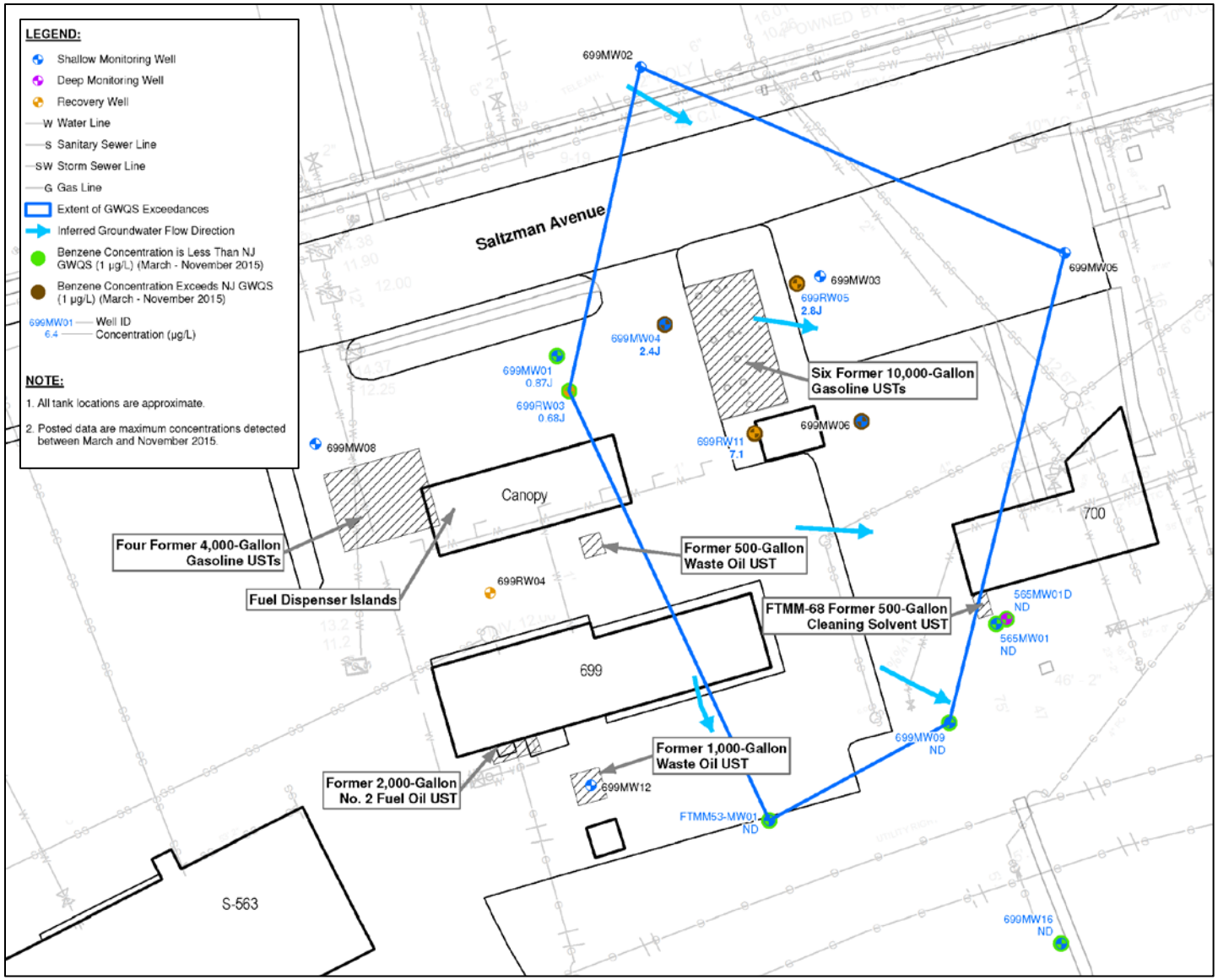

Figure 4 – Benzene Concentrations in Groundwater at FTMM-53

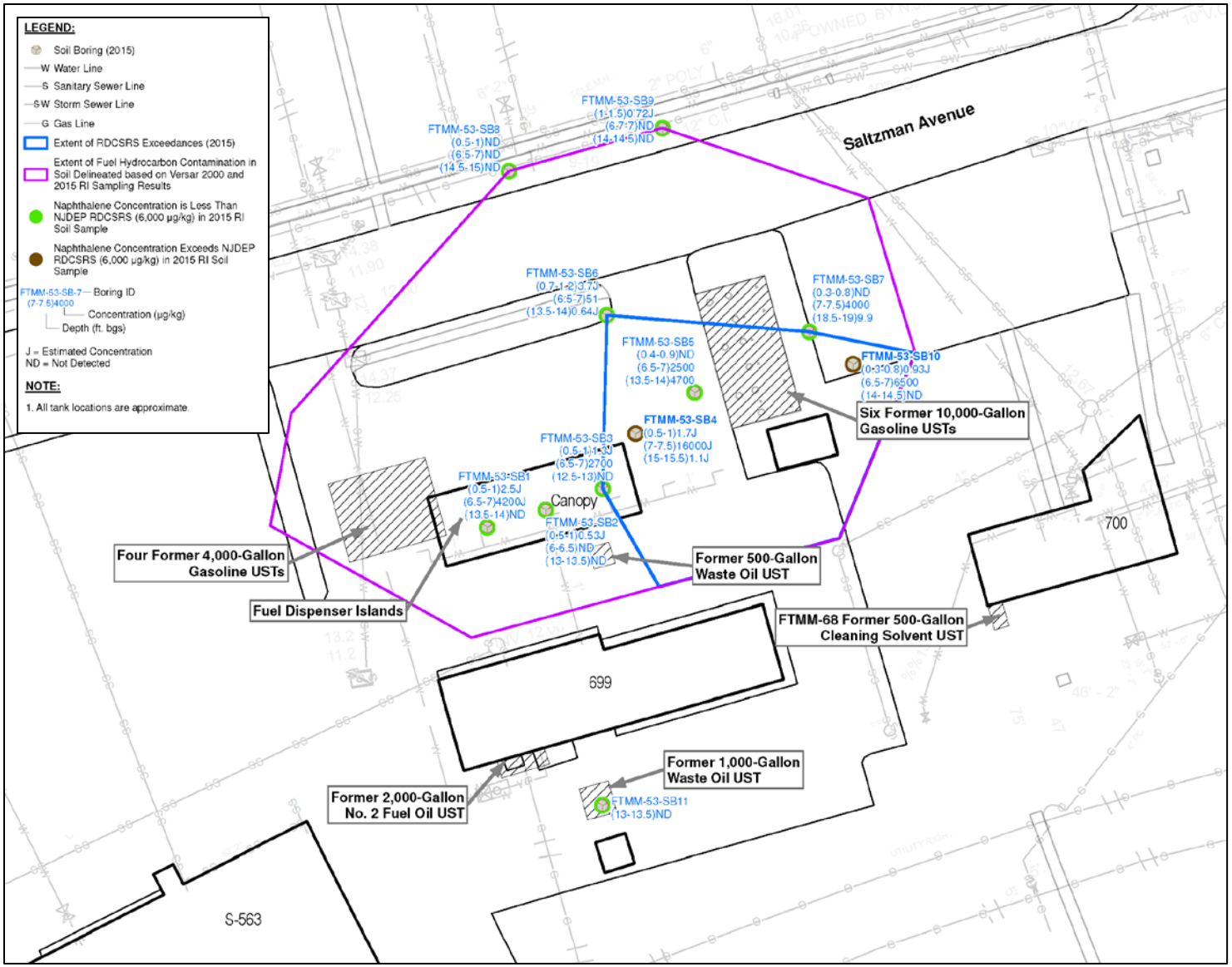

Figure 5 – Naphthalene Concentrations in Soil at FTMM-53

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1 ACRONYMS AND ABBREVIATIONS

