FORT DRUM

Army Cleanup Program

Installation Action Plan

FINAL

September 2025

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STATEMENT OF PURPOSE

The Installation Action Plan provides evidence that the Army is firmly committed to expeditious identification and cleanup of environmental contamination, and that the installation has a credible, organized program to carry out that commitment. The IAP provides an outline of the total multi-year environmental cleanup program for each site with ongoing or future planned restoration activity and includes: (1) the environmental restoration requirements, (2) the rationale for the selected technical approach, and (3) the foundation to develop corresponding financial needs for each cleanup site.

INSTALLATION OVERVIEW

Installation Name: FORT DRUM

Regulatory Participation - Federal: US Environmental Protection Agency (USEPA), Region II

Regulatory Participation - State: New York State Department of Environmental Conservation (NYSDEC)

Installation Location

State	County	City
NY|New York	045|Jefferson County	FORT DRUM

ACRONYMS

Acronym	Definition
AFFF	Aqueous Film-Forming Foam
AOPI	Area of Potential Interest
AS	Air Sparge
BTEX	Benzene, Toluene, Ethylbenzene, and Xylenes
CAP	Corrective Action Plan
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act of 1980
CMI	Corrective Measures Implementation
CMI(C)	Corrective Measures Implementation (Construction)
CMI(O)	Corrective Measures Implementation (Operation)
CMS	Corrective Measures Study
CS	Confirmatory Sampling
DD	Decision Document
DES	Design
DPE	Dual Phase Extraction
DRMO	Defense Reutilization and Marketing Office
EOD	Explosive Ordnance Disposal
EPA	Environmental Protection Agency
ER,A	Environmental Restoration, Army
FS	Feasibility Study
FTA	Fire Training Area
FTD	Fort Drum
FY	Fiscal Year
HRS	Hazard Ranking System
IAP	Installation Action Plan
ID	Identification
IM	Interim Measure
IMP(C)	Implementation (Construction)
IMP(O)	Implementation (Operation)
INV	Investigation
IRP	Installation Restoration Program
ISC	Initial Site Characterization
K	Thousand
kg	kilogram
LUC	Land Use Control
LUCIP	Land Use Control Implementation Plan
m	meter
MNA	Monitored Natural Attenuation
MR	Munitions Response
N/A	Not Applicable
NPL	National Priority List
PA	Preliminary Assessment
PFAS	Per- and polyfluoroalkyl substances
PCE	Tetrachloroethylene
PFOA	Perfluorooctanoic Acid

Acronym	Definition
PFOS	Perfluorooctane Sulfonate
POL	Petroleum, Oil and Lubricants
RA	Remedial Action
RAB	Restoration Advisory Boards
RA(C)	Remedial Action (Construction)
RA(O)	Remedial Action (Operation)
RC	Response Complete
RCRA	Resource Conservation and Recovery Act
RCWM	Recovered Chemical Warfare Material
RD	Remedial Design
RFA	RCRA Facility Assessment
RFI	RCRA Facility Investigation
RI	Remedial Investigation
RIP	Remedy in Place
ROD	Record of Decision
RRSE	Relative Risk Site Evaluation
SI	Site Inspection
SWMU	Solid Waste Management Unit
TAPP	Technical Assistance for Public Participation
TRC	Technical Review Committee
US	United States
USEPA	US Environmental Protection Agency
UST	Underground Storage Tank
UU/UE	Unlimited Use/Unrestricted Exposure
VOC	Volatile Organic Compound
WWII	World War II

PHASE TRANSLATION TABLE

CERCLA Phase	RCRA Phase	RCRA UST Phase
Preliminary Assessment (PA)	RCRA Facility Assessment (RFA)	Initial Site Characterization (ISC)
Site Inspection (SI)	Confirmation Sampling (CS)	Investigation (INV)
Remedial Investigation/ Feasibility Study (RI/FS)	RCRA Facility Investigation/Corrective Measures Study (RFI/CMS)	Corrective Action Plan (CAP)
Remedial Design (RD)	Design (DES)	Design (DES)
Interim Remedial Action (IRA)	Interim Measure (IM)	Interim Remedial Action (IRA)
Remedial Action (Construction) (RA(C))	Corrective Measures Implementation (Construction) (CMI(C))	Implementation (Construction) (IMP(C))
Remedial Action (Operation) (RA(O))	Corrective Measures Implementation (Operation) (CMI(O))	Implementation (Operation) (IMP(O))
Long-Term Management (LTM)	Long-Term Management (LTM)	Long-Term Management (LTM)

PROGRAM SUMMARY

Number of Open IR Sites with Response Complete/Total Open IR Sites: 7/21
Number of Open MR Sites with Response Complete/Total Open MR Sites: 0/0
Number of Open CC Sites with Response Complete/Total Open CC Sites: 0/0

SITE LEVEL INFORMATION

36205.1007 - OLD SANITARY LANDFILL

CRL ID: 36205.1007

Env Site ID: FTD-007

Alias: FTD-007

Regulatory Driver: RCRA-C

RIP Date: 09-16-2007

RC Date: 09-16-2007

RC Reason: All Required Cleanup Completed

Site Closeout Date: 09-30-2055

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: NO

Emerging Contaminants Type:

Emerging Contaminants Information:

Phase	Begin Date	End Date
RFA	10-15-1980	07-15-1981
CS	10-15-1981	09-15-1985
RFI/CMS	02-15-1986	09-15-2006
DES	06-15-2006	09-15-2007
IM	06-15-1985	09-15-1999
CMI(C)	03-15-2007	09-16-2007
CMI(O)	#	#
LTM	10-15-2007	09-30-2055

Site Narrative: The Old Sanitary Landfill (OSL) is located along Route 26. The landfill covers about 50 acres and was operated from 1940 to 1973. It consists of two cells (which may extend to a depth of 40 feet) divided by a ravine. Debris is believed to have been dumped in low spots of the ravine area. The cells have a synthetic cap, soil, and vegetative cover. Leachate, primarily benzene, toluene, ethylbenzene, and xylene (BTEX), seeps out at points along the lower portions of the side slopes into a stream leading off-post at both landfill cells. The plume reconnaissance performed at Gasoline Alley (FTD-030F) indicated that Area 3805 was contributing to the contamination found at the landfill. Stream monitoring results show that the contamination is primarily limited to the stream bed adjacent to the cells. In fiscal year (FY)96 a landfill fence was installed, and the vents were upgraded. In FY97 an interim remedial action (IRA) was conducted to remove debris and drums from the site and stabilize slopes. Slope stabilization and erosion control were completed in FY99. The risk assessment was completed in FY00. In FY01, a pilot phytoremediation project was installed and was successful in addressing contaminants. Limited cap repairs were completed in FY02 and FY03. A corrective measures study (CMS) which included Area 3805 was completed in FY05 and approved by the New York State Department of Environmental Conservation (NYSDEC) in April 2006. In 2007 a full-scale phytoremediation system was installed on the northern slope of OSL Cell 2 and around the unnamed creek between Cell 1 and Cell 2 to attenuate seep contaminants, primarily from 3805 (FTD-030F). In 2007 cap improvements to the OSL Cell 2, including additional fill, new geomembrane, cover, topsoil, were initiated and completed in 2008. In 2012, erosion on the north perimeter was repaired and pipe slope drains augmented to prevent further erosion. On Feb. 12, 2014, Fort Drum (FTD) received an Order on Consent and Administrative Action identifying the OSL ongoing measures as in situ remediation by phytoremediation of the seeps landfill cap enhancements by maintenance, performance monitoring, and long-term operation and maintenance. In 2015, a pipe slope drain failure was discovered and repaired. Because the future land use will remain industrial and hazardous

substances, pollutants, or contaminants will remain at the site at concentrations exceeding levels that allow for unrestricted use/unrestricted exposure (UU/UE), periodic reviews will continue indefinitely. CLEANUP/EXIT STRATEGY - Planned future activities consist of continued inspection and maintenance of the cap, phytoremediation, groundwater monitoring, and periodic reviews.

36205.1008 - AIRFIELD SANITARY LANDFILL

CRL ID: 36205.1008

Env Site ID: FTD-008

Alias: FTD-008

Regulatory Driver: RCRA-C

RIP Date: 09-15-1999

RC Date: 09-15-1999

RC Reason: All Required Cleanup Completed

Site Closeout Date: 09-30-2055

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: NO

Emerging Contaminants Type:

Emerging Contaminants Information:

Phase	Begin Date	End Date
RFA	10-15-1980	07-15-1981
CS	06-15-1986	07-15-1987
RFI/CMS	07-15-1987	08-15-1987
DES	09-15-1989	03-15-1990
IM	#	#
CMI(C)	10-15-1989	09-15-1999
CMI(O)	#	#
LTM	10-15-1999	09-30-2055

Site Narrative: The Airfield Sanitary Landfill (ASL), formerly named Existing Landfill, is located just northeast of Wheeler Sack Army Airfield and covers approximately 37 acres. Reports indicate that paint wastes, pesticide containers, and petroleum, oil, and lubricants (POL) saturated wastes were disposed of at the ASL between 1973 and 1987. The ASL was capped in 1988 with a polyvinylchloride cover, soil, and vegetation. A draft closure plan was developed in 1991 which recommended upgrading some of the gas vents, adding cover material, and improving drainage. In 1994, monitoring well installation was required by the NYSDEC. The wells were installed, and quarterly monitoring was initiated and completed in 1995. A revised closure plan for the landfill was submitted in October 1995 and finalized in June 1997. A post closure operations and maintenance plan was finalized in September 1997. Cover improvements were completed in 1999. A trend analysis finalized in 2001 revealed no significant problems. Cover repairs were completed in 2009. Because hazardous substances, pollutants, or contaminants will remain at the site at concentrations exceeding levels that allow for UU/UE, periodic remedy reviews will continue until UU/UE is achieved. CLEANUP/EXIT STRATEGY - Long-term management (LTM) includes continued monitoring (every five years), inspection and maintenance activities and periodic reviews.

36205.1020 - PFAS-FIRE TRAINING AREA

CRL ID: 36205.1020

Env Site ID: FTD-028

Alias: Fire Training Area

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	06-15-1986	07-15-1987
SI	06-15-1986	12-15-2022
RI/FS	12-31-1990	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: Investigation into environmental contamination at the Fire Training Area (FTA) began as a response to POLs in the late 1980s. A 1990 investigation, as part of the Resource Conservation and Recovery Act (RCRA) Facility Assessment (RFA), indicated no environmental impacts from operations POLs or related constituents and the site was closed. During the 1990 investigation, per- and polyfluoroalkyl substances (PFAS) had not yet been identified as a potential constituent of concern. For decades following, as part of routine training, firefighters poured fuel into an 80-foot diameter lined concrete basin (fire training pit) with a drainage system and underground storage tank (UST) and ignited the fuel. Firefighters would practice extinguishing the fires using Aqueous Film-Forming Foams (AFFF) containing PFAS as a principal compound. Both surface water and groundwater in the vicinity of the former fire training pit discharge into the Black River, which serves as the drinking water source for the City of Watertown. On June 9, 2016, Fort Drum Directorate of Public Works (DPW) conducted a soil sampling event at the fire training pit area after observing the Fire Department had discharged fuel onto gravel outside of the fire training pit during a training exercise. Soil samples were collected from various locations around and immediately under the eastern concrete rim of the fire training pit. The response to what began as an environmental investigation into a petroleum discharge to the environment subsequently included soil sampling for PFAS as PFAS was, at this time, an emerging constituent of concern.

Due to the extensive amount of supporting soil removed for the POL excavation, the DPW demolished and disposed of the fire training pit materials as the pit could no longer maintain its structural integrity. Soil in this vicinity was removed to five feet below grade. In October 2016, the DPW removed the fire pit drainage system including piping, a UST, and an oil/water separator with piping fragments abandoned in place. PFOS and PFOA groundwater samples were taken immediately under the oil/water separator. Results of this effort lead to the Fire Training Area being reopened for PFAS contamination

under the Comprehensive Environmental Response, Compensation and Liability Act of 1980 (CERCLA). Due to increasing concern over PFAS migration into Fort Drum's drinking water supply wells, and after permanent shutdown of drinking water wells 7 and 11, an expanded site inspection (SI) commenced in September 2018 to investigate the FTA's influence Fort Drum's sources of drinking water, which serves 35,000 residents daily. Preliminary assessment (PA)/SI has been completed, advancing 27 areas of interest to the remedial investigation (RI) phase, which began in 2022. PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

CLEANUP/EXIT STRATEGY - Future remedial actions (RA), if required, will be determined after the RI/FS is complete.

36205.1021 - GASOLINE ALLEY - AREA 1295

CRL ID: 36205.1021

Env Site ID: FTD-030A

Alias: FTD-030A

Regulatory Driver: RCRA-C

RIP Date: 07-15-2007

RC Date: 07-15-2017

RC Reason: All Required Cleanup Completed

Site Closeout Date: 09-30-2055

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: NO

Emerging Contaminants Type:

Emerging Contaminants Information:

Phase	Begin Date	End Date
RFA	10-15-1980	07-15-1981
CS	10-15-1980	07-15-1981
RFI/CMS	05-15-1990	04-15-2006
DES	06-15-2006	12-15-2006
IM	01-01-1994	12-31-1995
CMI(C)	06-15-2006	07-15-2007
CMI(O)	06-15-2007	07-15-2017
LTM	07-15-2017	09-30-2055

Site Narrative: Area 1295 is an approximately 1-acre site located along “Gasoline Alley” at Fort Drum between Second Street East and Euphrates River Valley Road. Gasoline Alley is a two-mile long former fuel dispensing location that housed nine fueling stations. During the course of use, the fuel-containing underground storage tanks and associated piping leaked to the subsurface environment. Constituents of concern at Area 1295 were determined to be BTEX compounds, although 1,2,4-trimethylbenzene and 1,3,5- trimethylbenzene was also frequently detected at elevated concentrations. Between 1994 and 1995, 22 USTs and associated components were removed from the Gasoline Alley fueling stations and approximately 6,000 cubic yards of soil were thermally treated and disposed of off-site. In FY00 a pilot system (excavation and oxygen releasing compound [ORC]) was completed and ultimately determined to be ineffective. In FY06, a focused technical selection (FTS) study was completed and approved by the NYSDEC. The FTS recommended in situ chemical oxidation (ISCO) and monitored natural attenuation (MNA). Four rounds of ISCO injections were completed in 2006 and 2007 and were determined to be only partially effective. Further attempts at ISCO were conducted in 2009 and 2010. From 2011 through 2014 bioremediation efforts through nutrient enhancement and injection of oxygenated water were attempted. On Feb. 12, 2014, Fort Drum received an Order on Consent and Administrative Action referencing continuing investigation/operation of Interim Corrective Measures for Area 1295. In 2015, new wells were installed targeting the residual dissolved phase and air sparging (AS) begun. The air sparge system was turned off for observation of rebound in February 2016. The state of New York issued a letter dated May 18, 2018, indicating there was no need for additional active remediation. Area 1295 was remediated to restricted residential use, with groundwater use restrictions in place as the site does not meet UU/UE criteria. Because the future land use will remain industrial and hazardous substances, pollutants, or contaminants will remain at the site at concentrations exceeding levels that allow for UU/UE, five-year remedy reviews will continue indefinitely. In March 2020, groundwater use restrictions at Area 1295 were added to Fort Drum’s real property master plan. A land use control

implementation plan (LUCIP), containing a site management plan (SMP) for several Installation Restoration Program (IRP) sites including Area 1295, governs continued management of this site including annual inspections. Area 1295 is included in Fort Drum's annual inspection of IRP sites with groundwater use restrictions in accordance with the SMP as well as five-year periodic reviews. CLEANUP/EXIT STRATEGY – Annual land use control (LUC) monitoring and periodic reviews will continue.

36205.1024 - GASOLINE ALLEY - AREA 1595

CRL ID: 36205.1024

Env Site ID: FTD-030D

Alias: FTD-030D

Regulatory Driver: RCRA-C

RIP Date: 06-15-2006

RC Date: 08-15-2017

RC Reason: All Required Cleanup Completed

Site Closeout Date: 09-30-2055

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: NO

Emerging Contaminants Type:

Emerging Contaminants Information:

Phase	Begin Date	End Date
RFA	10-15-1980	07-15-1981
CS	10-15-1980	07-15-1981
RFI/CMS	05-15-1990	05-15-2005
DES	05-15-2004	09-15-2005
IM	06-01-1992	06-01-2014
CMI(C)	06-15-2005	06-15-2006
CMI(O)	06-15-2006	08-15-2017
LTM	08-15-2017	09-30-2055

Site Narrative: Area 1595 is located along “Gasoline Alley” at Fort Drum; a two-mile long former fuel dispensing location that housed nine fueling stations. During the course of use, the fuel-containing underground storage tanks and associated piping leaked to the subsurface environment. Contamination was discovered having pooled as a small pond and stream downgradient reaching about 300 feet downstream. The primary constituents of concern at Area 1595 were ethylbenzene, naphthalene, toluene 1,2,4-trimethylbenzene (1,2,4-TMB) 1,3,5-trimethylbenzene (1,3,5-TMB) and xylenes. Following a PA, an auto-skimmer was installed at the pond in 1990 and operated until 1994. During the SI free-product was discovered in Area 1595 wells, and a free-product recovery and contaminated water treatment facility was installed in February 1992. Upgrades to the treatment facility were completed in FY95 and FY97. During FY97, contaminated soil was excavated from the pond and two weirs were constructed for flow measurements. In FY99 additional recovery wells were installed, subsurface lines were replaced, and the treatment system was enhanced. In FY00 the pump-and-treat system was upgraded (air stripper), a system evaluation was completed, and the groundwater model was updated. A chemical oxidation pilot study in FY02 indicated that this technology would not be effective. In 2004 a decision document (DD) was signed. In April 2004 the final CMS was submitted and approved by the NYSDEC. A soil vapor extraction (SVE)/aquifer air sparging (AAS) was designed and constructed in FY05 to replace the pump-and-treat system. This system was discontinued in FY11 following asymptotic vapor recovery. Bioremediation efforts through nutrient enhancement and injection of oxygenated water were attempted from 2011 through 2014. On Feb. 12, 2014, FTD received an Order on Consent and Administrative Action referencing corrective measures for Area 1595 as in situ remediation of subsurface soils and ex situ treatment of collected soil vapor, in situ remediation of groundwater, remediation of sediments in 1595 creek, performance monitoring, and long-term operation and maintenance. In 2015, AS and bioventing systems were started up. In 2019, based on the system performance data and groundwater analytical results, it was determined that the AS systems had

addressed the residual impacts in the vadose/smear zone to a level at which AS no longer provided useful benefit. The AS system was then shut down to initiate post-treatment monitoring. During this time, a localized area of elevated residual hydrocarbon remained in the area immediately upgradient from well 1595-MWS7. In response to the recalcitrant volatile organic compound (VOC) concentrations, two soil excavations were conducted in 2019 and 2020 to expedite site closure by removing petroleum contaminant mass that could not be addressed by the existing in situ remediation systems at the site. In March of 2020, Fort Drum placed groundwater use restrictions into the real property master plan. A letter from the state of New York indicating there is no need for additional active remediation was issued on October 28, 2021. Area 1595 was remediated to restricted residential use, with groundwater use restrictions in place as the site does not meet UU/UE criteria. Because the future land use will remain industrial and hazardous substances, pollutants, or contaminants will remain at the site at concentrations exceeding levels that allow for UU/UE, periodic remedy reviews will continue indefinitely. A LUCIP, containing a SMP for several IRP sites including Area 1595, governs continued management of this site including annual inspections. Area 1595 is included in Fort Drum's annual inspection of IRP sites with groundwater use restrictions in accordance with the SMP as well as periodic reviews. CLEANUP/EXIT STRATEGY - Groundwater monitoring, annual LUC monitoring, and periodic reviews will continue.

36205.1025 - GASOLINE ALLEY - AREA 1795/WWII

CRL ID: 36205.1025

Env Site ID: FTD-030E

Alias: FTD-030E

Regulatory Driver: RCRA-C

RIP Date: 06-15-2018

RC Date: 06-24-2024

RC Reason: All Required Cleanup Completed

Site Closeout Date: 09-30-2055

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: NO

Emerging Contaminants Type:

Emerging Contaminants Information:

Phase	Begin Date	End Date
RFA	10-15-1980	07-15-1981
CS	10-15-1980	07-15-1981
RFI/CMS	05-15-1990	09-15-2004
DES	05-15-2005	08-15-2007
IM	06-01-1996	06-01-2014
CMI(C)	05-15-2006	09-15-2007
CMI(O)	06-15-2018	06-24-2024
LTM	06-25-2024	09-30-2055

Site Narrative: Area 1795 is located along “Gasoline Alley” at Fort Drum. Gasoline Alley is a two-mile long former fuel dispensing location that housed nine fueling stations. During the course of use, the fuel-containing underground storage tanks and associated piping leaked to the subsurface environment. In addition, the World War II (WWII) Landfill [formerly FTD- 078, environmental program requirements FTDR-029] was a surface dump within area 1795. The landfill, which was discovered in 1989, is approximately 6.5 acres and is heavily wooded. The plume reconnaissance performed on Gasoline Alley in 1994 linked the two sites together. Sampling of debris indicated limited polychlorinated biphenyl contamination. The primary constituents of concern at the site were ethylbenzene naphthalene toluene 1,2,4-trimethylbenzene (1,2,4-TMB) 1,3,5-trimethylbenzene (1,3,5-TMB) and xylenes. From FY96 to FY98 a pump-and-treat pilot system was operated for groundwater depression and separate phase product recovery. This system was discontinued due to limited thickness of the free-product layer. In FY98 a pilot AAS was tested and indicated that this technology would be appropriate as part of a final remedy. A pilot bio slurping system (free-product recovery enhancement) was operated from FY98 to FY00. This system was discontinued due to the high-water table. In June 2004 a final CMS was submitted and approved recommending SVE/AAS treatment systems and limited excavation of the WWII landfill. The design was funded in FY05, and construction of the remedial system was funded in FY06. Construction of the SVE/AAS systems was completed in 2007. Bioremediation efforts through nutrient enhancement and injection of oxygenated water were attempted from 2011 through 2014, with limited success. On Feb. 12, 2014, FTD received an Order on Consent and Administrative Action referencing corrective measures for Area 1795 as in situ remediation of subsurface soils and ex situ treatment of collected soil vapor, in situ remediation of groundwater, performance monitoring and long-term operation and maintenance. In summer 2015, bioventing began and in fall 2015 additional wells were added and AS began. In 2016 a groundwater recirculation system was added to address previously unknown contamination. During remediation activities, it was

discovered that a previously unknown area of petroleum contamination, including light non-aqueous phase liquids (LNAPL), was present in the western portions of the 1795 site. This area was delineated during a 2019 RCRA Facility Investigation. To facilitate regulatory closure of the previously known area of contamination, the site was administratively separated into two areas, 1795 A/B and 1795 C. The administrative separation of the sites was approved by the NYSDEC in a letter dated February 27, 2019. However, this separation was administrative only and the 1795 site remains a single site (FTD-030E) in the restoration database. On Dec. 1, 2020, the State of New York issued a letter to Fort Drum indicating there was no need for additional active remediation in the 1795 A/B portion of the site. Groundwater use restrictions for the A/B and C portions of the site were added to Fort Drum's real property master plan in December 2020 and May 2023, respectively, as they did not meet UU/UE criteria. Because the future land use will remain industrial and hazardous substances, pollutants, or contaminants will remain at the site at concentrations exceeding levels that allow for UU/UE, five-year periodic reviews will continue indefinitely for 1795 A/B/C. A LUCIP, containing a SMP for several IRP sites including Area 1795 A/B/C, governs continued management of this site including annual inspections. CLEANUP/EXIT STRATEGY - Annual LUC monitoring and periodic reviews will continue.

36205.1026 - GASOLINE ALLEY - AREA 3805

CRL ID: 36205.1026

Env Site ID: FTD-030F

Alias: FTD-030F

Regulatory Driver: RCRA-C

RIP Date: 09-15-2007

RC Date: 06-24-2024

RC Reason: All Required Cleanup Completed

Site Closeout Date: 09-30-2055

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: NO

Emerging Contaminants Type:

Emerging Contaminants Information:

Phase	Begin Date	End Date
RFA	10-15-1980	07-15-1981
CS	10-15-1980	07-15-1981
RFI/CMS	05-15-1990	04-15-2006
DES	06-15-2001	09-15-2006
IM	#	#
CMI(C)	09-15-2002	09-15-2007
CMI(O)	10-15-2004	06-24-2024
LTM	06-25-2024	09-30-2055

Site Narrative: Area 3805 included three former fuel storage and dispensing areas (1895, 1995, 3805), whose plumes commingled, located on Gasoline Alley in Fort Drum's Cantonment area. Impacted soil at Area 3805 was approximately 85,0000 cubic feet, the free-product plume was approximately 450,000 square feet, and the dissolved plume extended approximately 1,100 feet and exceeds 400 feet in width. The primary constituents of concern at the site were ethylbenzene, naphthalene, toluene, 1,2,4-trimethylbenzene (1,2,4-TMB), 1,3,5-trimethylbenzene (1,3,5-TMB), and xylenes. The plume extended under OSL; FTD-007 prior to discharging to the OSL creek. Starting in 1995, approximately 30,000 gallons of free-product were removed. A combined CMS for area 3805 and OSL was funded in FY00 and an FTS for the source area was completed in 2001. A multi-phase extraction (MPE) system was recommended for the source area. The remedial design (RD) for the source area was completed in 2002 and construction of an MPE and an AAS system was completed in FY04. In FY05 a combined CMS for Areas 3805/OSL was completed and was approved by the NYSDEC in April 2006. A supplemental sparging line was completed in 2007. In 2011, a five-month nutrient injection application trial was completed in conjunction with AS system operations. The vertical extraction wells were supplemented with horizontal extraction wells in 2012 to treat the shallower impacted soil. On Feb. 12, 2014, FTD received an Order on Consent and Administrative Action referencing corrective measures for Area 3805 (including 1895 and 1995) as in situ remediation of subsurface soils and ex situ treatment of collected soil vapor in situ remediation of groundwater, removal of LNAPL, performance monitoring, and long-term operation and maintenance. In 2015, a more aggressive remedial strategy was implemented for Area 3805/1995 with the use of bioventing, AS, and SVE within the System A and B areas. From 2015 through 2019, nearly 170 AS wells were installed and operated some with supplemental heating from a small solar powered thermal in situ remediation system, captured waste heat from AS blowers, and industrial inline water heaters to increase microbial degradation. Twenty additional AS/heat exchange wells were installed in 2020 to focus remedial efforts to remaining areas of concern. One Building 3829

(inhabited at times) is present at the site, which has a sub-slab depressurization system in operation. Nuisance odors, once an issue in the Building were not anticipated to be of concern following remedial system decommissioning. The status of Area 3805 upon submittal of the remedial action completion report to the NYSDEC in 2023 was largely vacant, with waste oil and fuel aboveground storage tanks and vehicle maintenance in Building 3829. Current land use designation is Administrative/Instructional-Industrial. There are currently no plans to redevelop the site; however, groundwater use restrictions are still warranted as the site does not meet UU/UE exposure criteria. LUCs were added to Fort Drum's real property master plan in 2023. CLEANUP/EXIT STRATEGY - Groundwater monitoring, annual LUC monitoring, and periodic reviews will continue.

36205.1046 - BLDG P-2140 USTS

CRL ID: 36205.1046

Env Site ID: FTD-091

Alias: FTD-091

Regulatory Driver: RCRA-C

RIP Date: 01-31-2002

RC Date: 08-15-2017

RC Reason: All Required Cleanup Completed

Site Closeout Date: 09-30-2055

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: NO

Emerging Contaminants Type:

Emerging Contaminants Information:

Phase	Begin Date	End Date
RFA	03-31-1994	09-30-1994
CS	03-31-1994	09-30-1994
RFI/CMS	03-31-1994	09-30-2001
DES	#	#
IM	06-30-1995	06-01-2014
CMI(C)	09-30-2001	12-31-2001
CMI(O)	01-31-2002	08-15-2017
LTM	08-15-2017	09-30-2055

Site Narrative: Building P-2140 was an active Army Air Force Exchange Service gas station located south of Gasoline Alley at the corner of Nash Boulevard and First Street West. In 1993 five fuel storage USTs were removed and three USTs were installed as replacements in a different area of the site. Contamination from prior activities was observed during excavation. An SI completed in 1994 showed the dissolved portion of the plume migrating toward the Installation boundary. An RA for free-product recovery and groundwater treatment was initiated in FY95. Approximately 1,400 gallons of free-product were recovered. That system was subsequently replaced by a dual phase extraction (DPE) system in the source area. In FY99 and FY00 the plume was further delineated, and additional wells were installed. An air sparge (with ozone) pilot system was installed in January 2001. Sampling at the boundary detected BTEX and methyl tertiary-butyl ether contamination. In January 2002 the full scale DPE pilot was installed to address separate phase contamination in the source area. A CMS was completed and approved by the NYSDEC in April 2004. In FY05 an AAS with ozone was added in the source area to augment the DPE. The downgradient AAS with ozone system was shut down in March 2009 with concurrence from NYSDEC. In 2009 AAS ozone technology was applied in the source area. Bioremediation efforts through nutrient enhancement and injection of oxygenated water were attempted from 2011 through 2014. On Feb. 12, 2014, FTD received an Order on Consent and Administrative Action referencing corrective measures for Building P- 2140 as in situ remediation of subsurface soils and ex situ treatment of collected soil vapor, in situ remediation of groundwater, removal of LNAPL, performance monitoring, and long-term operation and maintenance. In 2015, five new AS wells were installed and AS and SVE systems started up, having been modified to allow the AS blower to be pulsed. On May 18, 2018, the state of New York issued a letter indicating there was no need for additional active remediation. However, groundwater use restrictions are still warranted as the site does not meet UU/UE criteria and five-year periodic reviews will continue indefinitely. In March 2020, Fort Drum placed groundwater use restrictions into the real property master plan. A LUCIP

containing a SMP for several IRP sites including Area P-2140 governs continued management of this site including annual LUC inspections.
CLEANUP/EXIT STRATEGY - Annual LUC monitoring and periodic reviews will continue.

36205.1066 - Gasoline Alley - 1800, 1900 &

CRL ID: 36205.1066

Env Site ID: CCFD-030G

Alias: CCFD-030G

Regulatory Driver: CERCLA

RIP Date: 06-15-2017

RC Date: 06-15-2033

RC Reason:

Site Closeout Date: 09-30-2062

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: NO

Emerging Contaminants Type:

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	10-15-1991	01-15-2009
SI	10-15-1996	10-15-2009
RI/FS	03-15-2010	03-30-2016
RD	#	#
IRA	06-01-2010	07-28-2020
RA(C)	04-15-2015	03-31-2016
RA(O)	06-15-2017	06-15-2033
LTM	06-16-2033	09-30-2062

Site Narrative: CCFD-030G is located on and near Oneida/Ontario Avenues in Fort Drum's Cantonment area. There has been documented storage and use of hazardous materials, including solvents, both upgradient and cross-gradient of the investigation area. An investigation of historical groundwater chemistry data associated with a BTEX plume at site FTD-030F indicated the presence of dissolved-phase chlorinated solvents (specifically tetrachloroethylene (PCE)) below the BTEX plume. In 2009, because the solvent contamination source was likely upgradient of the BTEX plume source and vertically separated from the BTEX plume and would require different remedial technologies, this IRP site was established, and in FY10 an SI to determine the nature and extent of the contamination was initiated. The identified contaminant of concern was PCE; however, related solvents and relevant breakdown products may have also been present. It is suspected that releases from the site contaminated soils and groundwater beneath the site and migrated northwesterly within FTD property. In addition, PCE contamination has been found at depth in the vicinity of the FTD-030F petroleum plume and FTD-007 OSL. An RI was funded in FY10 to determine the nature and extent of PCE contamination. An ISCO pilot study was completed in 2013. Another round of ISCO was conducted in summer 2015 and a feasibility study (FS) was completed in the fall of 2015. A proposed remedial action plan was completed by NYSDEC and released to the public for comment in February 2016. A public meeting took place on March 9, 2016. A record of decision (ROD) was issued by NYSDEC in March 2016. The selected remedy included ISCO, as needed, for hotspot treatment, institutional controls, and a SMP. MNA began in 2018. The March 2016 ROD indicated that it should take 16 years to reach remediation goals. The state of New York issued a letter dated July 28, 2020, approving the SMP and indicating there was no need for additional active remediation. In October 2020, Fort Drum placed land and groundwater use restrictions into the real property master plan. Because the future land use will remain industrial and hazardous substances, pollutants, or contaminants will remain at the site at concentrations exceeding levels that allow for UU/UE, five-year remedy reviews will continue

indefinitely in accordance with the National Oil and Hazardous Substances Pollution Contingency Plan. A LUCIP, containing a SMP for site CCFD-030G, governs continued management of this site including annual inspections. CLEANUP/EXIT STRATEGY - MNA was planned for 16 years and began in 2018. Groundwater monitoring, annual LUC monitoring, and periodic reviews will continue.

36205.1078 - PFAS-Former Fire Station

CRL ID: 36205.1078

Env Site ID: FTD-115

Alias: Former Fire Station (Building T-2330)

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score: 0

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: Per direction from Deputy Chief of Staff G-9, Site FTD-115 was created to account for all PFAS costs at the installation. A PA/SI has been completed and a RI is underway to determine the nature and extent of PFAS releases to the environment. However, per Department of Defense guidance given the limited experience gained through actual cleanup of PFAS sites, the Army only recognized the future costs through the study phase. CLEANUP/EXIT STRATEGY -The interim and/or final remedial action activities are beyond the funded SI and estimated RI/FS until such time that the RI/FS is complete. The SI has identified 27 areas of potential interest that are currently in the RI/FS phase. The Former Fire Station (Building T-2330) was historically used by the Fort Drum Fire Department and personnel stated that AFFF-containing crash trucks could not have been stored there due to the small size of the vehicle bays. The Fort Drum Fire Department personnel did not recollect AFFF storage or training with AFFF at this fire station (interview knowledge went back to 1980). However, there is an information gap for the operational record at this AOPI for AFFF use, storage, and disposal. PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1094 - PFAS-Small Arms Range 7 Fire

CRL ID: 36205.1094

Env Site ID: FTD-126

Alias: Small Arms Range 7 Fire

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: There was a one-time deployment of AFFF by the Fort Drum Fire Department at the former range building at Range 7 north of the FTA to extinguish a fire in November 2002. It was reported that the rubber backing where the ammunition was fired into caught on fire. The amount of AFFF used is not known; however, the crash vehicle used to fight the fire had an onboard, 390-gallon booster tank, and the foam system is set for 3 percent (%) foam. Photos were provided to illustrate the widespread use of AFFF during the fire response. The Range 7 Fire AOI is located on the WSAAF portion of Fort Drum, proximal to the Black River. PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1095 - PFAS-OSL, sludge pile, Rt 26 CC & B2018

CRL ID: 36205.1095

Env Site ID: FTD-125

Alias: Old Sanitary Landfill, Sludge Pile Near OSL, Route 26 Car Crash, Building 2018 Soil Barn

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: The OSL is located within the Cantonment area of Fort Drum along Dam Creek. A variety of wastes have been disposed of at the OSL during its operational period (1940-1973) including general refuse, containers with residual pesticides/herbicides, unused ammunition, chlorinated solvents, industrial wastes, and potentially PFAS-containing materials from the Former WWTP and sludge drying beds. The OSL consists of two waste cells divided by a tributary to Dam Creek, there are also groundwater seeps present at the eastern toe of both OSL cells along Dam Creek. During the Site Investigation (SI), groundwater and surface water was sampled from the AOI.

Fort Drum personnel reported placing sediment/sludge collected during cleanout of oil-water separator (OWS) units and storm sewers across post (including the WSAAF area) within a Sludge Pile Near the OSL. These materials likely contained residual PFAS associated with AFFF discharges at hangars and nozzle testing areas. The sludge pile is located next to a roadside drainage swale that runs along Main Tank Trail and discharges into Dam Creek. During the SI, soil and groundwater were sampled from the AOI.

Retired Fort Drum Fire Department personnel stated in the 1990s, the Fort Drum Fire Department deployed AFFF in response to a car crash on the pavement shoulder of Route 26 that is adjacent to Engineering Buildings at Nininger Street. The retired fire chief recalled using less than 10 gallons of AFFF during this response but could not recollect the exact location of the response. The location was estimated based on information gathered and the estimated location is immediately southwest and upgradient of the OSL. During the SI, groundwater was sampled from the downgradient OSL to provide data for the Route 26 Car Crash AOI.

Building 2018 is used to store non-RCRA soils/materials prior to off-site disposal. Approximately 400

tons of soil from the fire training pit excavation (containing high concentrations of PFAS) were temporarily stored here prior to off-site disposal. Waste soil was observed to have been tracked onto the ground surface outside the barn doors during site visit reconnaissance, therefore soil from the fire pit excavation could have been tracked outside of the barn before it was sent off site for disposal. Surface water runoff from the soil barn area drains into the storm sewer and is believed to discharge into Dam Creek. During the SI, soil and groundwater were sampled from the AOI.

PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1096 - PFAS- Hangers 2049, 2050 & Bldg. 2041

CRL ID: 36205.1096

Env Site ID: FTD-124

Alias: Hangar 2049 & 2050 Fire Suppression System, Former Airfield Fire Station (Building 2041)

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: Hangar 2049 is located at WSAAF (part of the original WSAAF area) and is a location of historical AFFF fire suppression systems (built in 1970s and switched over to JET-X [i.e., non-PFAS] foam in 2011). Hangar 2049 historically utilized an AFFF suppression system with two 1,200-gallon AFFF tanks, and AFFF was deployed from Hangar 2049 during system testing (approximately every 5 years) and if accidental releases occurred. In addition to the internal floor drains, AFFF was washed outside of the Hangar 2049 building onto the tarmac and surrounding soils during cleanup. During the Site Investigation (SI), soil and groundwater were sampled from the AOI.

Hangar 2050 is located at WSAAF (part of the original WSAAF area) and is a location of historical AFFF fire suppression systems (built in 1989s and switched over to JET-X [i.e., non-PFAS] foam in 2012). Hangar 2050 historically utilized an AFFF suppression system with two 1,200-gallon AFFF tanks, and AFFF was deployed from Hangar 2050 during system testing (approximately every 5 years) and if accidental releases occurred. In addition to the internal floor drains, AFFF was washed outside of the Hangar 2050 building onto the tarmac and surrounding soils during cleanup. During the Site Investigation (SI), soil and groundwater were sampled from the AOI.

Former Airfield Fire Station (Building 2041) was built in 1942 and was demolished in 2005. According to Fort Drum Fire Department, AFFF was stored in crash trucks and other storage containers at this fire station during the time of operation. A small burn pit used for fire training purposes prior to 1981 was reportedly located to the west of the building and crash trucks with AFFF were staged here. Fort Drum Fire Department personnel were unable to rule out AFFF use at this burn pit, and did not report AFFF use, or nozzle testing performed at this fire station.

PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1097 - PFAS - Former Fire Station 3 & Bldg 1131

CRL ID: 36205.1097

Env Site ID: FTD-123

Alias: Former Building 1131 AFFF Storage and Spill, Former Fire Station 3 (Building 181)

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: The Former Fire Station #3 (Building 181) was located at the corner of Euphrates River Valley Road & Restore Hope Avenue. It was historically used as a fire station by the Fort Drum Fire Department; however the building no longer exists (built in 1941 and demolished in 2012). Fort Drum personnel stated that AFFF-containing crash trucks were not likely stored there due to the small size of the vehicle bays and the Fort Drum Fire Department did not recollect AFFF storage there. During the Site Investigation (SI), soil and groundwater were sampled from the AOI.

Former Building 1131 was used as an AFFF storage location and an AFFF spill was reported within it (approximately 25 to 30 gallons). Dry sweep was used to clean up the AFFF spill and the used dry sweep was subsequently transported to Building 2018 for storage prior to off-site disposal. The building was demolished sometime between 2016 and 2019 and the condition of the floor in Former Building 1131 at the time of the spill is unknown. During the SI, soil and groundwater were sampled from the AOI.

PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1098 - PFAS-Former Fire Station Bldg. 2419

CRL ID: 36205.1098

Env Site ID: FTD-122

Alias: Former Army Fire Station (Kennedy & Dunn, Building 2419)

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: The Former Army Fire Station at the corner of Kennedy Avenue & Dunn Avenue (Building 2419) was a U.S. Army fire company station during the 1990s into the 2000s. The building has been demolished. Any training with AFFF would have been conducted with the Fort Drum Fire Department at their training locations. Small quantities of AFFF may have been stored at this location in 5-gallon pails, however it is believed that crash trucks were not staged here. No AFFF spills have been reported. During the Site Investigation (SI), soil and groundwater were sampled from the AOI. PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1099 - PFAS-Former Fire Station Bldg. 3828

CRL ID: 36205.1099

Env Site ID: FTD-121

Alias: Former Army Fire Station (George & Cannon, Building 3828)

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: The Former Army Fire Station at the corner of George Street & Cannon Street (Building 3828) was a U.S. Army fire company station from an unknown date to the 1990s. The building has been demolished; however it was the only U.S. Army fire company station to store an AFFF crash truck. Any training with AFFF would have been conducted with the Fort Drum Fire Department at their training locations. During the Site Investigation (SI), soil and groundwater were sampled from the AOI. PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1100 - PFAS-Bldgs. 1860, 1943 & 1800

CRL ID: 36205.1100

Env Site ID: FTD-120

Alias: Former Army Fire Station (Building 1860), Former Building 1943 OWS, Historical Tank Repair/ Vehicle Maintenance Shop (Bldg 1800)

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: The Former Army Fire Station (Building 1860) was used by the U.S. Army Fire Brigade during the 1990s into the 2000s. AFFF training was conducted with the Fort Drum Fire Department at their training location (Fire Training Area [FTA]). However, small quantities of AFFF may have been stored at Building 1860 in 5-gallon pails. AFFF-containing crash trucks were not likely staged here, and no AFFF spills or disposal were reported. The Former Army Fire Station (Building 1860) was located in the eastern portion of the cantonment area and was located within a large military vehicle parking area.

Fort Drum personnel reported the contents of the FTA underground storage tank were occasionally discharged into the oil water separator (OWS) at Former Building 1943. The OWS discharged to the sanitary sewer, which flows to the City of Watertown POTW. Building 1943 has since been demolished and the OWS removed. During the SI, groundwater was sampled from the AOI.

The Historical Tank Repair/Vehicle Maintenance Shop was located in the central portion of the cantonment area. The Historical Tank Repair/Vehicle Maintenance Shop occupied Building 1800, which was built in 1964. According to Fort Drum Real Property staff, former Building 1800 was used as a tank repair shop and then a vehicle maintenance shop, although the specific timeframes for each use are unknown. Former Building 1800 was later demolished in 2008. During the SI, groundwater was sampled from the AOI.

PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1101 - PFAS-Fire Station #2

CRL ID: 36205.1101

Env Site ID: FTD-119

Alias: Fire Station #2 (Building 1585)

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: Fire Station #2 (Building 1585) was built in 2011 and is currently active. As of September 2023, one crash truck containing AFFF was stored at Fire Station 2. A 2016 aerial of Fire Station 2 illustrates Fire Department hoses laid out on the driveway/grassy area south of Fire Station #2 (Building 1585), however, it is unknown if the hoses contained AFFF or AFFF residuals, and if this practice was performed historically with AFFF or AFFF residuals. During the Site Investigation (SI), soil and groundwater were sampled from the AOI. PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1102 - PFAS-Fire Station #1

CRL ID: 36205.1102

Env Site ID: FTD-118

Alias: Fire Station #1 (Building 10710)

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: Fire Station #1 (Building 10710) is located within the Cantonment Area of Fort Drum and has been used as a fire station by the Fort Drum Fire Department since the mid-1980s. The Fort Drum Fire Department does not currently store AFFF or AFFF-containing crash trucks and does not perform training at this station. No AFFF spills have been reported. During the Site Investigation (SI), soil and groundwater were sampled from the AOI. PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1103 - PFAS-Airfield

CRL ID: 36205.1103

Env Site ID: FTD-117

Alias:

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: PFAS-Airfield consists of the following AOIs: Building 19855 Fire Suppression System, Hangar 2070 Fire Suppression System, Hangar 2072 Fire Suppression System, Hangar 2074 Fire Suppression System, Mountain Ramp Nozzle Testing Area, Fire Station 3 (Building 2065) and Nozzle Testing Area, and Hangar 2060 Fire Suppression System.

The Building 19855 Fire Suppression System is located at WSAAF and serves as a refueler storage facility. Building 19855 is a location of AFFF-fire suppression systems (built in 2006) which utilized an AFFF suppression system with one 300 gallon stationary tank. AFFF was discharged from the fire suppression system during post-installation commissioning testing on at least one occasion. Additional system testing/discharges and accidental releases are also likely. AFFF was reportedly washed outside onto the surrounding pavement and soils. During the Site Investigation (SI), soil and groundwater were sampled from the AOI.

Hangar 2070 is located at WSAAF and is a location of historical AFFF-fire suppression systems (built in 1993 and switched over to JET-X [i.e., non-PFAS] foam in 2014). Hangar 2070 historically utilized an AFFF suppression system with two 1,200-gallon AFFF tanks, and AFFF was deployed from Hangar 2070 during system testing (approximately every 5 years) and if accidental releases occurred. In addition to the internal floor drains, AFFF was washed outside of the Hangar 2070 building onto the tarmac and surrounding soils during cleanup. During the SI, groundwater was sampled from the AOI.

Hangar 2072 is located at WSAAF and is a location of AFFF-fire suppression systems (built in 1993). Hangar 2072 historically utilized an AFFF suppression system with two 1,200-gallon AFFF tanks, and AFFF was deployed from Hangar 2072 during system testing in 2016, other routine testing events (approximately every 5 years), and if accidental releases occurred. In addition to the internal floor

drains, AFFF was washed outside of the Hangar 2072 building onto the tarmac and surrounding soils during cleanup. During the SI, groundwater was sampled from the AOI.

Hangar 2074 is located at WSAAF and is a location of historical AFFF-fire suppression systems (built in 1993 and switched over to JET-X [i.e., non-PFAS] foam in 2011). Hangar 2074 historically utilized an AFFF suppression system with two 1,200-gallon AFFF tanks, and AFFF was deployed from Hangar 2074 during system testing (approximately every 5 years) and if accidental releases occurred. In addition to the internal floor drains, AFFF was washed outside of the Hangar 2074 building onto the tarmac during cleanup. During the SI, groundwater was sampled.

At the Mountain Ramp Nozzle Testing Area, the Fort Drum Fire Department performed nozzle testing with five crash trucks with AFFF monthly from 2000 to 2016. An estimated 1 gallon of AFFF concentrate was discharged from each crash truck per test event. During the SI, soil and groundwater were sampled from the AOI.

Fire Station #3 (Building 2065) was built in 1993 and is the only active fire station at WSAAF. Fire Station #3 is the primary storage location for AFFF-carrying crash trucks. AFFF is also stored at the station in 55-gallon drums. As of September 2023, six crash trucks containing AFFF were stored at Fire Station 3; however, the installation has removed all AFFF during the enterprise conversion program. The Fort Drum Fire Department performed nozzle testing with five crash trucks with AFFF monthly. The testing occurred on the concrete apron immediately southwest of the Fire Station 3 building until 2016. An estimated 1 gallon of AFFF concentrate was discharged from each crash truck per test event. During the SI, soil and groundwater were sampled from the AOI.

Hangar 2060 is located at WSAAF and is a location of historical AFFF-fire suppression systems (built in 1993 and switched over to JET-X [i.e., non-PFAS] foam in 2010). Hangar 2060 historically utilized an AFFF suppression system with two 1,200-gallon AFFF tanks, and AFFF was deployed from Hangar 2060 during system testing (approximately every 5 years), during a reported leak, and if accidental releases occurred. In addition to the internal floor drains, AFFF was washed outside of the Hangar 2060 building onto the tarmac during cleanup. Site personnel reported watching foam flow out of the back of Hangar 2060 and toward the stormwater drains behind the building, subsequently killing the surrounding grass in the early 2010s, and foaming at downgradient OF-01 has been reported in connection with Hangar 2060. During the SI, groundwater was sampled from the AOI.

PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

36205.1104 - PFAS-Airfield Sanitary Landfill

CRL ID: 36205.1104

Env Site ID: FTD-116

Alias: Airfield Sanitary Landfill

Regulatory Driver: CERCLA

RIP Date: 02-02-2029

RC Date: 02-02-2029

RC Reason:

Site Closeout Date: 02-02-2029

Program: ER,A

Subprogram: IR

NPL Status: NO

HRS Score:

RRSE: Data not Available

RCWM: NO

Emerging Contaminants: YES

Emerging Contaminants Type: PFAS

Emerging Contaminants Information:

Phase	Begin Date	End Date
PA	05-14-2019	09-15-2019
SI	03-15-2020	11-15-2022
RI/FS	01-03-2022	02-02-2029
RD	#	#
IRA	#	#
RA(C)	#	#
RA(O)	#	#
LTM	#	#

Site Narrative: The ASL is located within the WSAAF. The ASL operated from 1973 through 1987 and received solid waste (e.g., dried sludges from the Former Wastewater Treatment Plant, paint wastes, solvent containers, oil, petroleum). PFOS and PFOA were detected in groundwater, indicating a release. Therefore, a remedial investigation is underway.

SITE SUMMARY

SITE CLOSEOUT SUMMARY

CRL ID	Site Name	Program	Sub Program	Site Closeout Date
36205.1068	CC-01 Airfield Water Tower	CC	CC	01-31-2012
36205.1071	P-10480	CC	CC	03-31-2008
36205.1072	P-10680 East	CC	CC	03-31-2008
36205.1073	4486 West	CC	CC	03-31-2008
36205.1074	P-10580 West	CC	CC	03-31-2008
36205.1075	P-10670 West	CC	CC	03-31-2008
36205.1076	P-10660 West	CC	CC	03-31-2008
36205.1077	P-10270	CC	CC	03-31-2008
36205.1081	4530	CC	CC	03-31-2008
36205.1084	4486 East	CC	CC	03-31-2008
36205.1085	4475 West	CC	CC	03-31-2008
36205.1088	P-10268	CC	CC	03-31-2008
36205.1091	P-10680	CC	CC	03-31-2008
36205.1092	Water Tower (T2161)	CC	CC	07-31-2012
36205.1093	WSAAF Oasis Hydrant System	CC	CC	02-28-2022
36205.1001	HAZARDOUS WASTE STORAGE BLDG T-4	ER,A	IR	07-31-1987
36205.1002	DEFOLIENT TEST SITE	ER,A	IR	08-31-1986
36205.1003	SEWAGE TREATMENT PLANT	ER,A	IR	10-31-1994
36205.1004	NEW WASHRACK FACILITY	ER,A	IR	07-31-1987
36205.1005	GARBAGE CAN WASHOUT FACILITY	ER,A	IR	07-31-1987
36205.1006	WASHRACK HOLDING PONDS	ER,A	IR	07-31-1987
36205.1009	FIELD DUMPS (SWMU FTD-09,15,16,1	ER,A	IR	07-31-1987
36205.1010	LANDFILL (OPER 1978-80)	ER,A	IR	07-31-1987
36205.1011	LANDFILL (1950 LOCATION UNKNOWN)	ER,A	IR	07-31-1987

36205.1012	ABANDONED LANDFILL NEAR DEFERIET	ER,A	IR	05-31-1997
36205.1013	LANDFILL NEAR CARTHAGE CITY	ER,A	IR	07-31-1987
36205.1014	CLOSED LANDFILL (NEAR FTD-013)	ER,A	IR	07-31-1987
36205.1015	LANDFILL NEAR SOMERVILLE	ER,A	IR	07-31-1987
36205.1016	EOD DISPOSAL SITE, BURN PITS (RA	ER,A	IR	06-30-2003
36205.1017	U.S. AIR FORCE EOD SITE (RANGE 3	ER,A	IR	06-30-2003
36205.1018	OLD HOSFORD SWIMMING POOL	ER,A	IR	09-30-1995
36205.1019	POL SLUDGE BURIAL PIT	ER,A	IR	07-31-1987
36205.1022	GASOLINE ALLEY - AREA 1395	ER,A	IR	12-30-2011
36205.1023	GASOLINE ALLEY - AREA 1495	ER,A	IR	12-31-2011
36205.1027	BUILDING T-91	ER,A	IR	12-31-2011
36205.1028	POL STORAGE UST (2) BLDG T-93	ER,A	IR	07-31-1981
36205.1029	WASTE POL STORAGE UST BLDG T-198	ER,A	IR	07-31-1981
36205.1030	NEW JERSEY ANG POND	ER,A	IR	09-30-2003
36205.1031	NYANG MAINTENANCE SHOP	ER,A	IR	07-31-1987
36205.1032	DOL BATTERY SHOP BLDG P-44	ER,A	IR	09-30-1997
36205.1033	DOL MAINTENANCE SHOP	ER,A	IR	07-31-1987
36205.1034	PESTICIDE/HERBICIDE STORAGE BLDG	ER,A	IR	09-30-1999
36205.1035	HAZARDOUS WASTE STORAGE SITE BLD	ER,A	IR	10-31-1993
36205.1036	INFECTIOUS WASTE INCINERATOR	ER,A	IR	07-31-1987
36205.1037	SPRAY BOOTH BLDG T-197	ER,A	IR	03-31-1993
36205.1038	DRMO OFFICE (YARD)	ER,A	IR	07-31-1987
36205.1039	PAINT DUMP	ER,A	IR	06-30-1993
36205.1040	OLD POL DRYING BEDS	ER,A	IR	05-31-1997
36205.1041	OLD POL STORAGE YARD	ER,A	IR	03-31-1993

36205.1042	SAGE COMPLEX USTS	ER,A	IR	01-31-1996
36205.1043	BLDG T-4006 UST	ER,A	IR	09-30-2007
36205.1044	BLDG 1245 UST	ER,A	IR	12-31-2011
36205.1045	BLDG T-2180 UST	ER,A	IR	07-30-1994
36205.1047	BLDG T-2195 UST	ER,A	IR	06-30-1995
36205.1048	SAGE COMPLEX STORM SEWER OUTFALL	ER,A	IR	06-30-1997
36205.1049	FORMER PESTICIDE STORAGE BLDG S2	ER,A	IR	07-31-1997
36205.1050	AIRFIELD WATER TOWER	ER,A	IR	03-31-1995
36205.1051	T-2161 WATER TOWER	ER,A	IR	03-31-1995
36205.1052	TRAINING SITE POL CONTAM. NEAR R	ER,A	IR	09-30-2004
36205.1053	HAZARDOUS WASTE STORAGE BLDG 111	ER,A	IR	12-31-1996
36205.1054	PBA at Fort Drum	ER,A	IR	12-31-2015
36205.1055	4475 East	ER,A	IR	11-30-2009
36205.1056	P10680 West	ER,A	IR	11-30-2009
36205.1057	P-10470 East	ER,A	IR	11-30-2009
36205.1058	4482	ER,A	IR	11-30-2009
36205.1059	P-10580	ER,A	IR	11-30-2009
36205.1060	P-10660 East	ER,A	IR	11-30-2009
36205.1061	P-10660	ER,A	IR	12-31-2009
36205.1062	P-10168	ER,A	IR	11-30-2009
36205.1063	P-10470 West	ER,A	IR	06-30-2011
36205.1064	4485 East	ER,A	IR	11-30-2009
36205.1065	P-10170	ER,A	IR	12-31-2009
36205.1067	Gasoline Alley Area 1700	ER,A	IR	12-31-2013
36205.1069	WELL 9 CONTAMINATION	ER,A	IR	09-15-2017

36205.1070	LEAK OF PROPYLENE GLYCOL	ER,A	IR	10-01-2018

COMMUNITY INVOLVEMENT

Technical Review Committee Establishment Date: N/A
Restoration Advisory Board (RAB) Establishment Date: N/A
RAB Adjournment Date: N/A
RAB Adjournment Reason: N/A
Reasons for Not Establishing RAB: No sufficient, sustained community interest in a RAB has been expressed by the community.
RAB Date of Solicitation from Community: 11/09/2024
RAB Results of Solicitation: A determination was made that a RAB was not needed at this time due to a lack of community interest.
Current Technical Assistance for Public Participation (TAPP): N/A
TAPP Title: N/A
Potential TAPP: N/A
Administrative Record Location: Building 44, Fort Drum, NY 13602-5097 315-772-4211
Information Repository Location: Building 44, Fort Drum, NY 13602-5097 315-772-4211
Community Involvement Plan (Date Published): 06/01/2022

FIVE YEAR / PERIODIC REVIEW SUMMARY

Five year/Periodic Review Title:	FORT DRUM_PR_1st_201506
Status:	COMPLETE
Start Date:	03-30-2013
End Date:	06-30-2015
Actions Narrative:	N/A.
Plans Narrative:	N/A.
Results Narrative:	NO ISSUES.

Five year/Periodic Review Title:	Final Second Installation-Wide Periodic Review
Status:	COMPLETE
Start Date:	06-15-2018
End Date:	09-30-2019
Actions Narrative:	Multi-site - see original document
Plans Narrative:	Multi-site - see original document
Results Narrative:	Multi-site - see original document