ACRONYM	DEFINITION
AST	aboveground storage tank
BEE	Baseline Ecological Evaluation
bgs	below ground surface
BRAC	Base Realignment and Closure
CEA/WRA	Classification Exception Area/Well Restriction Area
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
COCs	constituent of concern
CWA	Charles Wood Area
EA	Evans Area
FTMM	Fort Monmouth
GWQS	Ground Water Quality Standard(s)
IGW	Impact to Groundwater
LNAPL	light non-aqueous phase liquid
LTM	long-term monitoring
LUCs	land use controls
LUCIP	Land Use Controls Implementation Plan
MNA	monitored natural attenuation
MP	Main Post
NCP	National Contingency Plan
NFA	No Further Action
N.J.A.C.	New Jersey Administrative Code
NJDEP	New Jersey Department of Environmental Protection
NRDCSRS	Non-Residential Direct Contact Soil Remediation Standard
PCE	Tetrachloroethene
POL	Petroleum, oil and lubricant
RAR	Remedial Action Report
RCRA	Resource Conservation and Recovery Act
RDCSRS	Residential Direct Contact Soil Remediation Standard
RI	remedial investigation
RIR/RAWP	Remedial Investigation Report/Remedial Action Workplan
ROD	Record of Decision
SL	screening level
SGSLs	Soil Gas Screening Levels
SVE	soil vapor extraction
SVOCs	Semi-volatile organic compounds
TMB	Trimethylbenzene
TIC	tentatively identified compound
TRSR	Technical Requirements for Site Remediation
UST	underground storage tank
VI	vapor intrusion
VOCs	volatile organic compounds

GLOSSARY OF TERMS

Administrative Record – A file that contains all information used by the lead agency to make its decision on the selection of a response action under CERCLA. A copy of this file is to be available for public review at or near the site, usually at the information repository.

Air Sparging – The injection of air or oxygen through a contaminated aquifer or media to remove VOCs and SVOCs by volatilization. Injected air traverses horizontally and vertically in channels through the soil column, creating an underground stripper.

Classification Exception Area (CEA) – A NJDEP designation established whenever groundwater standards in a particular area are not met. It ensures the use of the groundwater in that area is restricted until standards are achieved.

Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA, otherwise known as Superfund) – A federal law that addresses the funding for and remediation of abandoned or uncontrolled hazardous waste sites. This law also establishes criteria for the creation of key documents such as the Remedial Investigation, Feasibility Study, Proposed Plan, and Decision Document.

Constituent of Concern (COC) – A chemical that is present at sufficient concentrations to exceed NJDEP cleanup standards and so may pose a risk to human health or the environment.

Deed Notice – A notification added to the title of a property when contamination will remain above residential or unrestricted soil remediation standards. A Deed Notice requires a property owner's concurrence and specifies the location and concentration of all contaminants and how they must be controlled, maintained or monitored.

Defense Environmental Restoration Program (DERP) - Under DERP, DoD conducts cleanup at active installations, Formerly Used Defense Sites, and BRAC locations. The Army manages the cleanup programs at their active installations and BRAC locations.

Groundwater – Water found beneath the earth's surface that fills pores between materials such as sand, soil, or gravel. In aquifers, groundwater occurs in sufficient quantities that it may be used for drinking water, irrigation, and other purposes.

Ground Water Quality Standards (GWQS) – NJDEP GWQS, N.J.A.C 7:9C, establish the designated uses of the State's groundwater and specify the water quality (criteria) necessary to attain those designated uses. The ground water quality criteria are numerical values assigned to each constituent (pollutant) discharged to groundwater of the State. The GWQS also contain technical and general policies to ensure that the designated uses can be adequately protected. Groundwater is classified according to its hydrogeologic characteristics and designated uses.

Impact to Groundwater (IGW) – A NJDEP soil cleanup standard that is applied in soil above the groundwater table that is designed to be protective of groundwater quality.

Land Use Control (LUC) – Physical, legal, or administrative mechanisms that restrict the use of, or limit access to, real property to manage risks to human health and the environment. Physical mechanisms include physical barriers to limit access to real property, such as fences or signs, providing potable water, as well as a variety of engineered remedies to contain or reduce contamination. Legal mechanisms include zoning, permits, and deed restrictions on property; for example, allowing only commercial or industrial use of a property where contaminants have not been remediated to residential levels.

Land Use Control Implementation Plan (LUCIP) – Documents the LUCs required during and after implementation of the preferred alternative.

Light Non-aqueous Phase Liquid (LNAPL) - A non-aqueous phase liquid (contaminants that remain undiluted as the original liquid in the subsurface, e.g. spilled oil) that is less dense than water. Most common petroleum hydrocarbon fuels and lubricating oils are LNAPLs.

Monitored Natural Attenuation – A remedial approach that involves monitoring of contaminant concentration and natural attenuation parameters that provide an indication of the effectiveness of natural attenuation and progress being made to achieve remedy goals. In general, MNA does not include remediation methods that require human intervention beyond monitoring. However, LUCs, such as use restrictions, may be needed in conjunction with MNA to ensure protection of human health and the environment.

National Contingency Plan (NCP) – National Oil and Hazardous Substances Pollution Contingency Plan, "National Contingency Plan" (40 CFR 300). Provides the organizational structure and procedures for preparing for and responding to discharges of oil and releases of hazardous substances, pollutants, and contaminants.

New Jersey Administrative Code (N.J.A.C.) – The collection of all rules and regulations made by the executive branch agencies of the State of New Jersey.

Petroleum, Oil, and Lubricant (POL) – A broad term that includes all petroleum and associated products used by the Armed Forces.

Potable Water – Water of a quality suitable for drinking

Proposed Plan – A plan that identifies the preferred remedial alternative(s) for a site, and is made available to the public for comment.

Record of Decision (ROD) - A public document that explains which cleanup alternative(s) will be used at a site.

Remedial Investigation (RI) – Exploratory inspection conducted at a site to define the nature and extent of contamination present, and to assess potential related hazards and risks

Responsiveness Summary - A component of the Record of Decision that summarizes information about the comments and views of the public and support agency regarding both the remedial alternatives and general concerns about the site submitted during the public comment period. It also documents in the record how public comments were integrated into the decision-making process.

Riparian – Riparian areas are ecosystems adjacent to a river or waterway that, in an undisturbed state, provide habitat for wildlife and help improve water quality. Riparian areas are usually transitional zones between wetland and upland areas and are generally comprised of grasses, shrubs, trees, or a mix of vegetation types that exist within a variety of landscapes (e.g., natural, agricultural, forested, suburban, and urban).

Semivolatile Organic Compounds (SVOC) – An organic compound which has a boiling point higher than water and which may vaporize when exposed to temperatures above room temperature. SVOCs include phenols and PAH.

Soil Gas - Soil gas or (soil vapor) is air existing in void spaces in the soil between the groundwater and the ground surface.

Soil Vapor Extraction – A vacuum is applied to the soil to induce the controlled flow of air and remove VOCs and some SVOCs from the soil.

Tentatively Identified Compound (TIC) - A compound which is outside the standard list of analytes in a gas chromatography/mass spectrometry analysis, but which is based on a tentative

match between the instrument response and the instrument's computer library. The identification and quantitation of these compounds is speculative.

Vapor Intrusion (VI) - The general term given to migration of VOCs from any subsurface contaminant source, such as contaminated soil or groundwater, through the soil and into an overlying building.

Volatile Organic Compound (VOC) – Organic chemical compound whose composition makes it possible for it to evaporate under normal indoor atmospheric conditions of temperature and pressure.

Well Restriction Area (WRA) – A designated area where NJDEP restricts the potable groundwater use, including the types of wells that can be constructed, sampling of potable water wells, and evaluating the influence of nearby high capacity production wells. This area typically has the same boundary as the CEA.

USE THIS SPACE TO WRITE YOUR COMMENTS

Your input on the Proposed Plan for FTMM-53 is important to the Army. Comments provided by the public are valuable in helping the Army select a remedy for FTMM-53.

You may use the space below to write your comments. Comments must be postmarked by September 15, 2020. Mailed comments should be sent to Mr. William Colvin at the address listed on Page 1. Comments may also be emailed to Mr. Colvin by September 17, 2020 via the following e-mail address: william.r.colvin18.civ@mail.mil. If you have any questions about the comment period, please contact. Mr. Colvin at: william.r.colvin18.civ@mail.mil.

Name: _____

Address: _____

City: _____

State and Zip: _____

Comments: