EMID-704314

N3B Los Alamos

2025 Update to the Site Discharge Pollution Prevention Plan

NPDES Permit No. NM0030759
May 1, 2026

Pajarito Watershed

Receiving Waters:
Pajarito Canyon, Starmer Canyon, Twomile Canyon, and Threemile Canyon

Volume 3

CONTENTS

Attachments

119.0 2M-SMA-1: SWMU 03-010(a)

One historical industrial activity area, Site 03-010(a), is associated with 2M-SMA-1 (permitted feature E001). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

119.1 Site Descriptions

03-010(a) (9/28/2023)

SWMU 03-010(a) is surface disposal area and drainage that received waste generated from vacuum pumps repaired at the shop in building 03-30 [AOC 03-001(e)] at TA-03. The surface disposal area received discharges of waste oil and mercury between 1950 and 1957. Former site workers estimated that between 150 and 200 lb of mercury was in the waste oil discharged to the drainage along with tritium and transuranics. The drainage encompasses an area approximately 40 ft long × 15 ft wide on a moderately steep slope southwest of building 03-30 that discharges into Twomile Canyon. Waste oil from the vacuum repair shop in building 03-30 was subsequently collected and stored in containers at AOC 03-001(e) located on the west side of the building until 1992.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 119-1.

Table 119-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
03-010(a)	Former vacuum repair shop outfall	Lead, mercury, tritium, and transuranic elements

119.2 Control Measures

All active control measures in use at 2M-SMA-1 are listed in Table 119-2. Their locations are shown on the project map (Figure 119-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 119-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00102040026	Established vegetation	-	X	X	-	4-23-2013
E00103010014	Earthen berm	X	-	-	X	6-19-2012
E00103110035	Eco-block	X	-	-	X	6-17-2019
E00103120034	Rock berm	-	-	X	-	11-4-2015
E00104060010	Riprap	X	-	X	-	6-1-2009
E00104060011	Riprap	X	-	X	-	6-1-2009
E00104060033	Riprap	-	X	-	X	11-4-2015
E00105020013	Sediment basin	X	-	-	X	6-19-2012

Table 119-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00106010007	Rock check dam	X	-	-	X	6-1-2009
E00106010008	Rock check dam	X	-	-	X	6-1-2009
E00106010009	Rock check dam	X	-	-	X	6-1-2009
E00106010017	Rock check dam	X	-	-	X	6-19-2012
E00106010018	Rock check dam	X	-	-	X	6-19-2012
E00106010019	Rock check dam	X	-	-	X	6-19-2012
E00106010020	Rock check dam	X	-	-	X	6-19-2012
E00106010021	Rock check dam	X	-	-	X	6-19-2012
E00106010022	Rock check dam	X	-	-	X	6-19-2012
E00106010023	Rock check dam	X	-	-	X	6-19-2012
E00106010024	Rock check dam	X	-	-	X	6-19-2012
E00106010025	Rock check dam	X	-	-	X	6-19-2012
E00106010028	Rock check dam	X	-	-	X	6-19-2015
E00106010029	Rock check dam	X	-	-	X	6-19-2015
E00106020031	Log check dam	-	X	-	X	11-18-2015
E00106020032	Log check dam	-	X	-	X	11-18-2015

119.3 Inspections and Maintenance

2M-SMA-1 was in long-term stewardship in 2025, subject to inspection requirements outlined in the Permit Part I.B.8.c. Rain gage RG121.9 did not record a 3-yr, 24-hr storm event in 2025, so no post-storm inspections were required. All other control measure inspections conducted at the SMA are summarized in Table 119-3. No maintenance activities or facility modifications were conducted at the SMA during 2025.

Table 119-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Long-Term Stewardship	BMP-114600	10-30-2025	No deficiency noted.

119.4 Stormwater Monitoring

119.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, two baseline-monitoring stormwater samples were collected on August 4 and August 20, 2011. Analytical results from these samples yielded TAL exceedances for aluminum (1200 µg/L) and gross-alpha activity (18.3 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures, two corrective-action stormwater samples were collected on July 25 and September 12, 2012. Analytical results from these samples yielded a TAL

exceedance for aluminum (1430 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2012, NPDES Permit No. NM0030759" (LANL 2013, 237680).

Confirmation-monitoring samples were collected on May 22 and May 31, 2023. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in the "2023 Update to the Site Discharge Pollution Prevention Plan, Overview" (N3B 2024, 703196) and were included in the SSD in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282).

In the approved 2023 SIP Revision 1 (N3B 2024, 703282; EPA 2024, 703316), 2M-SMA-1 screened into Long-term Stewardship status per Permit part I.C.3.a, effective January 15, 2024.

119.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was not conducted at 2M-SMA-1 in 2025. The SMA was in Long-Term Stewardship status, as discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922).

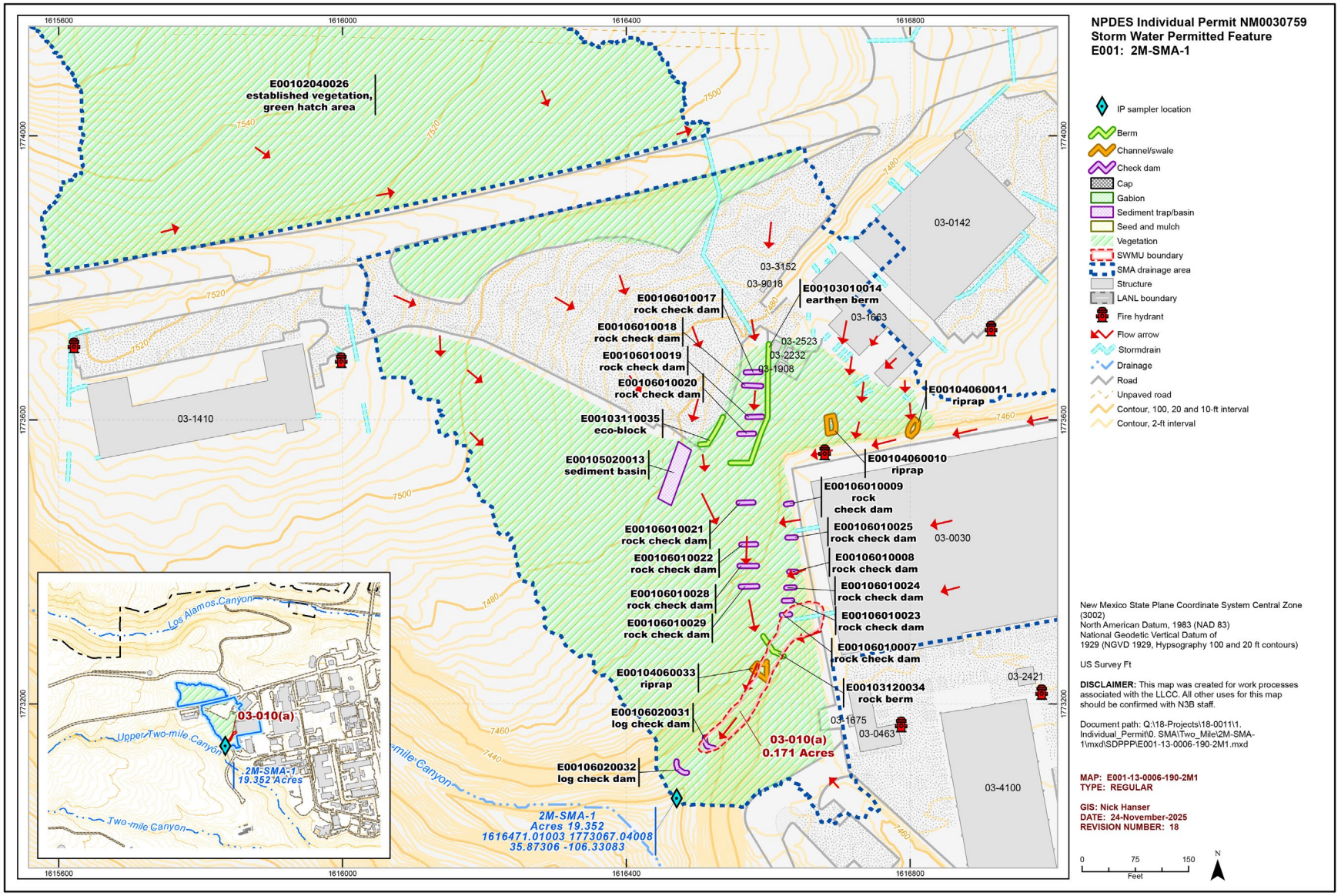

Figure 119-1 2M-SMA-1 location map

120.0 2M-SMA-1.42: SWMU 06-001(a)

One historical industrial activity area, Site 06-001(a), is associated with 2M-SMA-1.42 (permitted feature E002). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

120.1 Site Descriptions

06-001(a) (N3B 2025, 703882)

SWMU 06-001(a) is an inactive septic system located north of former building 06-3. The septic system served former buildings 06-1 and 06-3 and consists of an 840 gal. septic tank (structure 06-40), inlet and outlet drainlines, and an associated outfall that discharged to Tributary A of Twomile Canyon. The septic tank was located approximately 80 ft north of former building 06-3.

Former building 06-1 was constructed in May 1944 and was originally used to develop analytical procedures for nonradioactive cobalt tracer shots. An engineering drawing shows the building as having two rooms, one identified as a carpenter shop and the other as a laboratory (McGehee et al. 2004, 108213). The laboratory had an acid-resistant workbench and a lead-lined sink connected to the septic system (LANL 1997, 056664, p, 129). In the late 1950s, silver soldering may have been conducted in the carpenter shop. In the early 1980s, cable and boxed inert supplies were warehoused in former building 06-1 (Schott 1993, 021496). The building was not used after the carpenter shop closed in the 1980s.

Former building 06-3 was also constructed in 1944 and housed a restroom, darkroom, and laboratory with a lead-lined sink. The building was first used as a control bunker for explosives shots and was surrounded on three sides by an earthen berm. Explosion-proof fixtures were subsequently installed because diethyl ether was used in the analyses performed in the building (McGehee et al. 2004, 108213, p. 36). From 1945 to 1948, building 06-3 housed offices, and from 1948 to the early 1950s, the building had a firing control panel and a bridgewire-testing laboratory to prepare cobalt tracers. In 1972, building 06-3 was remodeled into a printed circuit shop, and was later used as a silk-screen facility until the mid-1980s. After the mid-1980s, the building was used for storage.

The septic system was decommissioned in 1986, and the outlet drainline from the septic tank (structure 06-40) was plugged in 1988 (LANL 1989, 011546). During a reconnaissance site visit in 1992, the septic tank was located and found to be empty (Rofer and Guthrie 1992, 015040). Buildings 06-1 and 06-3 were demolished and removed in 2004. The septic system was left in place. The septic tank was removed during the 2022 investigation activities and the inlet, outlet, and terminus of the drainline were plugged.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 120-1.

Table 120-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
06-001(a)	Septic system	Lead, silver, HE, and cobalt

120.2 Control Measures

All active control measures in use at 2M-SMA-1.42 are listed in Table 120-2. Their locations are shown on the project map (Figure 120-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 120-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00202040015	Established vegetation	-	X	X	-	4-23-2013
E00203010011	Earthen berm	-	X	-	X	11-30-2011
E00203010012	Earthen berm	X	-	-	X	11-30-2011
E00203010014	Earthen berm	X	-	-	X	5-14-2012
E00203120003	Rock berm	X	-	-	X	6-1-2009
E00206010006	Rock check dam	X	-	-	X	8-3-2010
E00206010007	Rock check dam	X	-	-	X	8-3-2010
E00206010008	Rock check dam	X	-	-	X	8-3-2010

120.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-1.42 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

120.4 Stormwater Monitoring

120.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, two baseline-monitoring stormwater samples were collected on August 21 and September 15, 2011. Analytical results from these samples yielded TAL exceedances for aluminum (794 µg/L) and gross-alpha activity (51.8 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures at 2M-SMA-1.42, a corrective-action stormwater sample was collected on July 20, 2015. Analytical results from this sample yielded TAL exceedances for aluminum (1900 µg/L) and gross-alpha activity (16 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2015, NPDES Permit No. NM0030759" (LANL 2016, 601240).

120.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 2M-SMA-1.42 from April 9 through November 13, 2025, resulting in a monitoring season of 218 days. Eight inspections performed during the monitoring period are summarized in Table 120-3. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 120-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111342	4-30-2025	No	None	None
SMPLR-111606	5-5-2025	No	5-4-2025	0.38/1.08
SMPLR-111663	6-18-2025	No	5-5-2025 5-6-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.15/0.6 0.03/0.12 0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112505	7-18-2025	No	6-24-2025 6-26-2025 6-27-2025 6-30-2025 7-7-2025 7-17-2025	0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11 0.23/0.29 0.07/0.1
SMPLR-113264	8-21-2025	No	7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025 8-19-2025	0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16 0.47/0.51
SMPLR-113929	9-26-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025	0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37 0.05/0.1 0.04/0.13
SMPLR-114598	10-24-2025	No	9-27-2025 9-28-2025 10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.17/0.4 0.07/0.13 0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44
SMPLR-114989	11-13-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

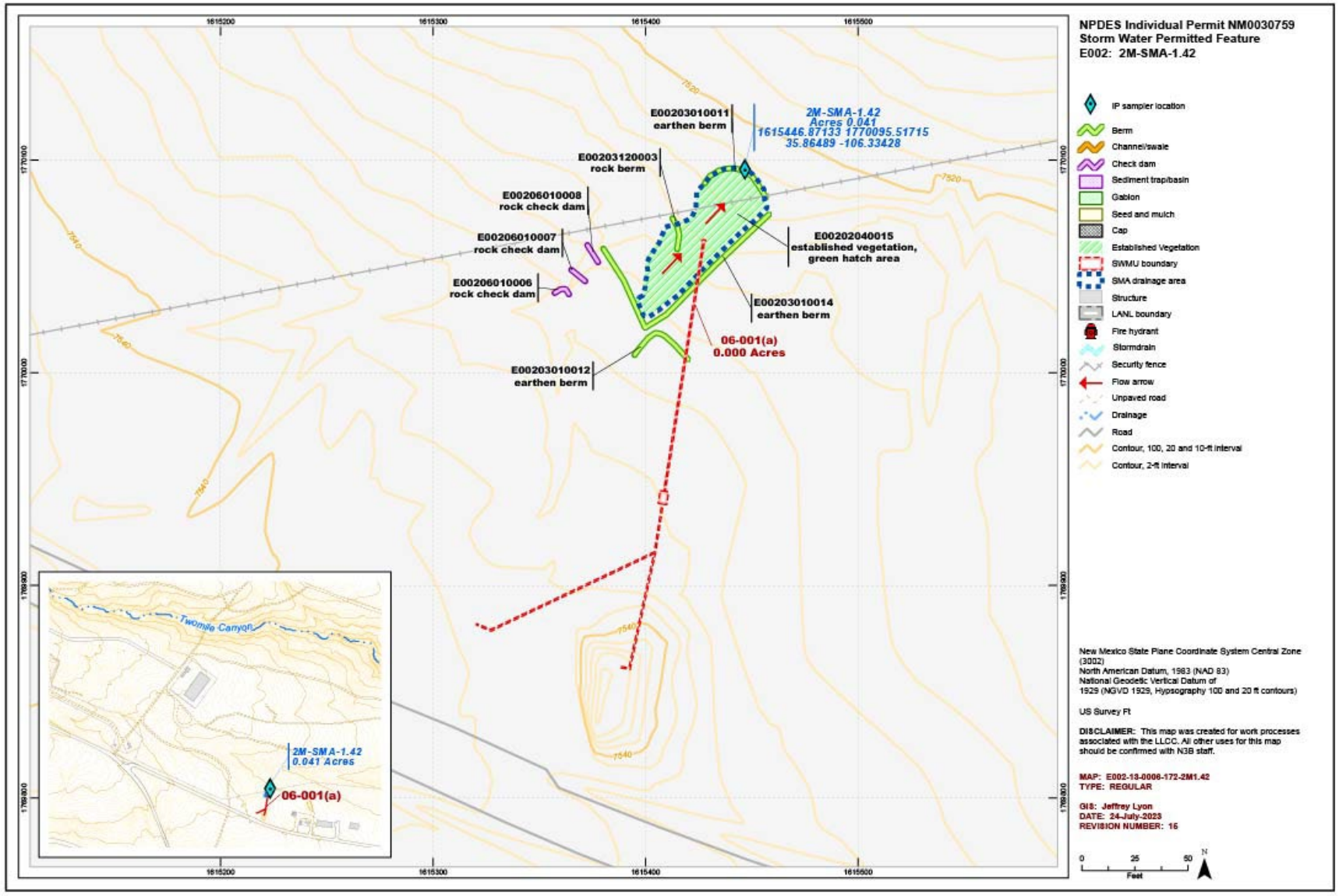

Figure 120-1 2M-SMA-1.42 location map

121.0 2M-SMA-1.43: SWMUs 22-014(a) and 22-015(a)

Two historical industrial activity areas, Sites 22-014(a) and 22-015(a), are associated with 2M-SMA-1.43 (permitted feature E003). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

121.1 Site Descriptions

22-014(a) (N3B 2025, 703882)

SWMU 22-014(a) consists of an active HE sump system located immediately south of building 22-93. The sump system consists of a concrete sump measuring approximately 4 ft deep × 9 ft long × 3 ft wide, containing an inset aluminum tank, an inlet drainline, an inactive outlet drainline, and seepage pit. The sump system has been operating since 1985 and receives rinse water from a washing facility for parts and clothing from explosives compacting operations in rooms C112 and C114 in building 22-93 (LANL 1993, 007512).

Before 1995, the sump discharged approximately 100 gal. of wastewater each week through a drainline to a seepage pit located 150 ft south of the sump in the upper part of Tributary B of Twomile Canyon. The seepage pit is 4 ft in diameter and 36 ft deep (LANL 1985, 109184). In 1995, the outflow from the sump was capped leaving the sump outlet drainline and seepage pit inactive (LANL 1997, 056664). Operations in building 22-93 continue to discharge wastewater to the sump, where the effluent is retained and suspended HE solids settle out as sludge. The sump contents are periodically removed for disposal at approved facilities at TA-16 (LANL 1997, 056664). The sump is equipped with a level monitor and an alarm that are monitored remotely. During the 2022–2024 investigation, a manhole and filter basket were removed, and associated drainlines were plugged.

22-015(a) (N3B 2025, 703882)

SWMU 22-015(a) consists of two inactive seepage pits (Pits A and B), located in an open grass-covered area east of building 22-91 (LANL 1990, 007512). Each pit has an outside diameter of 4 ft and is filled with crushed gravel, with a central 4-in. polypropylene perforated pipe vented to the surface (Creamer 1993, 015248). Pit A is 26 ft deep, and Pit B is 20 ft deep (LANL 1997, 056749).

The seepage pits were operated in series and served rooms B102, B107, B121, B123, B145, and B160 in building 22-91, which housed printed circuit board etching operations (DOE 1987, 008663). The seepage pits began operation shortly after building 22-91 was occupied in 1985. From 1985 to 1987, treated waste from the etching operations was discharged through a 6-in.-diameter PVC drainpipe to the seepage pits (LANL 1997, 056749). Since the effluent production rate exceeded the infiltration rate of liquid into the tuff, causing the seepage pits to overflow, the drainline was disconnected from the seepage pits in 1987 and the pits became inactive (Creamer 1993, 015248; LANL 1997, 056749). After the pits were disconnected, effluent was allowed to daylight for only a few months, before the drainlines were tied into the TA-16 WWTF (Creamer 1993, 015248). During 2023, the surface infrastructure of both seepage pits was removed and the associated drainlines were plugged.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 121-1.

Table 121-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
22-014(a)	Sump System	HE
22-015(a)	Drainlines and dry wells	Copper, iron, cyanide, and organic chemicals

121.2 Control Measures

All active control measures in use at 2M-SMA-1.43 are listed in Table 121-2. Their locations are shown on the project map (Figure 121-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 121-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00302040005	Established vegetation	-	X	X	-	4-23-2013
E00306010003	Rock check dam	-	X	-	X	10-28-2009

121.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-1.43 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

121.4 Stormwater Monitoring

121.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on July 12, 2013. Analytical results from this sample yielded TAL exceedances for aluminum (1500 µg/L) and gross-alpha activity (52 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

A partial-volume confirmation-monitoring sample was collected on June 7, 2023. Analytical results from this sample yielded an exceedance for total PCBs (0.00358 µg/L). The complete analytical results are presented in the "2023 Update to the Site Discharge Pollution Prevention Plan, Overview" (N3B 2024, 703196) and were included in the SSD in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282).

Confirmation-monitoring samples were collected on May 11, May 16, and July 13, 2024. Sample collection for the second sample began in the early morning of May 16, 2024, but because storm dates are measured from 6:00 a.m. through 5:55 a.m. the following day, the retrieval is associated with the May 15, 2024, rain event listed in Table 121-4. Analytical results from the May samples yielded TAL exceedances for copper (26.9 µg/L and 4.78 µg/L for May 11 and May 16, respectively), and total PCBs in

the May 11, 2024, sample (0.00324 µg/L). The July sample yielded no TAL exceedances. The complete analytical results are presented in "2024 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit no. NM0030759" (N3B 2025, 703800); in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814); and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922).

121.4.2 Stormwater Monitoring during 2025

No stormwater monitoring was conducted at 2M-SMA-1.43 in 2025. The SMA and all associated Sites were in Corrective Action, as discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922).

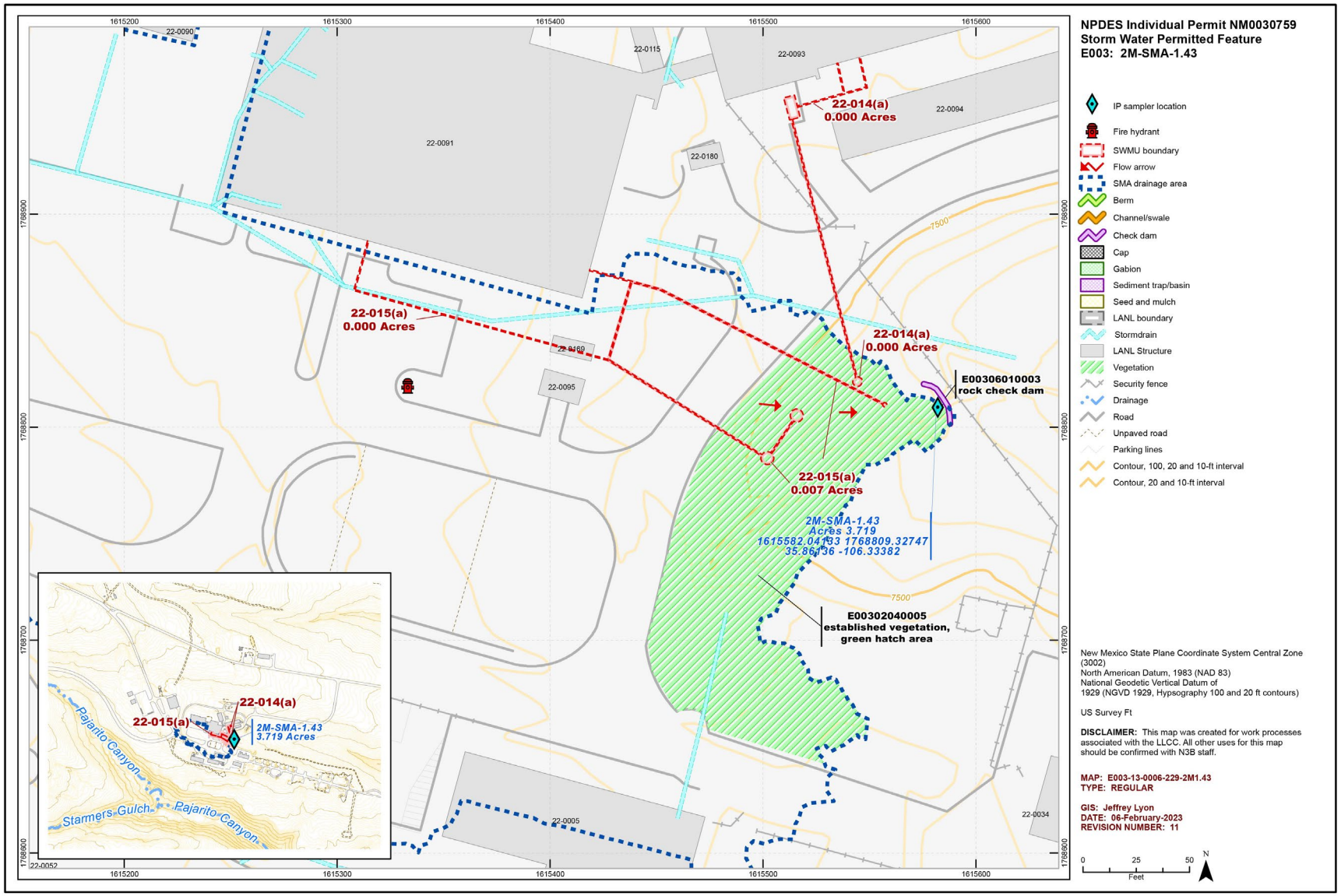

Figure 121-1 2M-SMA-1.43 location map

122.0 2M-SMA-1.44: SWMU 06-001(b)

One historical industrial activity area, Site 06-001(b), is associated with 2M-SMA-1.44 (permitted feature E004). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

122.1 Site Descriptions

06-001(b) (N3B 2025, 703882)

SWMU 06-001(b) is an inactive septic system located north of former building 06-6. The septic system served former building 06-6 and consists of a 960-gal.-capacity septic tank (structure 06-43), inlet and outlet drainlines, a distribution box, filter trench, and outfall that discharged to Tributary A of Twomile Canyon. The septic tank is located 200 ft north of former building 06-6 and measures 5 ft wide × 15 ft long × 5 ft 9 in. deep. Effluent from the septic tank discharged north to a distribution box and then to a filter trench consisting of two parallel trenches with perforated pipe, surrounded by sand and covered with gravel (LASL 1973, 108216). Overflow from the filter trench flowed north to the outfall.

The septic system operated from 1945 to the 1980s. In 1989, the outlet drainline from the septic tank was cut and capped (Alexander 1989, 005626). Building 06-6 was demolished and removed in 2004; however, the septic tank, drainlines, distribution box, and filter trenches were left in place.

Former building 06-6 originally housed laboratory operations related to detonator assembly, an electronics work room, a chemistry laboratory, two darkrooms, restrooms, and a sink. The sink drain received rinsate from cleaning copper, brass, and steel parts, dipped in nitric acid to remove silver solder flux and oxidized metals. Solvents were also used to degrease metal. Tin and lead soldering using paste and aqueous zinc/aluminum chloride fluxes was performed on electrical circuits. Manometric apparatuses containing liquid mercury were serviced. Ionizing radiation, in the form of electrically generated x-rays, was used through the 1950s to about 1965 (Schott 1993, 021496). By 1961, the darkrooms, assembly room, and a storage area had been converted to offices (McGehee et al. 2004, 108213). In the 1970s, former building 06-6 was used as a cable shop where acetone, alcohol, and dilute acids may have been used. In the early 1980s, former building 06-6 was used for printed circuit production.

The RFI work plan for OU 1111 (LANL 1993, 026068) and the 1997 RFI report (LANL 1997, 056664) state that plumbing in former buildings 06-5 and 06-8 was tied to SWMU 06-001(b). However, engineering drawings for these two buildings show no drains or points of discharge. In addition, an engineering drawing of the sanitary sewer system at TA-06 shows no waste lines coming from either building (LANL 2001, 108215). Therefore, SWMU 06-001(b) did not receive any discharges from former buildings 06-5 and 06-8. During the 2022 investigation, the septic tank and perforated drain field lines were excavated, and the septic tank drainline was plugged with cement.

Known or Potential Use of Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 122-1.

Table 122-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
06-001(b)	Septic system	Metals, aluminum, copper, lead, mercury, silver, zinc, inorganic and organic chemicals, and HE

122.2 Control Measures

All active control measures in use at 2M-SMA-1.44 are listed in Table 122-2. Their locations are shown on the project map (Figure 122-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

In 2025, changes were made to the list of existing control measures associated with the SMA that are not associated with corrective action. More information is provided in the inspection and maintenance section of this SMA update and in Attachment 1, located at the end of this volume.

Table 122-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00402040008	Established vegetation	-	X	X	-	4-23-2013
E00403010006	Earthen berm	X	-	-	X	11-17-2011
E00403010011	Earthen berm	X	-	-	X	6-23-2015
E00403010015	Earthen berm	-	X	-	X	6-23-2015
E00404060012	Riprap	-	-	X	-	6-23-2015
E00406010009	Rock check dam	X	-	-	X	6-23-2015
E00406010010	Rock heck dam	X	-	-	X	6-23-2015
E00406010013	Rock check dam	-	-	X	-	6-24-2015
E00406010014	Rock check dam	-	-	X	-	6-23-2015

122.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-1.44 during the 2025 season, so no post-storm inspections were required. All other control measure inspections conducted at 2M-SMA-1.44 in 2025 are summarized in Table 12-3. No maintenance activities or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 122-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
FTL Assessment	BMP-111170	5-1-2025	Recommend retirement of straw wattles E00403060019 through E00403060027 and coir logs E00403140016 and E00403140028. Larger, more permanent controls are in place, and the area is highly stable with no evidence of flow or erosion in the area.

122.4 Stormwater Monitoring

122.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on August 21, 2011. Analytical results from this sample yielded TAL exceedances for copper (31.5 µg/L) and gross-alpha activity (21.1 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures at 2M-SMA-1.44, corrective-action stormwater samples were collected on September 12, 2013, and July 31, 2014. Analytical results from these samples yielded TAL exceedances for copper (39.5 µg/L and 27.5 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067) and "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2014, NPDES Permit No. NM0030759" (LANL 2015, 600241).

122.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 2M-SMA-1.44 from April 9 through November 13, 2025, resulting in a monitoring season of 218 days. Eight inspections performed during the monitoring period are summarized in Table 122-4. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 122-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111341	4-30-2025	No	None	None
SMPLR-111605	5-5-2025	No	5-4-2025	0.38/1.08
SMPLR-111661	6-18-2025	No	5-5-2025 5-6-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.15/0.6 0.03/0.12 0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112504	7-18-2025	No	6-24-2025 6-26-2025 6-27-2025 6-30-2025 7-7-2025 7-17-2025	0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11 0.23/0.29 0.07/0.1

Table 122-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113262	8-21-2025	No	7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025 8-19-2025	0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16 0.47/0.51
SMPLR-113924	9-26-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025	0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37 0.05/0.1 0.04/0.13
SMPLR-114596	10-24-2025	No	9-27-2025 9-28-2025 10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.17/0.4 0.07/0.13 0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44
SMPLR-114988	11-13-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

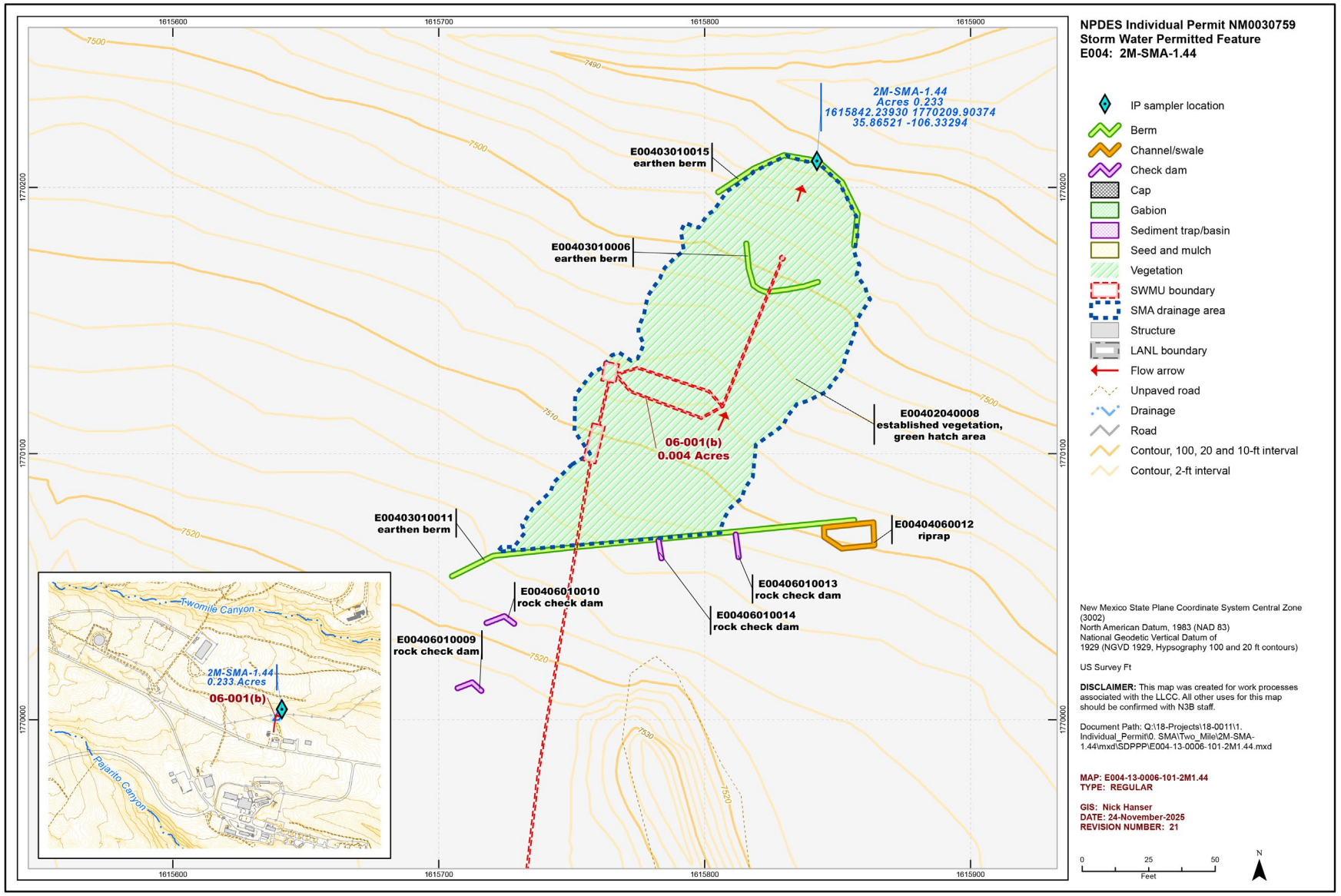

Figure 122-1 2M-SMA-1.44 location map

123.0 2M-SMA-1.45: SWMU 06-006

One historical industrial activity area, Site 06-006, is associated with 2M-SMA-1.45 (permitted feature E005). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

123.1 Site Descriptions

06-006 (N3B 2025, 703882)

SWMU 06-006 is a former container and equipment storage area located along the south and east sides of former building 06-6. The storage area consisted of a concrete pad and asphalt parking lot measuring approximately 300 ft × 20 ft, and was partially surrounded by a 4-ft berm (LANL 1990, 007511). Waste containers and electrical equipment, including capacitors, were stored in this area from the late 1970s to the late 1980s (ICF Kaiser Engineers 1995, 056879, p. 10). A November 1988 field survey verified that drums containing oil, capacitors and other equipment remained at the site. Evidence of spills and leaks was observed at the site in 1986 and 1988.

Former building 06-6 originally housed laboratory operations related to detonator assembly, an electronics work room, a chemistry laboratory, two darkrooms, restrooms, and a sink. In the 1970s, building 06-6 was used as a cable shop, where acetone, alcohol, and dilute acids may have been used. In the early 1980s, it was used for printed circuit production. Building 06-6 was demolished and removed in 2004. Current building 06-124 is located just east of SWMU 06-006.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 123-1.

Table 123-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
06-006	Storage area	PCBs

123.2 Control Measures

All active control measures in use at 2M-SMA-1.45 are listed in Table 123-2. Their locations are shown on the project map (Figure 123-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 123-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00502040018	Established vegetation	-	X	X	-	4-23-2013
E00503010014	Earthen berm	-	X	-	X	10-31-2011
E00503010015	Earthen berm	X	-	-	X	10-31-2011
E00503010016	Earthen berm	-	X	-	X	6-25-2012
E00503010017	Earthen berm	-	X	-	X	6-25-2012

123.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-1.45 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

123.4 Stormwater Monitoring

123.4.1 Previous Stormwater Monitoring

Following the installation of baseline control measures, a baseline stormwater sample was collected on September 7, 2011. Analytical results from this sample yielded a TAL exceedance for gross-alpha activity (398 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures at 2M-SMA-1.45, two corrective-action stormwater samples were collected on July 7 and August 1, 2015. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2015, NPDES Permit No. NM0030759" (LANL 2016, 601240).

123.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 2M-SMA-1.45 from April 14 through November 6, 2025, resulting in a monitoring season of 206 days. Eight inspections performed during the monitoring period are summarized in Table 123-3. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 123-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111423	5-12-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-111867	6-24-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112597	6-30-2025	No	6-24-2025 6-26-2025 6-27-2025	0.28/0.64 0.17/0.19 0.08/0.12

Table 123-3 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-112875	8-13-2025	No	6-30-2025 7-7-2025 7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025	0.09/0.11 0.23/0.29 0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16
SMPLR-113698	8-29-2025	No	8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.47/0.51 0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17
SMPLR-114185	9-12-2025	No	8-31-2025 9-5-2025 9-6-2025	0.21/0.36 0.27/0.59 0.17/0.37
SMPLR-114433	10-22-2025	No	9-12-2025 9-13-2025 9-27-2025 9-28-2025 10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13 0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44
SMPLR-114964	11-6-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

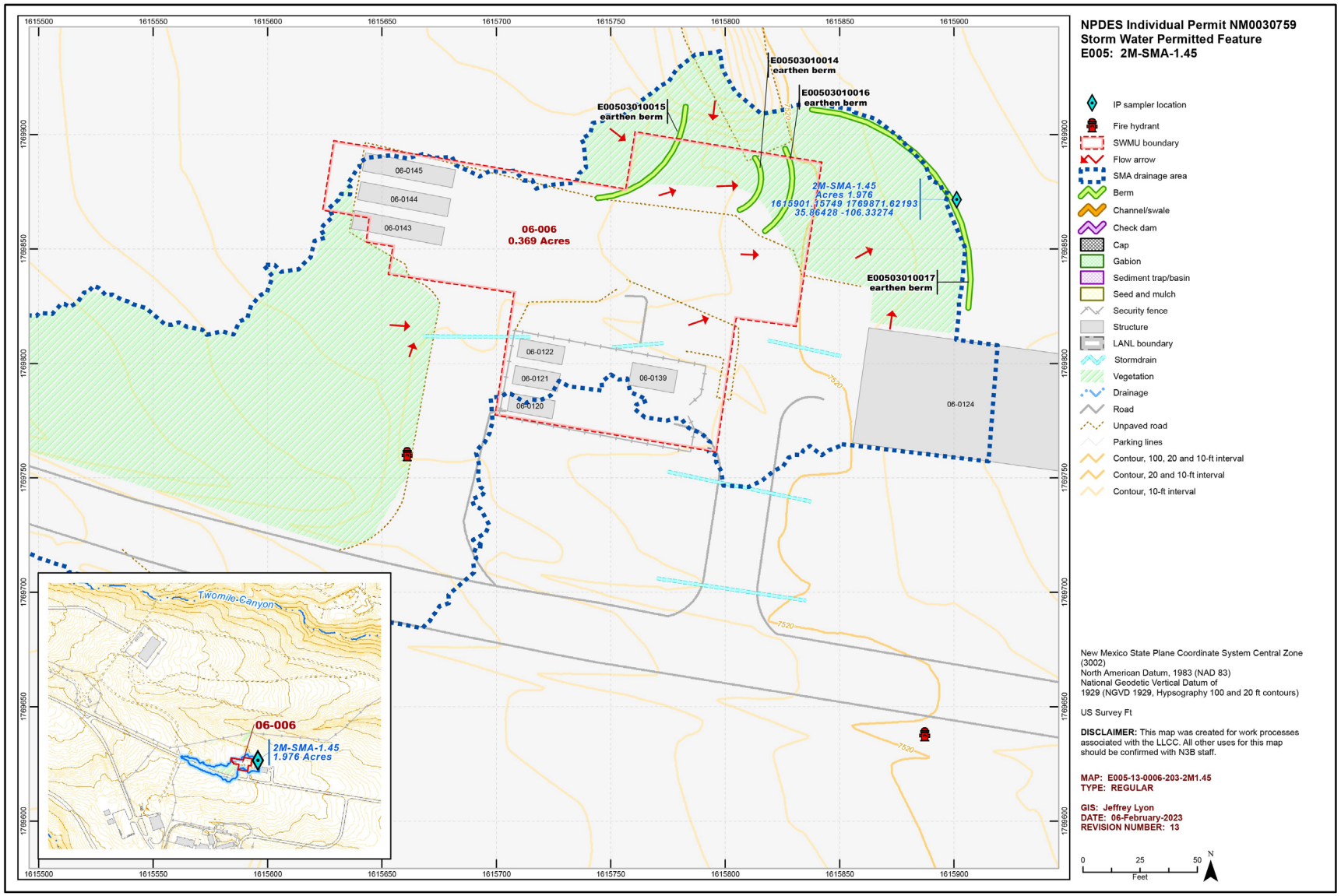

Figure 123-1 2M-SMA-1.45 location map

124.0 2M-SMA-1.5: SWMU 22-014(b)

One historical industrial activity area, Site 22-014(b), is associated with 2M-SMA-1.5 (permitted feature E006). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

124.1 Site Descriptions

22-014(b) (N3B 2025, 703882)

SWMU 22-014(b) consists of an inactive explosives sump and a former outfall area that serves rooms 101 through 113 in building 22-34 (LANL 1990, 007512). The sump is located in the northeast corner of building 22-34, is constructed of concrete, and is 4 ft long × 2 ft wide × 3 ft deep with an inset aluminum tank (LANL 1990, 007512). The sump probably began to be used shortly after building 22-34 was completed in 1953. Building 22-34, currently used as a laser laboratory, previously housed a chemistry laboratory, an explosives laboratory, and a photographic laboratory (LANL 1997, 056664). The sump effluent drained to the north via a drainline to an outfall located in a marshy area in the upper part of Tributary B of Twomile Canyon until 1994, when the sump outlet was plugged (LANL 1997, 056664). The sump has not been used since 1994, when building 22-34 became a laser laboratory. During 2023, the sump was filled with concrete rather than being removed because of concerns about damaging the foundation of building 22-34.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 124-1.

Table 124-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
22-014(b)	Sump system	Silver, HE, inorganic and organic chemicals

124.2 Control Measures

All active control measures in use at 2M-SMA-1.5 are listed in Table 124-2. Their locations are shown on the project map (Figure 124-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 124-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00602040005	Established vegetation	-	X	X	-	4-23-2013
E00603060008	Straw wattle	X	-	-	X	5-30-2024

124.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-1.5 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting drainage were conducted at the SMA in 2025.

124.4 Stormwater Monitoring

124.4.1 Previous Stormwater Monitoring Results

Through Calendar Year 2024, stormwater flow was not sufficient for sample collection at 2M-SMA-1.5.

124.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 2M-SMA-1.5 from March 28 through November 7, 2025, resulting in a monitoring season of 224 days. Seven inspections performed during the monitoring period are summarized in Table 124-3. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no periods of sampler inoperability were encountered.

Table 124-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111188	4-29-2025	No	None	None
SMPLR-111590	5-6-2025	No	5-4-2025 5-5-2025	0.38/1.08 0.15/0.6
SMPLR-111722	6-17-2025	No	5-6-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.03/0.12 0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112490	7-18-2025	No	6-24-2025 6-26-2025 6-27-2025 6-30-2025 7-7-2025 7-17-2025	0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11 0.23/0.29 0.07/0.1
SMPLR-113265	8-21-2025	No	7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025 8-19-2025	0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16 0.47/0.51

Table 124-3 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113942	9-30-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37 0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13
SMPLR-114666	11-7-2025	No	10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

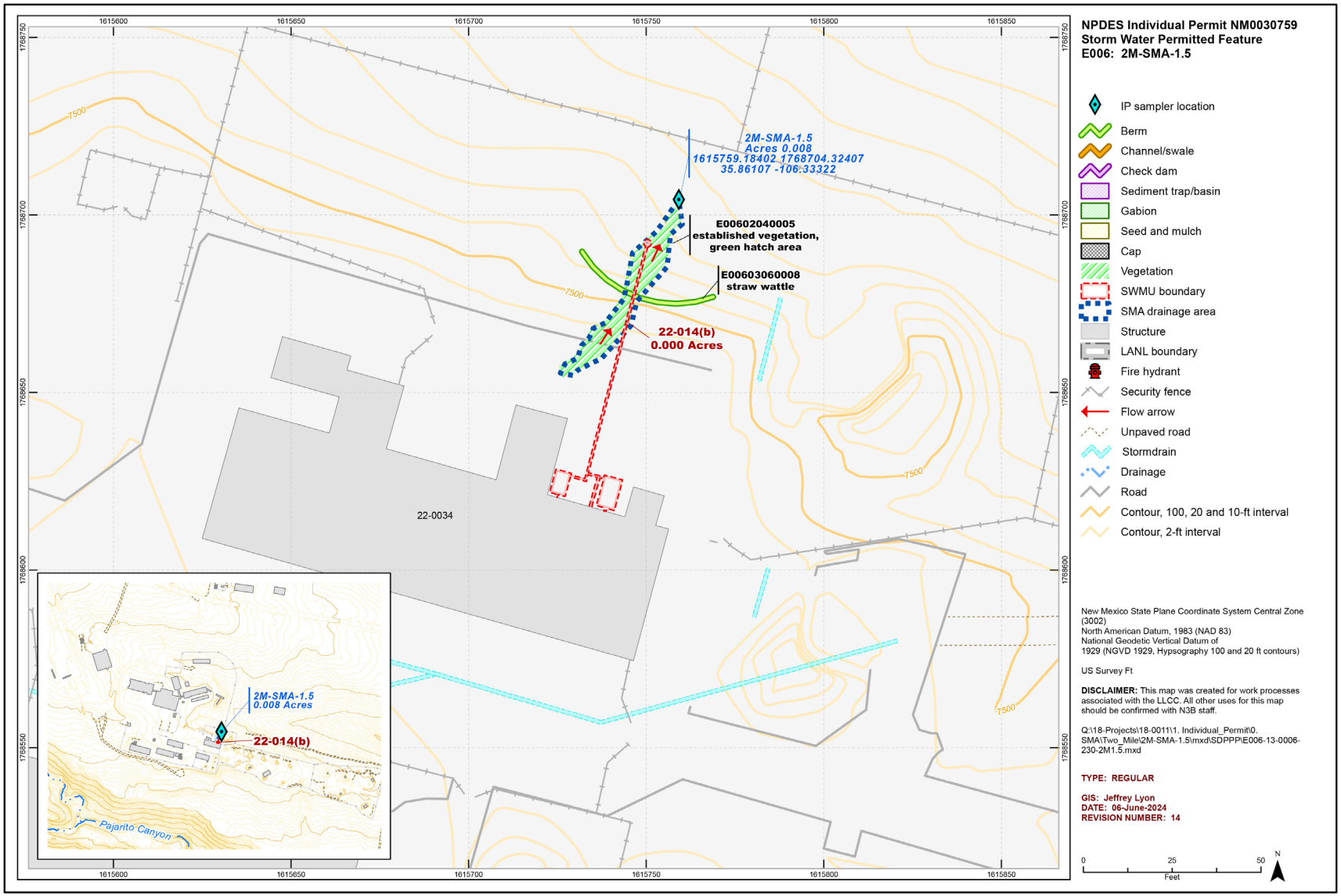

Figure 124-1 2M-SMA-1.5 location map

125.0 2M-SMA-1.65: SWMU 40-005

One historical industrial activity area, Site 40-005, is associated with 2M-SMA-1.65 (permitted feature E007). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

125.1 Site Descriptions

40-005 (N3B 2025, 703882)

SWMU 40-005 is an inactive HE sump (structure 22-75) located at the northwest corner of building 40-41 (formerly building 22-41), associated inlet and outlet drainlines, and a former NPDES-permitted outfall [EPA 05A-154]. The concrete sump was constructed in 1961 and measures 4 ft 6 in. wide × 6 ft 4 in. long × 5 ft deep with an inset aluminum baffle tank (LANL 1990, 007512). Building 40-41 was constructed in 1952. Explosives-grinding operations were previously conducted in the building and wastewater from a single sink drain discharged to the sump (Santa Fe Engineering Ltd. 1993, 108211). Originally, the sump discharged to a drainline to that flowed to Tributary B of Twomile Canyon. In 1994, the sump outlet port was capped, and in December 1995 the outfall was removed from the LANL NPDES permit (LANL 1997, 056664). The sump was subsequently filled with concrete. Currently, building 40-41 is used for the preparation of explosives tests conducted at TA-40.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 125-1.

Table 125-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-005	Sump	HE and aluminum

125.2 Control Measures

All active control measures in use at 2M-SMA-1.65 are listed in Table 125-2. Their locations are shown on the project map (Figure 125-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 125-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00702040011	Established vegetation	-	X	X	-	5-7-2013
E00703010010	Earthen berm	X	-	-	X	5-30-2012
E00706010006	Rock check dam	X	-	-	X	5-30-2012
E00706010007	Rock check dam	X	-	-	X	5-30-2012
E00706010008	Rock check dam	X	-	-	X	5-30-2012
E00706010009	Rock check dam	X	-	-	X	5-30-2012

125.3 Inspections and Maintenance

2M-SMA-1.65 was in long-term stewardship in 2025, subject to inspection requirements outlined in the Permit Part I.B.8.c. Rain gage RG-TA-06 did not record a 3-yr, 24-hr storm event in 2025, so no post-storm inspections were required. All other control measure inspections conducted at 2M-SMA-1.65 are summarized in Table 125-3. No maintenance activities or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 125-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Long-Term Stewardship	BMP-114601	10-2-2025	No deficiency noted.

125.4 Stormwater Monitoring

125.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on August 21, 2011. Analytical results from this sample yielded a TAL exceedance for gross-alpha activity (220 pCi/L). The complete analytical results are presented in the "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures at 2M-SMA-1.65, a corrective-action stormwater sample was collected on September 13, 2013. Analytical results from this sample yielded a TAL exceedance for gross-alpha activity (22.6 pCi/L). The complete analytical results are presented in the "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

In the initial SIP (N3B 2023, 702792; EPA 2023, 704169) for the 2022 Permit, 2M-SMA-1.65 screened into Long-Term Stewardship status per Permit Part 1.C.3.c, effective July 5, 2023.

125.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was not conducted at 2M-SMA-1.65 in 2025. The SMA was in Long-Term Stewardship status, as discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922).

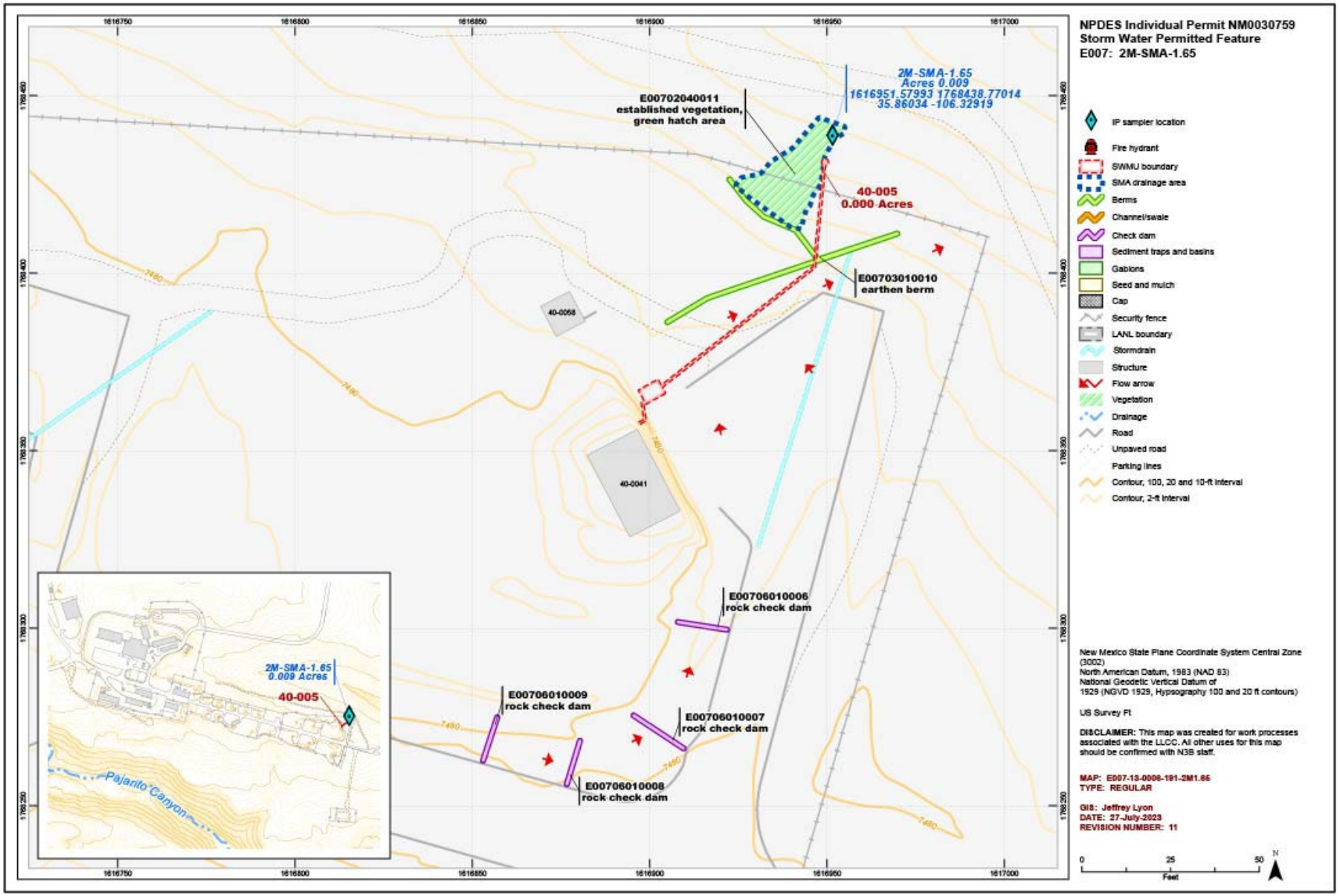

Figure 125-1 2M-SMA-1.65 location map

126.0 2M-SMA-1.67: SWMU 06-003(h)

One historical industrial activity area, Site 06-003(h), is associated with 2M-SMA-1.67 (permitted feature E008). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

126.1 Site Descriptions

06-003(h) (N3B 2025, 703882)

SWMU 06-003(h) is a former firing site located north of Twomile Mesa Road. This Site was not identified in the 1990 SWMU Report (LANL 1990, 007511) and was first discussed in the OU 1111 RFI work plan (LANL 1993, 026068) as part of MDA F. In describing MDA F, the RFI work plan states that defective explosive lenses manufactured for use in the Fat Man implosion weapon were destroyed in this area by detonation in 1945 (LANL 1993, 026068). Some of the lenses were described as consisting of the explosive Baratol, which contains barium and TNT. A former employee involved with the detonations described this firing site as being located in the general area between the larger MDA F disposal pit [SWMU 06-007(a)] and Twomile Mesa Road (Van Vessem 1992, 015073).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 126-1.

Table 126-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
06-003(h)	Firing site	Barium, copper, and HE

126.2 Control Measures

All active control measures in use at 2M-SMA-1.67 are listed in Table 126-2. Their locations are shown on the project map (Figure 126-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 126-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00802040016	Established vegetation	-	X	X	-	4-23-2013
E00803010014	Earthen berm	-	X	-	X	10-31-2011
E00803010015	Earthen berm	-	X	-	X	10-31-2011

126.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-1.67 during the 2025 season, so no post-storm inspections were required. All other control measure inspections conducted at 2M-SMA-1.67 in 2025 are summarized in Table 126-3. No maintenance activities or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 126-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Long-Term Stewardship	BMP-114671	10-15-2025	No deficiency noted.

126.4 Stormwater Monitoring

126.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on September 15, 2011. Analytical results from this sample yielded no TAL exceedances. The HE sample collected on September 15, 2011, was extracted or analyzed beyond the appropriate holding time and thus may have a low bias and potentially under-report the concentration of HE in this sample. Consequently, the results for this analysis cannot be used to confirm that HE is present at a concentration greater or less than the TAL. The complete analytical results are presented in the "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

In the approved 2024 SIP Revision 1 (N3B 2025, 703881; EPA 2025, 703922), 2M-SMA-1.67 screened into eligibility for Site deletion, effective January 15, 2025.

126.4.2 Stormwater Monitoring during 2025

No stormwater monitoring was conducted at 2M-SMA-1.67 in 2025. The SMA and all associated Sites are eligible for deletion. A Site deletion request for 2M-SMA-1.67 was submitted to EPA on November 10, 2025 (N3B 2025, 703983), and was also discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922). Site deletion is pending a minor permit modification from EPA.

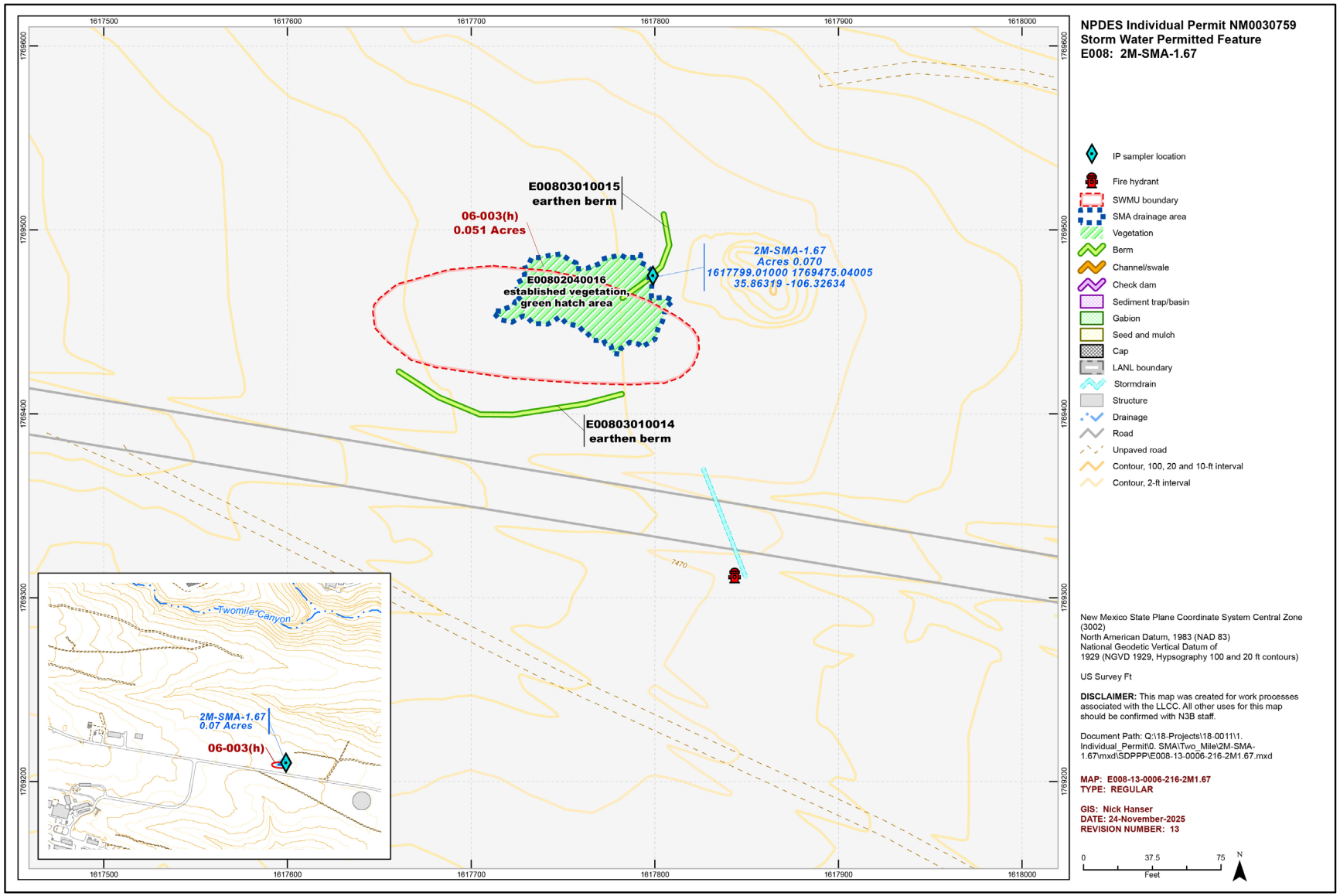

Figure 126-1 2M-SMA-1.67 location map

127.0 2M-SMA-1.7: SWMU 03-055(a)

One historical industrial activity area, Site 03-055(a), is associated with 2M-SMA-1.7 (permitted feature E009). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

127.1 Site Descriptions

03-055(a) (N3B 2025, 703882)

SWMU 03-055(a) consists of an outfall located approximately 70 ft south of the Van de Graaff facility (building 03-16). Roof drains and one floor drain in generator room 68 discharged to the outfall at the edge of the mesa into Twomile Canyon (LANL 1995, 057590). The outfall currently receives only stormwater from Van de Graaff building roof drains (Santa Fe Engineering 1992, 074043). The Van de Graaff facility was constructed in 1952. The facility has been inactive since the late 1990s. Radiological decontamination and decommissioning activities within building 03-16 were conducted in 2005–2007.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 127-1.

Table 127-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
03-055(a)	Outfall from building 03-16	Organic chemicals and PAHs

127.2 Control Measures

All active control measures in use at 2M-SMA-1.7 are listed in Table 127-2. Their locations are shown on the project map (Figure 127-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 127-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E00902040009	Established vegetation	-	X	X	-	4-23-2013
E00903010008	Earthen berm	X	-	-	X	7-9-2012
E00903120005	Rock berm	-	X	-	X	6-23-2010

127.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record a storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-1.7 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

127.4 Stormwater Monitoring

127.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, two baseline monitoring stormwater samples were collected on August 3 and September 9, 2011. Analytical results from these samples yielded a TAL exceedance for copper (11.4 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures at 2M-SMA-1.7, corrective-action stormwater samples were collected on July 8 and August 26, 2014. Analytical results from these samples yielded a TAL exceedance for copper (4.6 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2014, NPDES Permit No. NM0030759" (LANL 2015, 600241).

127.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 2M-SMA-1.7 from April 21 through November 13, 2025, resulting in a monitoring season of 206 days. Six inspections performed during the monitoring period are summarized in Table 127-3. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

A confirmation monitoring sample (partial volume) was collected on August 19, 2025. Analytical results from this sample yielded a TAL exceedance for total PCBs (0.0119 µg/L). The complete analytical results are presented in Appendix B of the Overview and in the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269).

Table 127-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111536	5-8-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-111828	6-20-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15

Table 127-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-112523	8-4-2025	No	6-24-2025 6-26-2025 6-27-2025 6-30-2025 7-7-2025 7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025	0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11 0.23/0.29 0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16
SMPLR-113585	8-25-2025	Yes	8-19-2025 8-23-2025 8-24-2025	0.47/0.51 0.12/0.78 0.22/0.6
SMPLR-114032	10-8-2025	No	8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37 0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13
SMPLR-114795	11-13-2025	No	10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

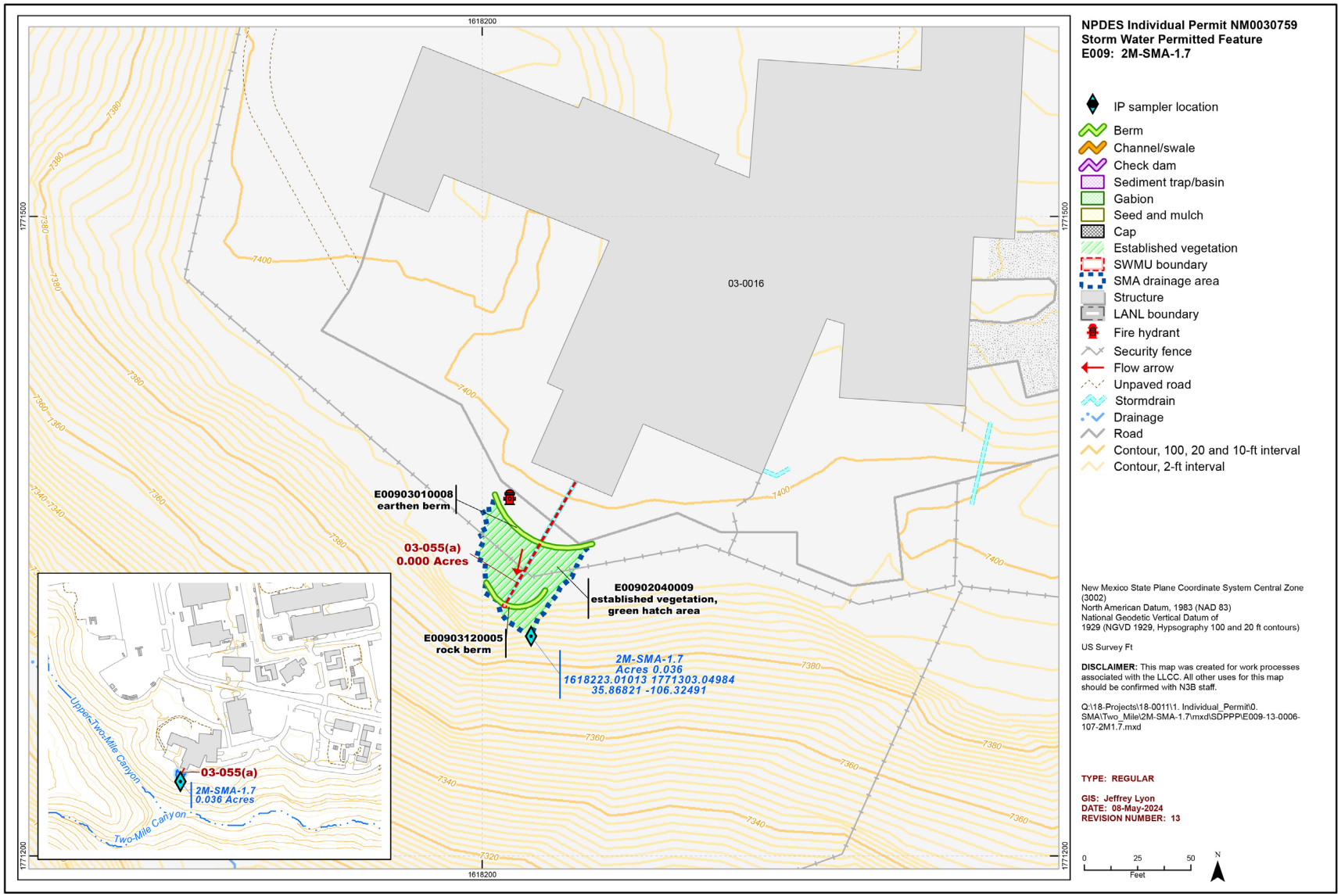

Figure 127-1 2M-SMA-1.7 location map

128.0 2M-SMA-1.8: SWMU 03-001(k)

One historical industrial activity area, Site 03-001(k), is associated with 2M-SMA-1.8 (permitted feature E010). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

128.1 Site Descriptions

03-001(k) (N3B 2025, 703882)

SWMU 03-001(k) is the location of a former less-than-90-day hazardous waste accumulation area located on the south side of building 03-16, the inactive Van de Graaff Accelerator and Ion Beam Facility. SWMU 03-001(k) consists of two level asphalt areas each measuring approximately 20 ft wide × 30 ft long. The areas are located next to doors on the south side of the building. Concrete pads in front of each doorway are bounded by asphalt paving on three sides.

SWMU 03-001(k) was used primarily as a storage yard for electrical equipment destined for salvage (LANL 1993, 020947). A 1986 field inspection of SWMU 03-001(k) noted oily unmarked drums where fresh vacuum oil for experiments was stored (DOE 1987, 008663). Other containers stored at the site included empty drums, empty asphalt-lined drums for waste tritium, and drums containing spent solvents. Use of the storage area ceased in 1992. A 1993 inspection found the asphalt and concrete pads devoid of stains (LANL 1993, 020947).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 128-1.

Table 128-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
03-001(k)	Storage area	PAHs, PCBs, and tritium

128.2 Control Measures

All active control measures in use at 2M-SMA-1.8 are listed in Table 128-2. Their locations are shown on the project map (Figure 128-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Enhanced controls were certified on December 9, 2025, and submitted to EPA on December 10, 2025, as part of corrective action, as described in "NPDES Permit No. NM0030759 - Certification of Installation of Enhanced Control Measures for 2M-SMA-1.8 PJ-SMA-20, DP-SMA-0.4, and 2M-SMA-1.9" (N3B 2025, 704035). Photographs of the enhanced controls are available at https://ext.em-la.doe.gov/IPS/Home/ConstructionCertifications.

Table 128-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E01002040010	Established vegetation	-	X	X	-	4-23-2013
E01003100017	Gravel bags	-	-	X	X	9-25-2025
E01003200013	Compost log	-	X	X	X	9-25-2025
E01003200014	Compost log	-	X	X	X	9-25-2025
E01003200015	Compost log	-	X	X	X	9-25-2025
E01003200016	Compost log	-	X	X	X	9-25-2025
E01006010005	Rock check dam	-	X	-	X	6-23-2010
E01006010006	Rock check dam	-	X	-	X	6-23-2010
E01006010007	Rock check dam	-	X	-	X	6-23-2010

128.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-1.8 during the 2025 season, so no post-storm inspections were required. All other control measure inspections conducted at 2M-SMA-1.8 in 2025 are presented in Table 128-3. No maintenance activities or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 128-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Control Measure Verification	BMP-114565	9-25-2025	Control installation is satisfactory, certification documentation for installation of enhanced controls as a corrective action can be prepared.

128.4 Stormwater Monitoring

128.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, two baseline monitoring stormwater samples were collected, on August 4 and September 9, 2011. Analytical results from these samples yielded TAL exceedances for copper (6.6 µg/L and 13.2 µg/L) and zinc (71.8 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Confirmation-monitoring samples were collected on May 31 and June 3, 2023. Analytical results from these samples yielded TAL exceedances for benzo(b)fluoranthene (1.69 µg/L), copper (4.57 µg/L) and total PCBs (0.22 µg/L and 0.0391 µg/L). The complete analytical results are presented in the "2023 Update to the Site Discharge Pollution Prevention Plan, Overview" (N3B 2024, 703196) and were included in the SSD in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282).

128.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was not conducted at 2M-SMA-1.8 in 2025. The SMA remained in Corrective Action status, as discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922) throughout the monitoring season. Certification of enhanced controls was completed after the end of the monitoring season and confirmation monitoring will begin in 2026.

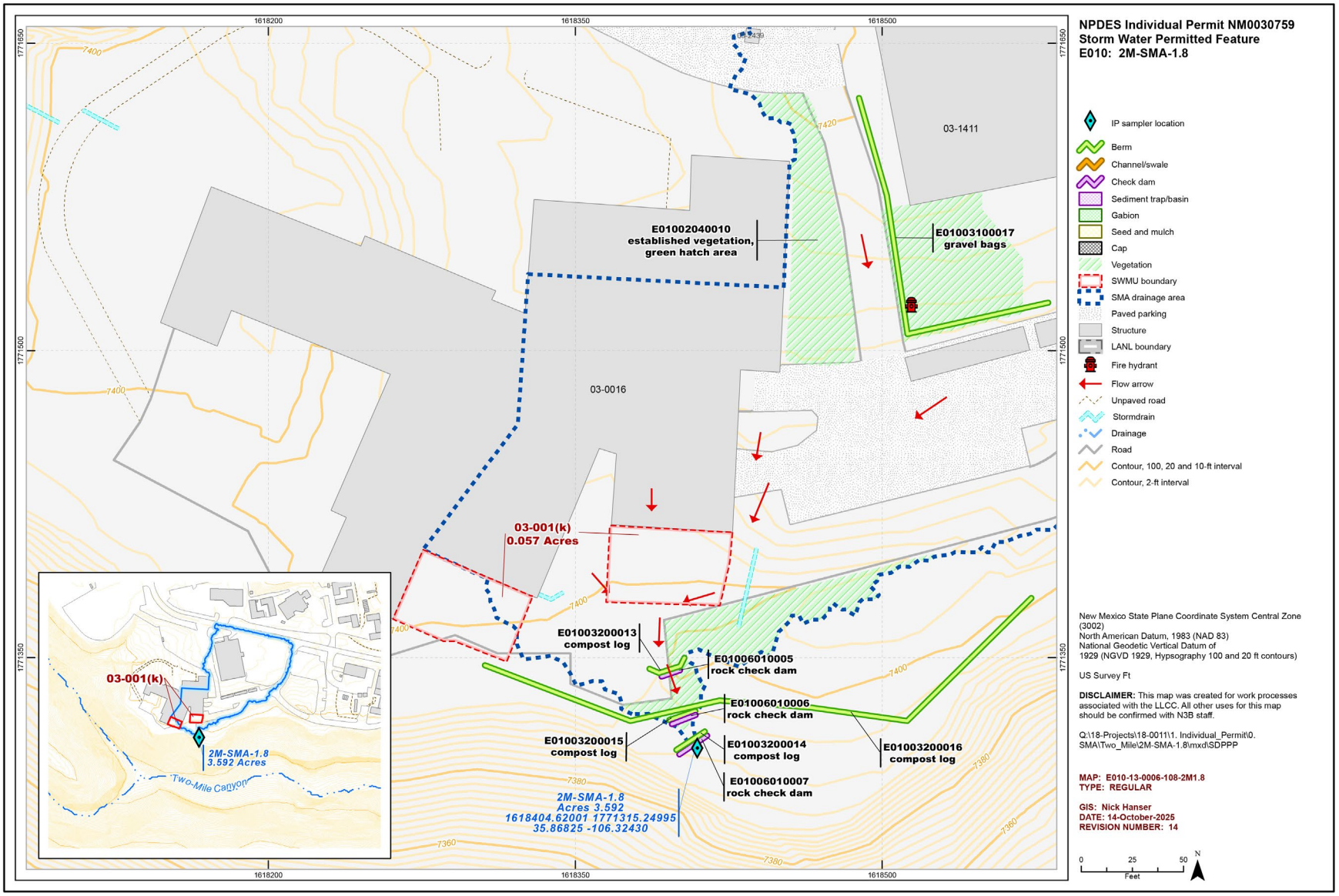

Figure 128-1 2M-SMA-1.8 location map

129.0 2M-SMA-1.9: SWMU 03-003(a)

One historical industrial activity area, Site 03-003(a), is associated with 2M-SMA-1.9 (permitted feature E011). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

129.1 Site Descriptions

03-003(a) (N3B 2025, 703882)

SWMU 03-003(a) is a former outdoor storage area used for temporary storage of electrical equipment destined for salvage, some of which contained oil. The storage area was located on the north and west sides of building 03-218. The northern portion of the storage area consisted of the asphalt paving next to the north side of building 03-218. The western portion of the storage area consisted of a 44 ft long × 27 ft wide concrete pad surrounded by an 18 in. to 20 in. high concrete curb. The concrete pad and curb are bounded on three sides by soil covered with gravel. A 30 ft wide × 60 ft long area of asphalt paving abuts the south end of the concrete curb.

During the 1986 CEARP survey (DOE 1986, 036409), several hundred capacitors, some marked as containing PCBs, were stored on pallets the asphalt in the storage area on the north side of building 03-218; staining was visible on the asphalt beneath capacitors. Capacitors and transformers labeled as containing less than 50 ppm PCBs were stored in the southwest portion of the former storage area. During a 1989 inspection, leaking capacitors, drums of epoxy, one or two facility backup batteries, and vacuum pumps were observed in the southwest portion of the storage area. In the early 1990s, a small area of oil-stained asphalt was excavated to a depth of 3 in. around the storm drain located in the western portion of SWMU 03-003(a) (LANL 1993, 020947). Use of the SWMU 03-003(a) storage area ceased in the early 1990s.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 129-1.

Table 129-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
03-003(a)	Storage area	Lead, organic chemicals, PCBs, and SVOCs

129.2 Control Measures

All active control measures in use at 2M-SMA-1.9 are listed in Table 129-2. Their locations are shown on the project map (Figure 129-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Enhanced controls were certified on December 9, 2025, and submitted to EPA on December 10, 2025, as part of corrective action, as described in "NPDES Permit No. NM0030759 - Certification of Installation of Enhanced Control Measures for 2M-SMA-1.8, PJ-SMA-20, DP-SMA-0.4, and 2M-SMA-1.9" (N3B 2025, 704035). Photographs of the enhanced controls are available at https://ext.em-la.doe.gov/IPS/Home/ConstructionCertifications.

Table 129-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E01103090001	Curbing	X	-	-	X	4-1-2009
E01103120007	Rock berm	-	X	X	X	10-7-2025
E01103120008	Rock berm	-	X	X	X	10-7-2025

129.3 Inspections and Maintenance

Rain gage RG121.9 recorded one storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-1.9 during the 2025 season, requiring one post-storm inspection, summarized in Table 129-3. All other control measure inspections conducted at 2M-SMA-1.9 are summarized in Table 129-4. No maintenance activities were conducted at the SMA in 2025.

Table 129-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113965	8-19-2025	0.81	8-28-2025	9	Yes

Table 129-4 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Control Measure Verification	BMP-114757	11-4-2025	Control installation is satisfactory, certification documentation for installation of enhanced controls as a corrective action can be prepared.

129.4 Stormwater Monitoring

129.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on July 11, 2012. Analytical results from this sample yielded TAL exceedances for copper (24.9 µg/L) and zinc (314 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2012, NPDES Permit No. NM0030759" (LANL 2013, 237680).

129.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 2M-SMA-1.9 from March 21 through September 18, 2025, resulting in a monitoring season of 181 days. Eleven inspections performed during the monitoring period are summarized in Table 129-5. Rain gage RG121.9 recorded 30 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

Confirmation monitoring samples were collected on August 19 and September 5, 2025. Analytical results from both samples yielded a TAL exceedance for total PCBs (1.34 µg/L and 0.0753 µg/L), and the September sample also yielded a TAL exceedance for hexachlorobenzene (0.0169 µg/L). The complete

analytical results are presented in Appendix B of the Overview and in the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269).

The sampling equipment was deactivated for the monitoring season at a subsequent inspection after confirmation that the samples met the SAP requirements.

Table 129-5 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111160	4-24-2025	No	None	None
SMPLR-111545	5-5-2025	No	5-4-2025	0.28/1.27
SMPLR-111659	6-5-2025	No	5-5-2025 5-6-2025 5-7-2025 5-25-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025	0.16/0.52 0.12/0.49 0.1/0.19 0.13/0.14 0.3/0.46 0.16/0.2 0.1/0.32 0.03/0.11
SMPLR-112325	6-25-2025	No	6-9-2025 6-12-2025 6-24-2025	0.06/0.16 0.12/0.22 0.29/0.64
SMPLR-112733	7-10-2025	No	6-26-2025 6-30-2025 7-7-2025	0.14/0.16 0.13/0.15 0.27/0.33
SMPLR-113154	8-4-2025	No	7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025	0.08/0.1 0.13/0.25 0.26/0.31 0.24/0.31 0.11/0.23
SMPLR-113581	8-21-2025	Yes	8-19-2025	0.81/0.87
SMPLR-113919	8-26-2025	No	8-23-2025 8-24-2025 8-25-2025	0.13/0.77 0.16/0.41 0.13/0.44
SMPLR-114084	9-4-2025	No	8-26-2025 8-31-2025	0.07/0.13 0.48/0.61
SMPLR-114252	9-9-2025	Yes	9-4-2025 9-5-2025 9-6-2025	0.13/0.14 0.26/0.59 0.09/0.31
SMPLR-114345	9-18-2025	No	9-13-2025	0.07/0.12

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

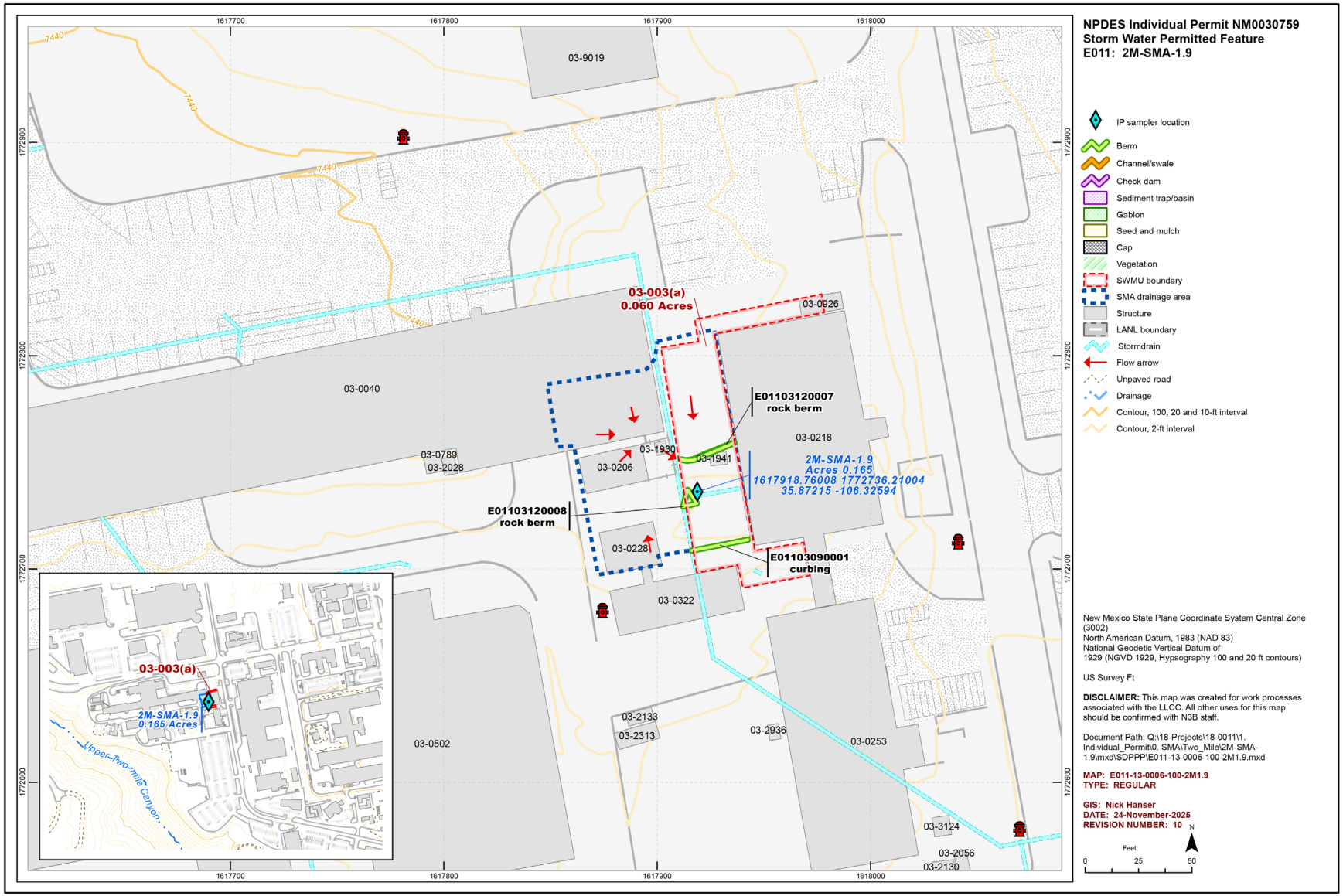

Figure 129-1 2M-SMA-1.9 location map

130.0 2M-SMA-2: SWMUs 03-050(d) and 03-054(b)

Two historical industrial activity areas, Sites 03-050(d) and 03-054(b), are associated with 2M-SMA-2 (permitted feature E012). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

130.1 Site Descriptions

03-050(d) (N3B 2025, 703882)

SWMU 03-050(d) is an area of potential soil contamination associated with exhaust emissions from the air-pollution-control device located on the south side of building 03-102. The device was a shaker-type baghouse situated on a concrete pad (LANL 1990, 007511). Building 03-102 was constructed in 1957 for machining uranium-235 and uranium-238, lithium hydride, and small quantities of other metals. The baghouse was the primary air-pollution-control device to remove lithium hydride particles from the stack emissions, and it was also used as a secondary air-pollution-control device to remove uranium graphite particulates from the stack emissions. The baghouse ceased operating in 1992 because of a failure detected in the collection system efficiency. The baghouse was replaced by HEPA-filter banks.

Radionuclide air emissions from the baghouse were monitored from the time it became operational in 1957 until it was decommissioned in 1992. Releases of radioactive uranium particulates through the baghouse fabric were deposited on the concrete pad. The concrete pad underlying the baghouse was subsequently painted to immobilize any existing uranium particulates. Radiological field survey results showed no detectable activity on the concrete pad or surrounding soil.

03-054(b) (N3B 2025, 703882)

SWMU 03-054(b) consists of a formerly permitted outfall (EPA 03A009) located southeast of building 03-1411 and southwest of building 03-316. The outfall received stormwater from surface areas surrounding 26 buildings, 94 roof drains, and noncontact cooling water from a furnace in building 03-102 (LANL 1995, 057590). The outfall discharges to a drainage channel west of building 03-1612. The outfall was permitted to receive the cooling tower effluent blowdown from building 03-102; however, this discharge was rerouted to the TA-46 SWSC in 1993 (LANL 1995, 057590). A short distance below the outfall is an engineered sediment detention basin.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Sites are listed in Table 130-1.

Table 130-1 POCs Known or Suspected to Have Been Used Historically at the Sites

Site	Potential POC Source	Potential POCs
03-050(d)	Soil contamination from TA-03 exhaust emissions	Metals, inorganic chemicals, uranium-235, and uranium-238
03-054(b)	Outfall from building 03-038	Aluminum, chromium, copper, and metal pigments

130.2 Control Measures

All active control measures in use at 2M-SMA-2 are listed in Table 130-2. Their locations are shown on the project map (Figure 130-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 130-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E01202040015	Established vegetation	-	X	X	-	4-23-2013
E01203090006	Curbing	X	-	-	X	6-1-2009
E01205020016	Sediment basin	-	X	-	X	6-4-2024

130.3 Inspections and Maintenance

Rain gage RG121.9 recorded one storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-2 during the 2025 season, requiring one post-storm inspection, summarized in Table 130-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 130-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113966	8-19-2025	0.81	8-28-2025	9	Yes

130.4 Stormwater Monitoring

130.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, two baseline monitoring stormwater samples were collected on July 28 and September 4, 2011. Analytical results from these samples yielded TAL exceedances for copper (5.5 µg/L and 14.9 µg/L), total PCBs (0.0652 µg/L), and zinc (72.3 µg/L and 140 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures at 2M-SMA-2, corrective-action stormwater samples were collected on June 14 and August 18, 2013. Analytical results from these samples yielded TAL exceedances for copper (18.5 µg/L and 19.9 µg/L), total PCBs (0.0497 µg/L and 0.0148 µg/L), and zinc (102 µg/L and 123 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

130.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 2M-SMA-2 from April 10 through July 29, 2025, resulting in a monitoring season of 110 days. Five inspections performed during the monitoring period are summarized

in Table 130-5. Rain gage RG121.9 recorded 18 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

A non-confirmation monitoring sample generated from snowmelt runoff was collected on April 20, 2025, but not retrieved. The sampler was reset for confirmation monitoring on May 22, 2025, so the sampler was inoperable for confirmation monitoring for 32 days. Four rain events exceeding 0.1 in. in 24 hr during this time and are listed in Table 130-5.

Confirmation-monitoring samples were collected on July 7 and 21, 2025. Analytical results from these samples yielded TAL exceedances for copper (7.64 µg/L and 13 µg/L), total PCBs (0.047 µg/L and 0.00543 µg/L), and zinc (79.4 µg/L and 175 µg/L). The complete analytical results are presented in Appendix B of the Overview and in the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269).

The sampling equipment was deactivated for the monitoring season at the next inspection after confirmation that the July samples met SAP requirements.

Table 130-5 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111337	5-22-2025	No	5-4-2025 5-5-2025 5-6-2025 5-7-2025	0.28/1.27 0.16/0.52 0.12/0.49 0.1/0.19
SMPLR-112029	7-3-2025	No	5-25-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025 6-24-2025 6-26-2025 6-30-2025	0.13/0.14 0.3/0.46 0.16/0.2 0.1/0.32 0.03/0.11 0.06/0.16 0.12/0.22 0.29/0.64 0.14/0.16 0.13/0.15
SMPLR-113027	7-8-2025	Yes	7-7-2025	0.27/0.33
SMPLR-113088	7-23-2025	Yes	7-18-2025 7-21-2025	0.08/0.1 0.13/0.25
SMPLR-113359	7-29-2025	No	7-23-2025	0.26/0.31

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

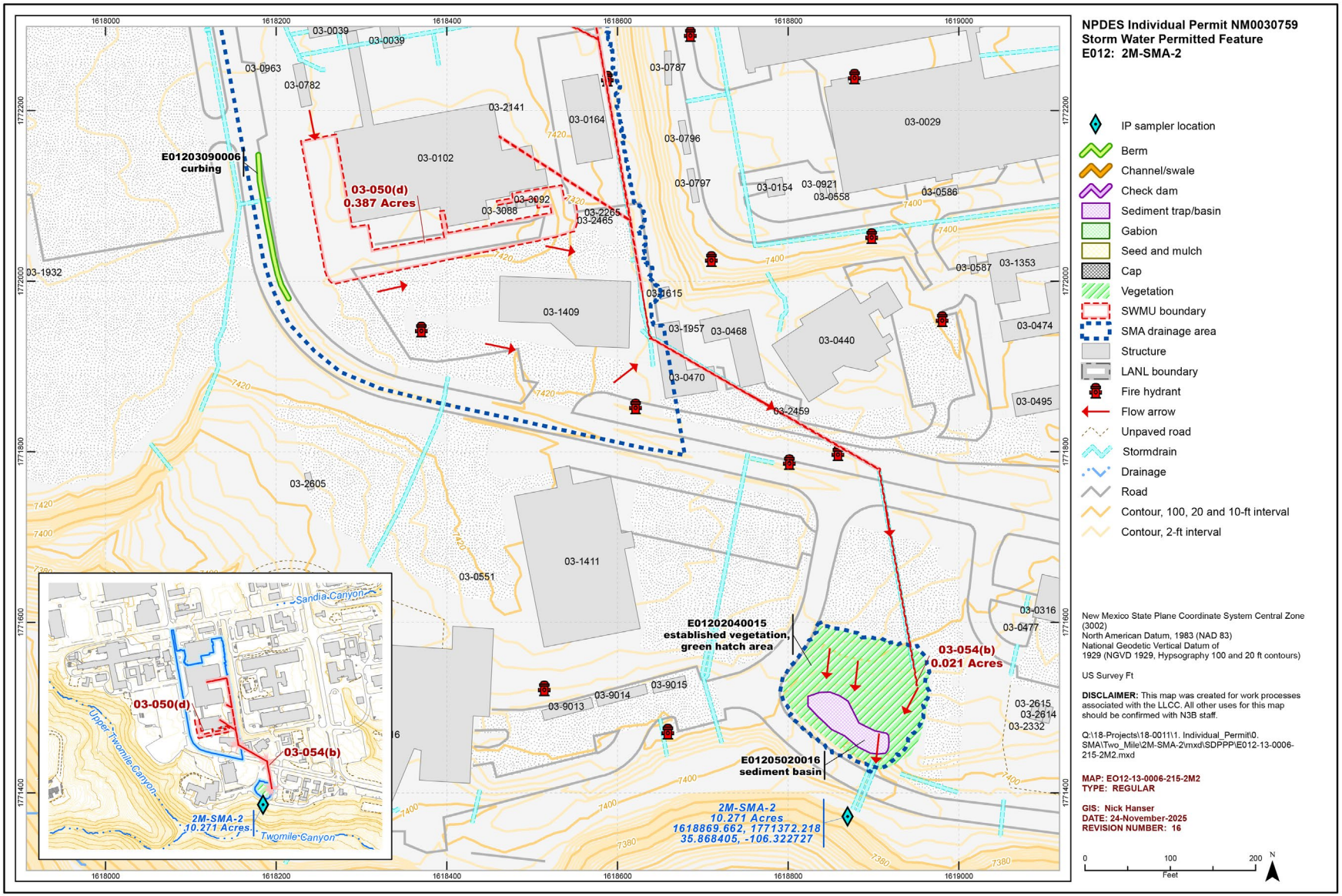

Figure 130-1 2M-SMA-2 location map

131.0 2M-SMA-2.2: AOC 03-003(k)

One historical industrial activity area, Site 03-003(k), is associated with 2M-SMA-2.2 (permitted feature E013). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

131.1 Site Descriptions

03-003(k) (N3B 2025, 703882)

AOC 03-003(k) consists of the location of a former non-PCB transformer (less than 50 ppm PCB), reportedly staged on the east side of building 03-316 at (Weston 1989, 011956; LANL 1993, 020947). The transformer was removed before 1988, and the area where the transformer was situated was graded and paved over when the transportable buildings east of building 03-316 were installed.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 131-1.

Table 131-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
03-003(k)	Transformer pad	PCBs and SVOCs

131.2 Control Measures

All active control measures in use at 2M-SMA-2.2 are listed in Table 131-2. Their locations are shown on the project map (Figure 131-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 131-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E01303090002	Curbing	X	-	-	-	6-1-2009
E01306010007	Rock check dam	-	X	-	X	3-6-2023

131.3 Inspections and Maintenance

Rain gage RG121.9 recorded one storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-2.2 during the 2025 season, requiring one post-storm inspection, summarized in Table 131-3. Maintenance activities conducted at 2M-SMA-2.2 in 2025 are summarized in Table 131-4. No other control measure inspections or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 131-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113967	8-19-2025	0.81	8-28-2025	9	Yes

Table 131-4 Maintenance Activities Conducted during 2024

Maintenance Reference	Maintenance Conducted	Maintenance Date	Response Time	Response Discussion
BMP-113967	Removed and disposed of floatable garbage and debris at inspection.	8-28-2025	0 days	Maintenance was conducted as soon as practicable.

131.4 Stormwater Monitoring

131.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, two baseline monitoring stormwater samples were collected on August 13 and September 4, 2011. Analytical results from these samples yielded TAL exceedances for copper (10.1 µg/L and 16.4 µg/L), total PCBs (0.00707 µg/L and 0.0102 µg/L), and zinc (90.1 µg/L and 97.2 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following certification of no exposure, a corrective-action investigation stormwater sample was collected on July 1, 2016. The analytical results are presented in "NPDES Permit No. NM0030759 – Analytical Results for Site 03-003(k) in Site Monitoring Area 2M-SMA-2.2 after Certification of a No Exposure Condition" (LANL 2016, 601824).

Confirmation-monitoring samples were collected on June 9, June 20, and July 17, 2024. Analytical results from the June 9 sample yielded a TAL exceedance for total PCBs (0.212 µg/L). The second June sample and the July sample yielded no TAL exceedances. The complete analytical results are presented in Appendix B of the Overview and in "2024 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit no. NM0030759" (N3B 2025, 703800); in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814); and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922).

131.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 2M-SMA-2.2 from April 22 through November 4, 2025, resulting in a monitoring season of 196 days. Twenty-one inspections performed during the monitoring period are summarized in Table 131-5. Rain gage RG121.9 recorded 36 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no periods of sampler inoperability were encountered.

Table 131-5 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111523	4-24-2025	No	None	None
SMPLR-111543	5-8-2025	No	5-4-2025 5-5-2025 5-6-2025 5-7-2025	0.28/1.27 0.16/0.52 0.12/0.49 0.1/0.19
SMPLR-111811	5-27-2025	No	5-25-2025	0.13/0.14
SMPLR-112078	6-5-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025	0.3/0.46 0.16/0.2 0.1/0.32 0.03/0.11
SMPLR-112314	6-17-2025	No	6-9-2025 6-12-2025	0.06/0.16 0.12/0.22
SMPLR-112484	6-25-2025	No	6-24-2025	0.29/0.64
SMPLR-112716	6-27-2025	No	6-26-2025	0.14/0.16
SMPLR-112833	7-1-2025	No	6-30-2025	0.13/0.15
SMPLR-112932	7-8-2025	No	7-7-2025	0.27/0.33
SMPLR-113084	7-23-2025	No	7-18-2025 7-21-2025	0.08/0.1 0.13/0.25
SMPLR-113364	7-29-2025	No	7-23-2025	0.26/0.31
SMPLR-113463	8-5-2025	No	7-30-2025 7-31-2025	0.24/0.31 0.11/0.23
SMPLR-113600	8-21-2025	No	8-19-2025	0.81/0.87
SMPLR-113907	8-26-2025	No	8-23-2025 8-24-2025 8-25-2025	0.13/0.77 0.16/0.41 0.13/0.44
SMPLR-114073	9-4-2025	No	8-26-2025 8-31-2025	0.07/0.13 0.48/0.61
SMPLR-114249	9-9-2025	No	9-4-2025 9-5-2025 9-6-2025	0.13/0.14 0.26/0.59 0.09/0.31
SMPLR-114334	9-12-2025	No	None	None
SMPLR-114430	9-30-2025	No	9-13-2025 9-27-2025 9-28-2025	0.07/0.12 0.16/0.39 0.09/0.11
SMPLR-114657	10-15-2025	No	10-8-2025 10-11-2025 10-13-2025	0.08/0.14 0.06/0.16 0.12/0.79

Table 131-5 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-114859	10-20-2025	No	10-15-2025	0.22/0.51
SMPLR-114938	11-4-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

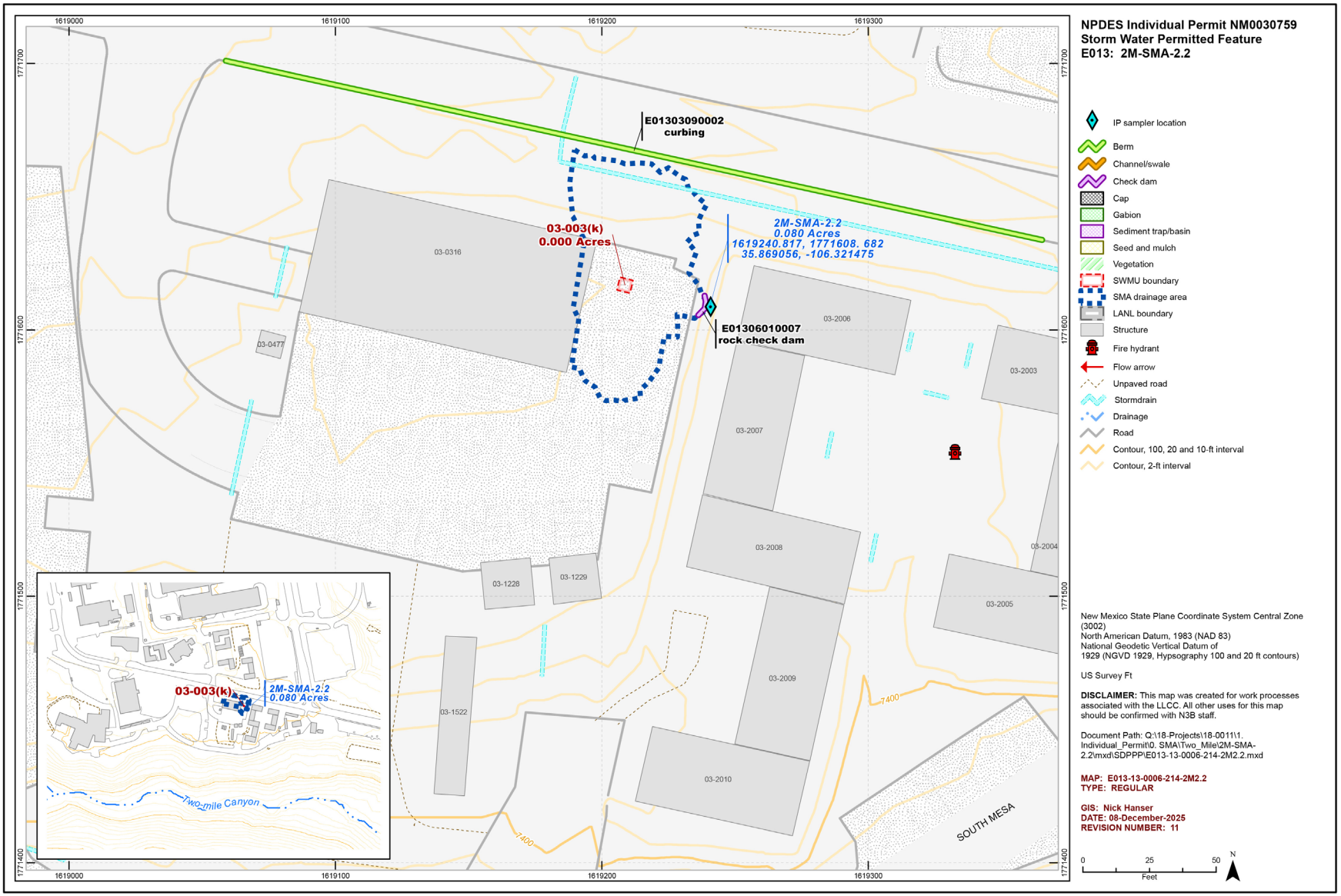

Figure 131-1 2M-SMA-2.2 location map

132.0 2M-SMA-2.5: SWMU 40-001(c)

One historical industrial activity area, Site 40-001(c), is associated with 2M-SMA-2.5 (permitted feature E015). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

132.1 Site Descriptions

40-001(c) (N3B 2025, 703889)

SWMU 40-001(c) consists of an inactive septic system consisting of a septic tank (structure 40-25) located approximately 25 ft east of building 40-11, associated inlet and outlet drainlines, two former outfalls, and a leach field at TA-40. Constructed of reinforced concrete, the septic tank measures 4 ft wide × 7 ft long × 6 ft deep and has a capacity of 540 gal. (LASL 1949, 110465). The septic tank was installed in 1950 and serves building 40-11, which houses changing rooms and restrooms. Operators at TA-40 firing sites changed into Laboratory-provided protective clothing. Originally, the septic tank discharged northeast to an outfall located in Twomile Canyon. In 1951, the 6-in.-diameter VCP outlet drainline was rerouted south to an outfall in Upper Pajarito Canyon (LASL 1951, 110464). In 1988, the septic tank outlet drainline was rerouted to a leach field constructed south of the septic tank (LANL 1988, 110466). In 2012, the septic system was abandoned in place, and the drainlines leading to both outfalls were plugged (LANL 2012, 521455).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 132-1.

Table 132-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-001(c)	Septic system	Metals, inorganic and organic chemicals, and HE

132.2 Control Measures

All active control measures in use at 2M-SMA-2.5 are listed in Table 132-2. Their locations are shown on the project map (Figure 132-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 132-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E01502040006	Established vegetation	-	X	X	-	5-7-2013
E01503010004	Earthen berm	X	-	-	X	8-11-2010
E01503010005	Earthen berm	-	X	-	X	8-11-2010

132.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-2.5 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

132.4 Stormwater Monitoring

132.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline-monitoring stormwater sample was collected on September 9, 2012. Analytical results from this sample yielded no TAL exceedances. The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2012, NPDES Permit No. NM0030759" (LANL 2013, 237680).

132.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 2M-SMA-2.5 from March 26 through November 4, 2025, resulting in a monitoring season of 223 days. Six inspections performed during the monitoring period are summarized in Table 132-3. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no periods of sampler inoperability were encountered.

Table 132-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111152	5-29-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-112133	7-9-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025 6-24-2025 6-26-2025 6-27-2025 6-30-2025 7-7-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15 0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11 0.23/0.29
SMPLR-113137	8-14-2025	No	7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025	0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16

Table 132-3 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113715	8-20-2025	No	8-19-2025	0.47/0.51
SMPLR-113875	9-29-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37 0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13
SMPLR-114640	11-4-2025	No	10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

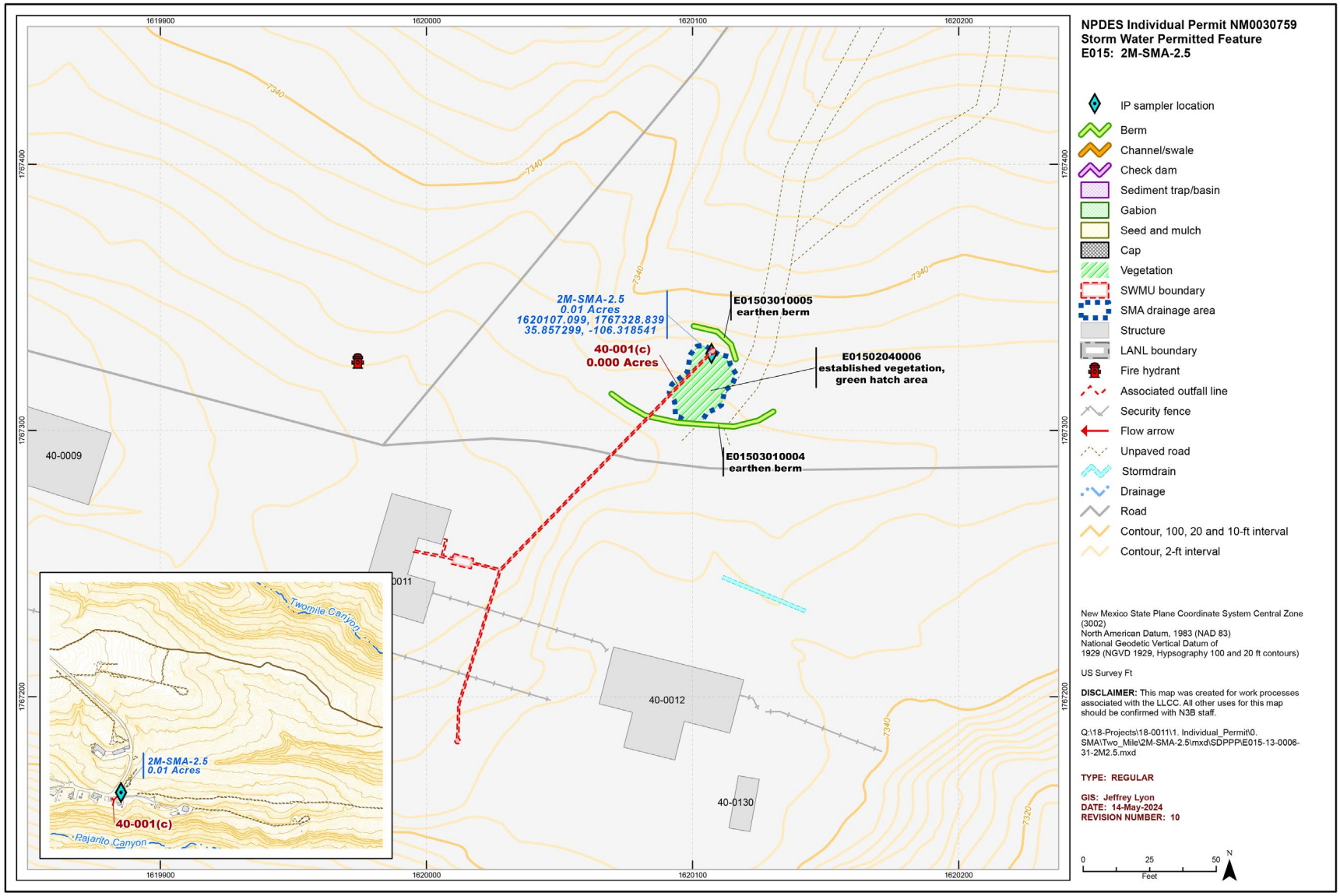

Figure 132-1 2M-SMA-2.5 location map

133.0 2M-SMA-3: SWMUs 07-001(a), 07-001(b), 07-001(c), and 07-001(d)

Four historical industrial activity areas, Sites 07-001(a), 07-001(b), 07-001(c), and 07-001(d), are associated with 2M-SMA-3 (permitted feature E014). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

133.1 Site Descriptions

07-001(a) (N3B 2025, 703882)

SWMU 07-001(a) is an inactive firing pit located near the east end of TA-06. The site consists of a circular depression, surrounded by an annular berm about 4 ft high and approximately 30 ft in diameter. The firing pit was used in the 1950s to destroy scrap detonators and explosives. The materials to be destroyed were mixed with Composition B scraps or flaked TNT, and the mixture was detonated. A 1959 memorandum states that this method was very effective in destroying detonators, with no intact detonators thrown out of a pit and no undestroyed detonators found during a site survey, although pellets of unexploded PBX were found (Spaulding 1959, 004574). The base explosives of the PBX, historically used at the Laboratory, include HMX, RDX, and TATB (LANL 1993, 020948). In 1959 this method of destroying detonators was discontinued at this site.

07-001(b) (N3B 2025, 703882)

SWMU 07-001(b) is an inactive firing pit located near the east end of TA-06. The site consists of a circular depression, surrounded by an annular berm about 4 ft high and approximately 30 ft in diameter. The firing pit was used in the 1950s to destroy scrap detonators and explosives. The materials to be destroyed were mixed with Composition B scraps or flaked TNT and the mixture was detonated. A 1959 memorandum states this method was very effective in destroying detonators, with no intact detonators thrown out of a pit and no undestroyed detonators found during a site survey, although pellets of unexploded PBX were found (Spaulding 1959, 004574). The base explosives of the PBX historically used at the Laboratory include HMX, RDX, and TATB (LANL 1993, 020948). In 1959 this method of destroying detonators was discontinued at this site.

07-001(c) (N3B 2025, 703882)

SWMU 07-001(c) is an inactive amphitheater-shaped firing site, approximately 50 ft × 50 ft, located near the eastern boundary of TA-06. Soft metal disks imbedded with bullets have been found at this site. Little is known about this site's history, but the site may have been used briefly to study ballistic initiation of critical mass through the study of projectiles fired at lead plates (LANL 1997, 056664).

07-001(d) (N3B 2025, 703882)

SWMU 07-001(d) is an inactive firing site located near the eastern boundary of TA-06. The site is an approximately 20-ft-diameter × 3-ft-deep crater. Detonator parts have been found near the crater. Little is known about the operating history of this Site, but it is believed to be the location of a one-time "celebratory shot" fired in 1945, after the Japanese surrender at the end of World War II (LANL 1997 056664).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Sites are listed in Table 133-1.

Table 133-1 POCs Known or Suspected to Have Been Used Historically at the Sites

Site	Potential POC Source	Potential POCs
07-001(a)	Firing site	Metals, HE, and DU
07-001(b)	Firing site	Metals, HE, and DU
07-001(c)	Firing site	Metals, lead, HE, and radionuclides
07-001(d)	Firing site	Metals, HE, and radionuclides

133.2 Control Measures

All active control measures in use at 2M-SMA-3 are listed in Table 133-2. Their locations are shown on the project map (Figure 133-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 133-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
E01402040013	Established vegetation	-	X	X	-	5-7-2013
E01403010028	Earthen berm	-	X	-	X	8-13-2015
E01403010029	Earthen berm	-	X	-	X	8-13-2015
E01403060030	Straw wattle	-	X	-	X	8-13-2015
E01403140022	Coir log	-	X	-	X	8-13-2015
E01403140023	Coir log	-	X	-	X	8-13-2015
E01403140024	Coir log	-	X	-	X	8-13-2015
E01403140031	Coir log	X	-	-	X	9-9-2015
E01403140034	Coir log	X	-	-	X	7-14-2021
E01403140035	Coir log	X	-	-	X	7-14-2021
E01406010025	Rock check dam	-	X	-	X	8-13-2015
E01406010026	Rock check dam	-	X	-	X	8-13-2015
E01406010027	Rock check dam	-	X	-	X	8-13-2015

133.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 2M-SMA-3 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

133.4 Stormwater Monitoring

133.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected at SS2439 on July 12, 2013. Analytical results from this sample yielded TAL exceedances for aluminum (3750 µg/L) and copper (6.05 µg/L). The complete analytical results are presented in

"Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

Enhanced control confirmation-monitoring stormwater samples were collected at SS2439 on July 26 and October 4, 2017. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2017, NPDES Permit No. NM0030759" (LANL 2018, 602910).

An investigation-monitoring stormwater sample was collected at SS193230 on October 4, 2017. This sample is eligible as a confirmation-monitoring sample under the 2022 IP. Analytical results from this sample yielded a TAL exceedance for aluminum (5680 µg/L), and the complete analytical results are presented in the "2022 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2023, 702792).

133.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted for SWMUs 07-001(a), 07-001(b), and 07-001(d) at SS2439 at 2M-SMA-3 from March 31 through September 22, 2025, resulting in a monitoring season of 175 days. Eight inspections performed during the monitoring period are summarized in Table 133-3. Rain gage RG-TA-06 recorded 30 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

Confirmation-monitoring samples were collected on June 24 and July 21, 2025. Analytical results from these samples yielded no TAL exceedances. A third sample partial-volume sample was collected on August 19, 2025. Analytical results from this sample yielded no TAL exceedances. The complete analytical results are presented in Appendix B of the Overview and in the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269).

The sampling equipment was deactivated for the monitoring season at SS2439 in September after confirmation that the samples met the SAP requirements.

Stormwater monitoring was conducted for SWMU 07-001(c) at SS193230 at 2M-SMA-3 from March 31 through November 10, 2025, resulting in a monitoring season of 224 days. Nine inspections performed during the monitoring period are summarized in Table 133-4. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025 at SS193230, and no sampling operability issues were encountered.

Table 133-3 Sampler Inspections at SS2439 during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111189	5-14-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-111924	6-9-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24

Table 133-3 Sampler Inspections at SS2439 during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-112376	7-1-2025	Yes	6-9-2025 6-12-2025 6-24-2025 6-26-2025 6-27-2025 6-30-2025	0.06/0.17 0.11/0.15 0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11
SMPLR-112955	7-14-2025	No	7-7-2025	0.07/0.1
SMPLR-113188	7-30-2025	Yes	7-17-2025 7-18-2025 7-21-2025 7-23-2025	0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25
SMPLR-113598	8-29-2025	Yes	7-30-2025 7-31-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.18/0.26 0.19/0.16 0.47/0.51 0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17
SMPLR-114182	9-12-2025	No	8-31-2025 9-5-2025 9-6-2025	0.21/0.36 0.27/0.59 0.17/0.37
SMPLR-114431	9-22-2025	No	9-12-2025 9-13-2025	0.05/0.1 0.04/0.13

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

Table 133-4 Sampler Inspections at SS193230 during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111180	5-14-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-111923	6-9-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24

Table 133-4 Sampler Inspections at SS193230 during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-112374	7-1-2025	No	6-9-2025 6-12-2025 6-24-2025 6-26-2025 6-27-2025 6-30-2025	0.06/0.17 0.11/0.15 0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11
SMPLR-112949	7-14-2025	No	7-7-2025	0.07/0.1
SMPLR-113185	7-30-2025	No	7-17-2025 7-18-2025 7-21-2025 7-23-2025	0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25
SMPLR-113488	8-29-2025	No	7-30-2025 7-31-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.18/0.26 0.19/0.16 0.47/0.51 0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17
SMPLR-114187	9-12-2025	No	8-31-2025 9-5-2025 9-6-2025	0.21/0.36 0.27/0.59 0.17/0.37
SMPLR-114435	10-22-2025	No	9-12-2025 9-13-2025 9-27-2025 9-28-2025 10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13 0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44
SMPLR-114966	11-10-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

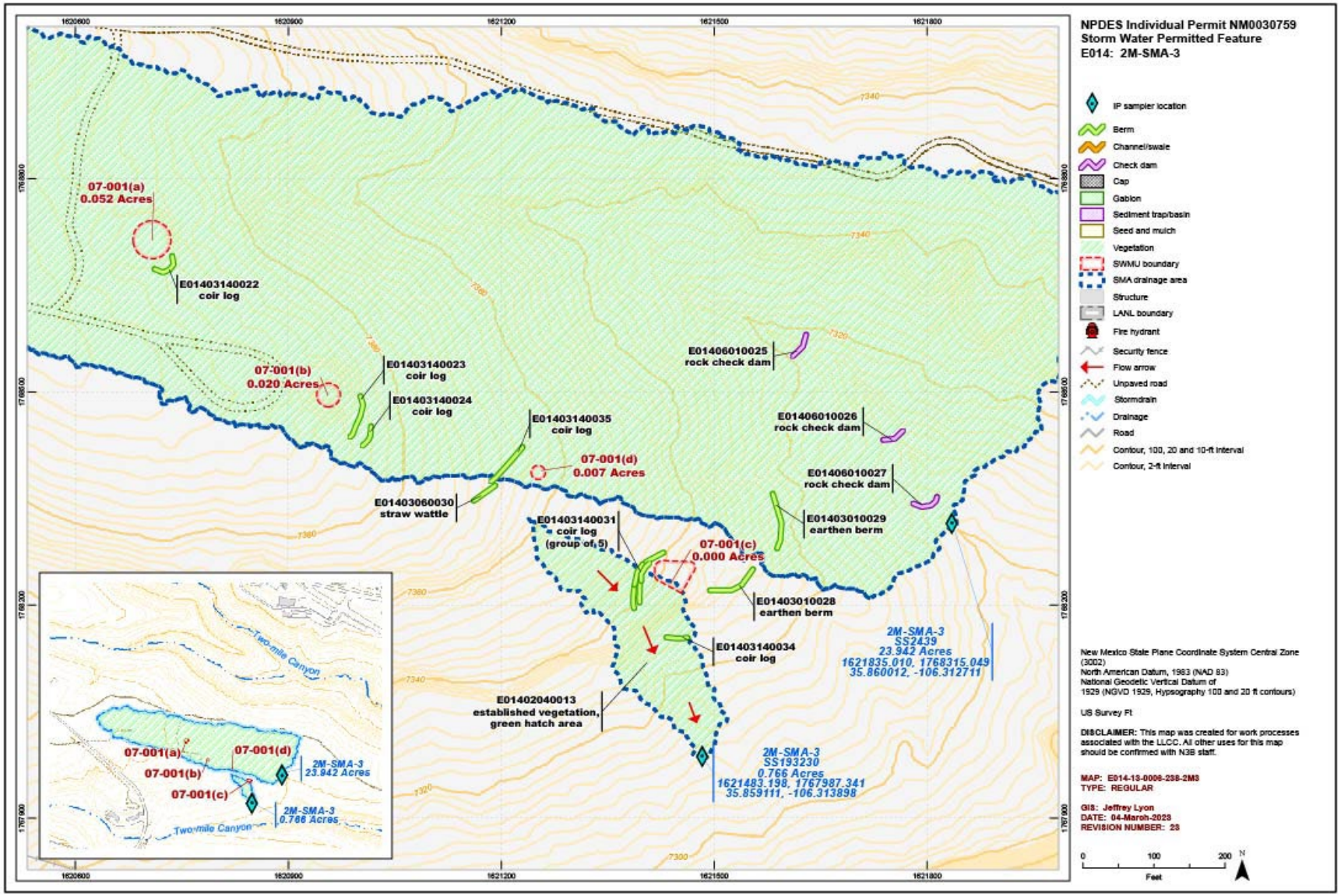

Figure 133-1 2M-SMA-3 location map

134.0 3M-SMA-0.2: SWMU 15-010(b)

One historical industrial activity area, Site 15-010(b), is associated with 3M-SMA-0.2 (permitted feature H001). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

134.1 Site Descriptions

15-010(b) (N3B 2024, 703279)

SWMU 15-010(b) is a settling tank (structure 15-147) located in the northwest corner of TA-15 near former shop building 15-8. The tank, constructed in 1947 of concrete, measures 5 ft wide × 5 ft long × 5.5 ft deep with an approximate capacity of 900 gal. The tank was originally designed to be a septic tank. However, subsequent review of engineering records confirmed that the tank was used as an HE settling tank. The settling tank served former building 15-8, which housed HE-machining operations during the 1950s and discharged to an outfall at the edge of Threemile Canyon (LANL 1993, 020946). The tank is no longer in operation; however, the date it ceased to be used is not known.

The approved 2008 Threemile Canyon Aggregate Area IWP for the 2009–2010 investigation (LANL 2008, 105673; NMED 2008, 104256) proposed removing the tank. However, facility restrictions on the handling of HE prevented removal of the tank, which was found to contain liquid, until the contents were characterized. The liquid contents were sampled for waste characterization purposes, found to be nonhazardous and nonradioactive, and were removed.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 134-1.

Table 134-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
15-010(b)	Settling tank	Metals and HE

134.2 Control Measures

All active control measures in use at 3M-SMA-0.2 are listed in Table 134-2. Their locations are shown on the project map (Figure 134-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 134-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
H00102040006	Established vegetation	-	X	X	-	5-7-2013
H00103010005	Earthen berm	X	-	-	X	9-15-2011
H00103010010	Earthen berm	-	X	-	X	5-12-2021
H00106010002	Rock check dam	-	X	-	X	8-11-2009
H00106010007	Rock check dam	-	X	-	X	12-4-2015
H00106010008	Rock check dam	-	X	-	X	12-4-2015
H00106010009	Rock check dam	-	X	-	X	12-4-2015

134.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at 3M-SMA-0.2 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

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134.4 Stormwater Monitoring

34.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a stormwater sample was collected on July 15, 2018. Analytical results from the sample collected yielded TAL exceedances for copper (6.72 µg/L), gross-alpha activity (127 pCi/L), and mercury (2.02 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2018, NPDES Permit No. NM0030759" (N3B 2019, 700320).

134.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 3M-SMA-0.2 from April 3 through November 6, 2025, resulting in a monitoring season of 217 days. Seven inspections performed during the monitoring period are summarized in Table 134-3. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 134-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111275	4-29-2025	No	None	None
SMPLR-111589	5-13-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-111894	6-24-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112599	8-7-2025	No	6-24-2025 6-26-2025 6-27-2025 6-30-2025 7-7-2025 7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025	0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11 0.23/0.29 0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16
SMPLR-113648	8-29-2025	No	8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.47/0.51 0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17
SMPLR-114188	10-10-2025	No	8-31-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025 10-8-2025 10-9-2025	0.21/0.36 0.27/0.59 0.17/0.37 0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13 0.08/0.14 0.05/0.1
SMPLR-114821	11-6-2025	No	10-11-2025 10-13-2025 10-15-2025	0.05/0.15 0.1/0.78 0.16/0.44

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

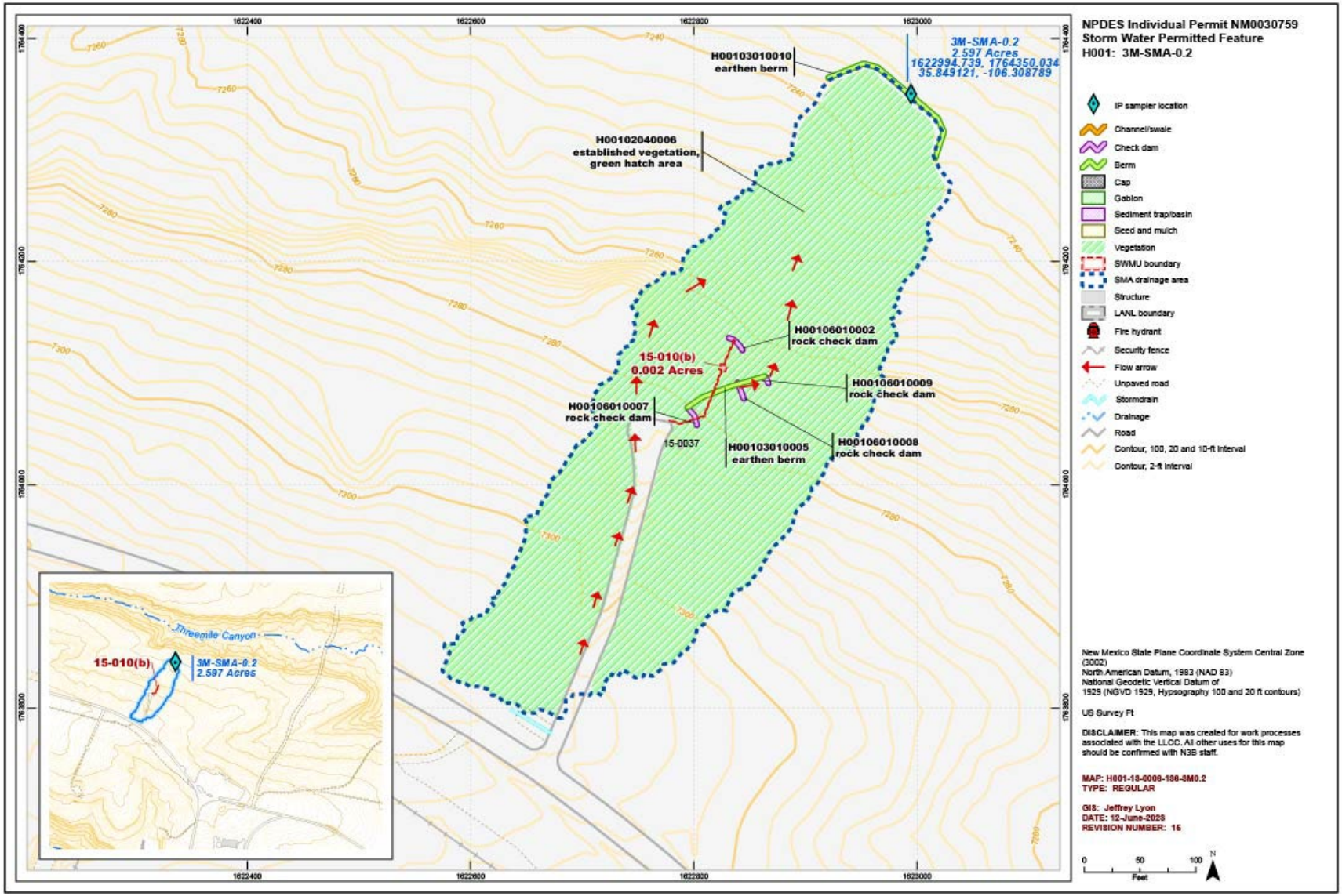

Figure 134-1 3M-SMA-0.2 location map

135.0 3M-SMA-0.4: SWMU 15-006(b)

One historical industrial activity area, Site 15-006(b), is associated with 3M-SMA-0.4 (permitted feature H002). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

135.1 Site Descriptions

15-006(b) (12/15/2022)

SWMU 15-006(b) is the Ector firing site. Located along the eastern side of TA-15, the firing site was used for dynamic radiography of explosion-driven weapons components. It was originally established in 1973 and was used periodically until 1982. The Ector radiography machine was constructed at this Site, and the Site has operated with this machine from the mid-1980s to the present. Structures associated with the firing site are the firing point chamber (structure 15-276), the multidiagnostic hydrotest (building 15-306), and the blast-protection structure (15-319). Materials used in the tests included uranium, beryllium, lead, and HE.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 135-1.

Table 135-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
15-006(b)	Active firing site	Beryllium, lead, HE, and uranium

135.2 Control Measures

All active control measures in use at 3M-SMA-0.4 are listed in Table 135-2. Their locations are shown on the project map (Figure 135-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 135-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
H00202040005	Established vegetation	-	X	X	-	5-13-2013
H00203010003	Earthen berm	-	X	-	X	8-5-2010
H00203010004	Earthen berm	-	X	-	X	9-15-2011
H00203100014	Gravel bags	-	X	-	X	3-30-2016
H00203120008	Rock berm	X	-	-	X	10-6-2014
H00203120009	Rock berm	X	-	-	X	10-6-2014
H00203120010	Rock berm	X	-	-	X	10-6-2014
H00203120011	Rock berm	X	-	-	X	10-6-2014
H00203120015	Rock berm	-	X	-	X	3-30-2016

Table 135-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
H00203120016	Rock berm	-	X	-	X	3-30-2016
H00203140017	Coir log	-	X	-	X	9-19-2018
H00205020007	Sediment basin	-	X	-	X	10-6-2014
H00208020006	Rock cap	-	-	X	-	11-19-2013

135.3 Inspections and Maintenance

3M-SMA-0.4 was in long-term stewardship in 2025, subject to inspection requirements outlined in the Permit Part I.B.8.c. Rain gage RG262.4 recorded one 3-yr, 24-hr storm event in 2025, requiring one post-storm inspection, summarized in Table 135-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 135-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	3-yr, 24-hr Storm Total (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112689	6-24-2025	1.39	7-14-2025	20	No*

* Inspection within 15 days is not a requirement in Permit Part I.B.8.c.

135.4 Stormwater Monitoring

135.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on July 12, 2013. Analytical results from this sample yielded a TAL exceedance for gross-alpha activity (120 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

In the initial SIP (N3B 2023, 702792; EPA 2023, 704169) for the 2022 Permit, 3M-SMA-0.4 screened into Long-Term Stewardship status per Permit Part 1.C.3, effective July 5, 2023.

135.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was not conducted at 3M-SMA-0.4 in 2025. The SMA was in Long-Term Stewardship status, as discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922).

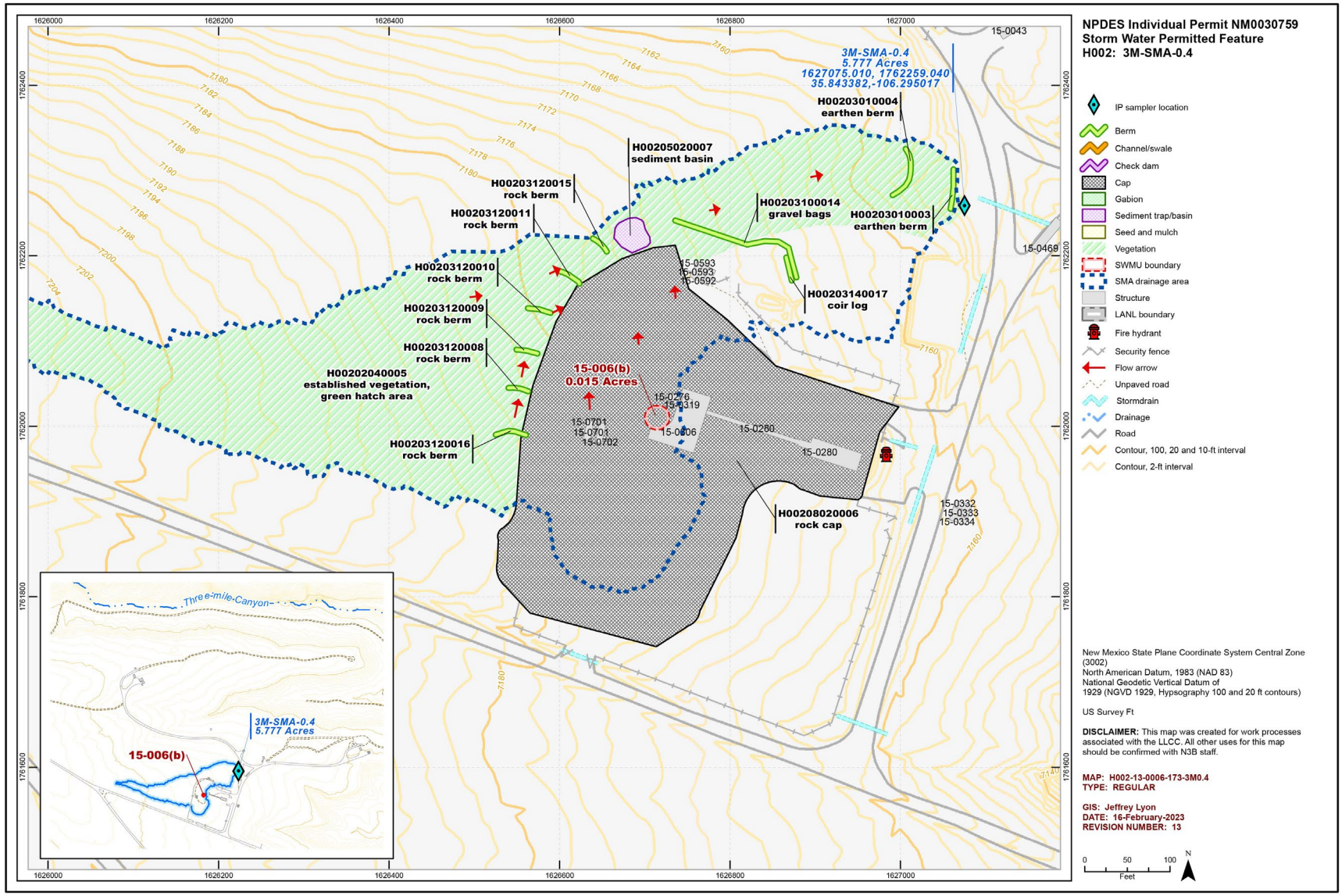

Figure 135-1 3M-SMA-0.4 location map

136.0 3M-SMA-0.5: SWMUs 15-006(c) and 15-009(c)

Two historical industrial activity areas, Sites 15-006(c) and 15-009(c), are associated with 3M-SMA-0.5 (permitted feature H003). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

136.1 Site Descriptions

15-006(c) (12/15/2022)

SWMU 15-006(c) is inactive firing site R-44 that was the third-most used firing site at TA-15. This firing site, located along the eastern side of TA-15, was originally constructed in 1951 and was used extensively from 1956 to 1978 for diagnostic tests of weapons components. After the PHERMEX and Ector firing sites became operational, firing site R-44 was used only for small experiments. Firing site R-44 was last used in 1992. Materials used in the tests included uranium, tritium, beryllium, lead, and HE. This firing site is located on a flat open area on a narrow mesa that overlooks Threemile Canyon. Debris from explosives tests is scattered over the site, onto the slope, and into the canyon.

15-009(c) (N3B 2018, 700033)

SWMU 15-009(c) is a septic system that was located at Firing Site R-44 at TA-15. The septic system consists of a former septic tank (former structure 15-62), associated drainlines, and a former outfall. The septic tank was constructed in 1951 of reinforced concrete with a 540-gal. capacity. The septic system served restroom facilities in firing site control building 15-44. The drainlines were constructed of CI and discharged to an outfall to the south fork of Threemile Canyon. The outfall, located approximately 25 ft downgradient of the tank, has been plugged (LANL 2003, 102119).

The septic tank (structure 15-62) was removed during the 2009-2010 Phase I Consent Order investigation but the drainlines remain in place.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Sites are listed in Table 136-1.

Table 136-1 POCs Known or Suspected to Have Been Used Historically at the Sites

Site	Potential POC Source	Potential POCs
15-006(c)	Firing Site R-44	Beryllium, lead, HE, tritium, and uranium
15-009(c)	Septic system	Metals, organic chemicals, and radionuclides

136.2 Control Measures

All active control measures in use at 3M-SMA-0.5 are listed in Table 136-2. Their locations are shown on the project map (Figure 136-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 136-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
H00302040017	Established vegetation	-	X	X	-	5-8-2013
H00303010030	Earthen berm	-	X	-	X	9-23-2015
H00304060001	Riprap	-	X	X	-	2-13-2006
H00304060004	Riprap	-	X	X	-	6-1-2009
H00304060018	Riprap	-	X	X	-	9-23-2015
H00306010002	Rock check dam	-	X	-	X	2-13-2006
H00306010005	Rock check dam	X	-	-	X	2-13-2006
H00306010006	Rock check dam	X	-	-	X	2-13-2006
H00306010012	Rock check dam	X	-	-	X	6-29-2010
H00306010016	Rock check dam	X	-	-	X	10-7-2010
H00306010019	Rock check dam	-	X	-	X	9-23-2015
H00306010020	Rock check dam	-	X	-	X	9-23-2015
H00306010021	Rock check dam	-	X	-	X	9-23-2015
H00306010022	Rock check dam	-	X	-	X	9-23-2015
H00306010023	Rock check dam	-	X	-	X	9-23-2015
H00306010024	Rock check dam	-	X	-	X	9-23-2015
H00306010025	Rock check dam	-	X	-	X	9-23-2015
H00306010026	Rock check dam	-	X	-	X	9-23-2015
H00306010027	Rock check dam	-	X	-	X	9-23-2015
H00306010028	Rock check dam	-	X	-	X	9-23-2015
H00306010029	Rock check dam	-	X	-	X	9-23-2015

136.3 Inspections and Maintenance

Rain gage RG262.4 recorded two storm rain events (0.50 in. or more occurring within 30 min) at 3M-SMA-0.5 during the 2025 season, requiring two post-storm inspections, summarized in Table 136-3. All other control measure inspections conducted at 3M-SMA-0.5 in 2025 are summarized in Table 136-4. No maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

In the fall of 2025 Triad performed D&D activities of structures within the drainage area of 3M-SMA-0.5. Starting on October 2, 2025, repeated attempts were made to perform weekly inspections during the activities, but facility access restrictions would not allow routine inspections. SWPP team members were in contact with Triad project manager in the interim. Site access was gained in December 2025. Weekly inspections by the SWPP team are planned to continue in 2026 until activities are complete and the disturbed area is stabilized.

Table 136-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112618	6-24-2025	0.9	6-26-2025	2	Yes
BMP-114039	8-25-2025	0.56	9-4-2025	10	Yes

Table 136-4 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Remediation Construction Activity	COMP-114583	12-2-2025	No controls have been impacted. Multiple existing IP controls and temporary construction controls installed by Triad are serving as backup controls to minimize migration of sediment and runoff from the soil disturbance area.
Remediation Construction Activity	COMP-115249	12-9-2025	
Remediation Construction Activity	COMP-115271	12-17-2025	

136.4 Stormwater Monitoring

136.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline-monitoring stormwater sample was collected on July 9, 2014. Analytical results from this sample yielded TAL exceedances for copper (4.35 µg/L) and gross-alpha activity (29.5 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2014, NPDES Permit No. NM0030759" (LANL 2015, 600241).

Following the installation of enhanced control measures, a corrective-action confirmation-monitoring sample was collected on July 27, 2022. Analytical results from this sample yielded TAL exceedances for copper (5.85 µg/L) and gross-alpha activity (304 pCi/L), and the complete analytical results are presented in the "2022 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit No. NM0030759" (N3B 2023, 702681), and in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282), which have been updated with the inclusion of this sample into the SSD.

136.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 3M-SMA-0.5 from April 11 through September 29, 2025, resulting in a monitoring season of 171 days. Nine inspections performed during the monitoring period are summarized in Table 136-5. Rain gage RG262.4 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered. The sampler was deactivated on September 29, 2025, after notification was received that soil disturbance related to Triad D&D would be occurring. Monitoring will resume after completion of soil disturbance and site stabilization activities are complete.

Table 136-5 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111367	5-7-2025	No	5-4-2025 5-5-2025 5-6-2025	0.23/0.96 0.21/0.55 0.28/0.84
SMPLR-111780	6-4-2025	No	5-7-2025 5-9-2025 6-2-2025 6-3-2025	0.04/0.12 0.14/0.16 0.28/0.35 0.1/0.34
SMPLR-112263	6-26-2025	No	6-4-2025 6-24-2025	0.08/0.27 0.9/1.39
SMPLR-112806	7-28-2025	No	7-7-2025 7-18-2025 7-21-2025 7-22-2025 7-23-2025	0.1/0.15 0.06/0.14 0.19/0.29 0.18/0.21 0.38/0.44
SMPLR-113444	8-1-2025	No	7-30-2025	0.32/0.38
SMPLR-113545	8-21-2025	No	8-19-2025	0.24/0.26
SMPLR-113923	8-25-2025	No	8-23-2025 8-24-2025	0.12/0.65 0.24/0.55
SMPLR-114024	9-4-2025	No	8-25-2025 8-26-2025	0.56/1.11 0.16/0.27
SMPLR-114547	9-29-2025	No	9-4-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.17/0.17 0.18/0.58 0.12/0.23 0.09/0.31 0.04/0.11 0.11/0.3 0.08/0.11

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

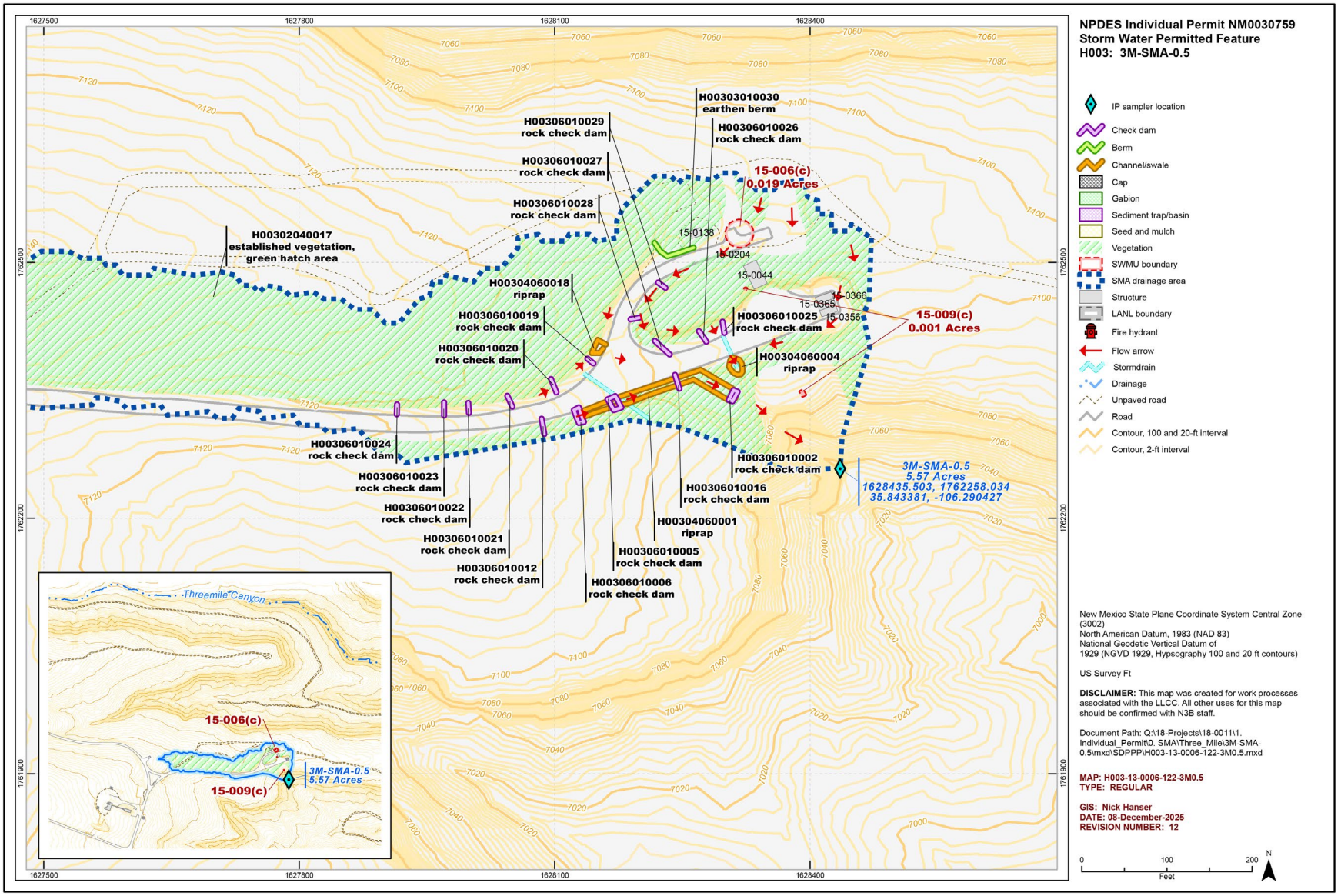

Figure 136-1 3M-SMA-0.5 location map

137.0 3M-SMA-0.6: SWMU 15-008(b)

One historical industrial activity area, Site 15-008(b), is associated with 3M-SMA-0.6 (permitted feature H004). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

137.1 Site Descriptions

15-008(b) (N3B 2024, 703279)

SWMU 15-008(b) is a surface disposal area located at TA-15, north of inactive Firing Site R-44 [SWMU 15-006(c)], and extending along the edge of the mesa and downslope into Threemile Canyon. The surface disposal area covers approximately 8.5 acres. Soil and debris generated from activities at the R-44 firing site were disposed of at SWMU 15-008(b). Activities at the firing site began in 1951. The firing site was used extensively until 1978 and sporadically until 1992 when firing site activities ceased (LANL 1993, 020946; LANL 1995, 050294).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 137-1.

Table 137-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
15-008(b)	Surface disposal area	Beryllium, copper, lead, HE, and uranium

137.2 Control Measures

All active control measures in use at 3M-SMA-0.6 are listed in Table 137-2. Their locations are shown on the project map (Figure 137-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 137-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
H00401050036	Gravel mulch	X	X	X	-	2-24-2020
H00402040029	Established vegetation	-	X	X	-	5-8-2013
H00403010030	Earthen berm	-	X	-	X	10-25-2017
H00403060008	Straw wattle	X	-	-	X	9-23-2009
H00403060031	Straw wattle	X	-	-	X	2-24-2020
H00403060037	Straw wattle	-	X	-	X	9-12-2024
H00403060038	Straw wattle	-	X	-	X	9-12-2024
H00403060039	Straw wattle	-	X	-	X	9-12-2024
H00403060040	Straw wattle	-	X	-	X	9-12-2024

137.3 Inspections and Maintenance

Rain gage RG245.5 recorded two storm rain events (0.50 in. or more occurring within 30 min) at 3M-SMA-0.6 during the 2025 season, requiring two post-storm inspections, summarized in Table 137-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 137-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112893	6-30-2025	0.59	7-2-2025	2	Yes
BMP-113378	7-23-2025	0.55	8-1-2025	9	Yes

137.4 Stormwater Monitoring

137.4.1 Previous Stormwater Monitoring Results

Through Calendar Year 2024, stormwater flow was not sufficient for sample collection at 3M-SMA-0.6.

137.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 3M-SMA-0.6 from April 11 through November 12, 2025, resulting in a monitoring season of 215 days. Eight inspections performed during the monitoring period are summarized in Table 137-4. Rain gage RG245.5 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 137-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111368	5-7-2025	No	5-4-2025 5-5-2025 5-6-2025	0.3/1.21 0.25/0.73 0.19/0.55
SMPLR-111782	6-4-2025	No	5-9-2025 6-2-2025 6-3-2025	0.21/0.21 0.36/0.44 0.09/0.31
SMPLR-112265	6-26-2025	No	6-4-2025 6-24-2025	0.07/0.25 0.42/0.79
SMPLR-112809	7-2-2025	No	6-30-2025	0.59/0.6
SMPLR-113004	7-28-2025	No	7-18-2025 7-23-2025	0.1/0.15 0.55/0.59
SMPLR-113445	9-4-2025	No	7-30-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.2/0.35 0.15/0.17 0.12/0.7 0.19/0.39 0.41/0.82 0.13/0.23

Table 137-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-114256	10-17-2025	No	9-4-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025 10-11-2025 10-13-2025 10-15-2025	0.24/0.24 0.13/0.43 0.03/0.11 0.06/0.26 0.03/0.1 0.07/0.25 0.15/0.26 0.05/0.11 0.12/0.72 0.09/0.15
SMPLR-114923	11-12-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

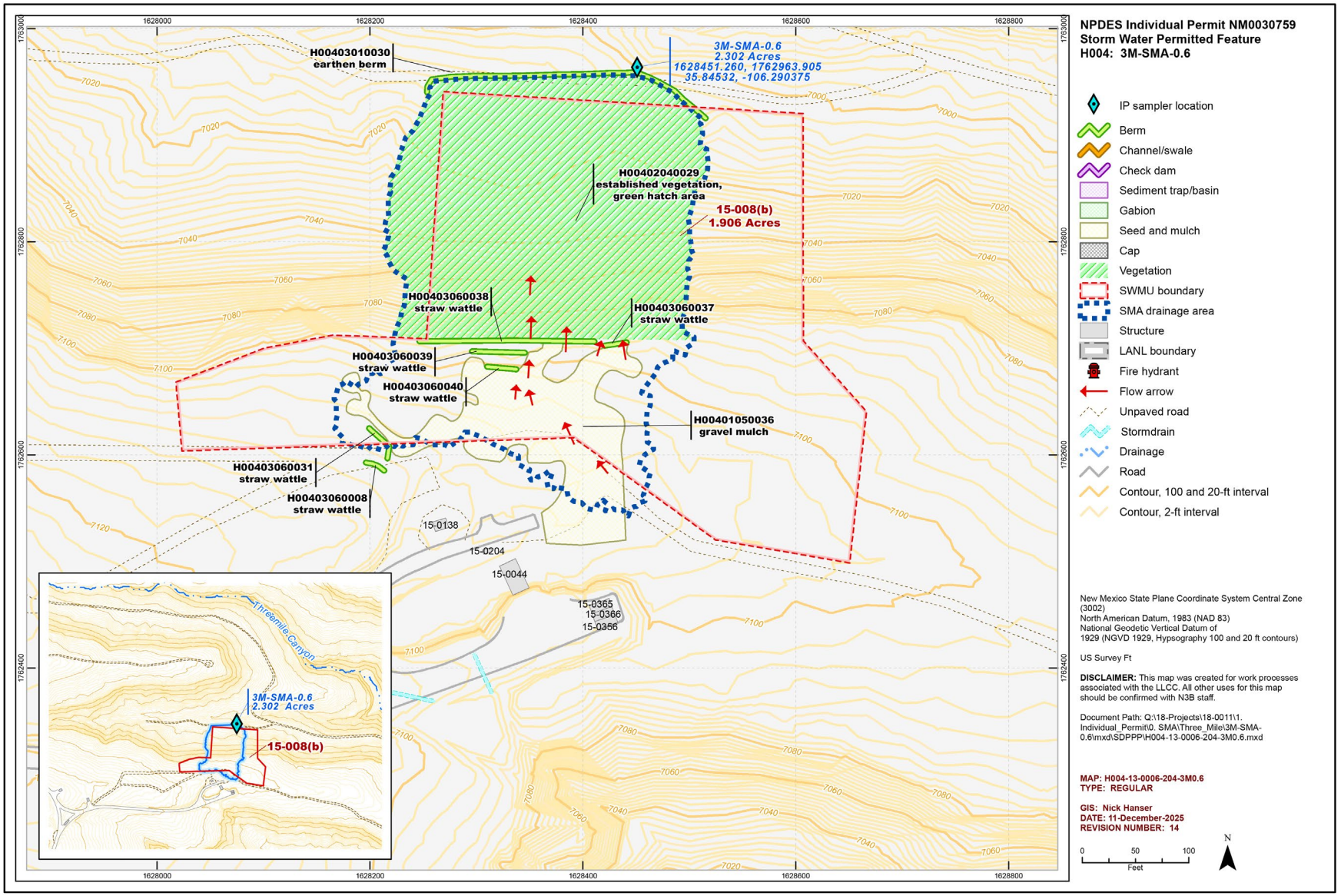

Figure 137-1 3M-SMA-0.6 location map

138.0 3M-SMA-2.6: SWMUs 36-008 and C-36-003

Two historical industrial activity areas, Sites 36-008 and C-36-003, are associated with 3M-SMA-2.6 (permitted feature H005). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

138.1 Site Descriptions

36-008 (N3B 2018, 700033)

SWMU 36-008 is a surface disposal area located at TA-36 north of building 36-1, an office and laboratory. The disposal area is on the south rim of Threemile Canyon and extends down the steeply sloping edge of the mesa. The approximately 1-acre disposal area was discovered in June 2000 after the Cerro Grande fire burned through the area. The dates the site was used for disposal are not known. The materials strewn over the Site appeared to be associated with building activities, and it is possible the disposal area may have been used as early as 1949, when building 36-1 was constructed. Surface debris included laboratory glassware, metal cans, metal pipe, and miscellaneous metal fragments. As part of Cerro Grande fire response efforts, visible debris was removed from the surface disposal area. Approximately 5 yd^3 of debris was collected from the site, segregated, and staged for disposal; in addition, stormwater BMPs were installed to prevent erosion (LANL 2000, 068656).

The former SWMU C-36-003 outfall that received effluent from floor, sink, and equipment drains throughout building 36-1 is located within the southern boundary of SWMU 36-008.

C-36-003 (N3B 2018, 700033)

SWMU C-36-003 is a former NPDES-permitted outfall (EPA 06A106) located at TA-36 on the south rim of Threemile Canyon, north of office and laboratory building 36-1. The outfall became operational in the 1950s and served the sink and floor drains on the first floor of the building and the floor, sink, and equipment drains in the photo-processing laboratories on the second floor of the building. In 1993, the floor and sink drains discharging to the outfall were rerouted to the TA-46 SWSC plant. The outfall was removed from the NPDES permit in 2001 (EPA 2001, 082282).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Sites are listed in Table 138-1.

Table 138-1 POCs Known or Suspected to Have Been Used Historically at the Sites

Site	Potential POC Source	Potential POCs
36-008	Surface disposal area	Metals
C-36-003	Outfall from building 36-1	Chromium, silver, and inorganic and organic chemicals

138.2 Control Measures

All active control measures in use at 3M-SMA-2.6 are listed in Table 138-2. Their locations are shown on the project map (Figure 138-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 138-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
H00502040007	Established vegetation	-	X	X	-	5-2-2013
H00503120005	Rock berm	X	-	-	X	5-5-2010
H00504040003	Culvert	X	-	-	-	7-7-2010
H00506010006	Rock check dam	-	X	-	X	2-23-2011

138.3 Inspections and Maintenance

Rain gage RG245.5 recorded two storm rain events (0.50 in. or more occurring within 30 min) at 3M-SMA-2.6 during the 2025 season, requiring two post-storm inspections, summarized in Table 138-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 138-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112894	6-30-2025	0.59	7-10-2025	10	Yes
BMP-113379	7-23-2025	0.55	7-28-2025	5	Yes

138.4 Stormwater Monitoring

138.4.1 Previous Stormwater Monitoring Results

Through Calendar Year 2024, stormwater flow was not sufficient for sample collection at 3M-SMA-2.6.

138.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 3M-SMA-2.6 from April 4 through November 10, 2025, resulting in a monitoring season of 220 days. Nine inspections performed during the monitoring period are summarized in Table 138-4. Rain gage RG245.5 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 138-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111274	5-8-2025	No	5-4-2025 5-5-2025 5-6-2025	0.3/1.21 0.25/0.73 0.19/0.55
SMPLR-111825	5-21-2025	No	5-9-2025	0.21/0.21
SMPLR-111991	6-5-2025	No	6-2-2025 6-3-2025 6-4-2025	0.36/0.44 0.09/0.31 0.07/0.25

Table 138-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-112329	6-26-2025	No	6-24-2025	0.42/0.79
SMPLR-112815	7-2-2025	No	6-30-2025	0.59/0.06
SMPLR-113005	7-28-2025	No	7-18-2025 7-23-2025	0.1/0.15 0.55/0.59
SMPLR-113448	8-27-2025	No	7-30-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.2/0.35 0.15/0.17 0.12/0.7 0.19/0.39 0.41/0.82 0.13/0.23
SMPLR-114135	9-30-2025	No	9-4-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.24/0.24 0.13/0.43 0.03/0.11 0.06/0.26 0.03/0.1 0.07/0.25 0.15/0.26
SMPLR-114665	11-10-2025	No	10-11-2025 10-13-2025 10-15-2025	0.05/0.11 0.12/0.72 0.09/0.15

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

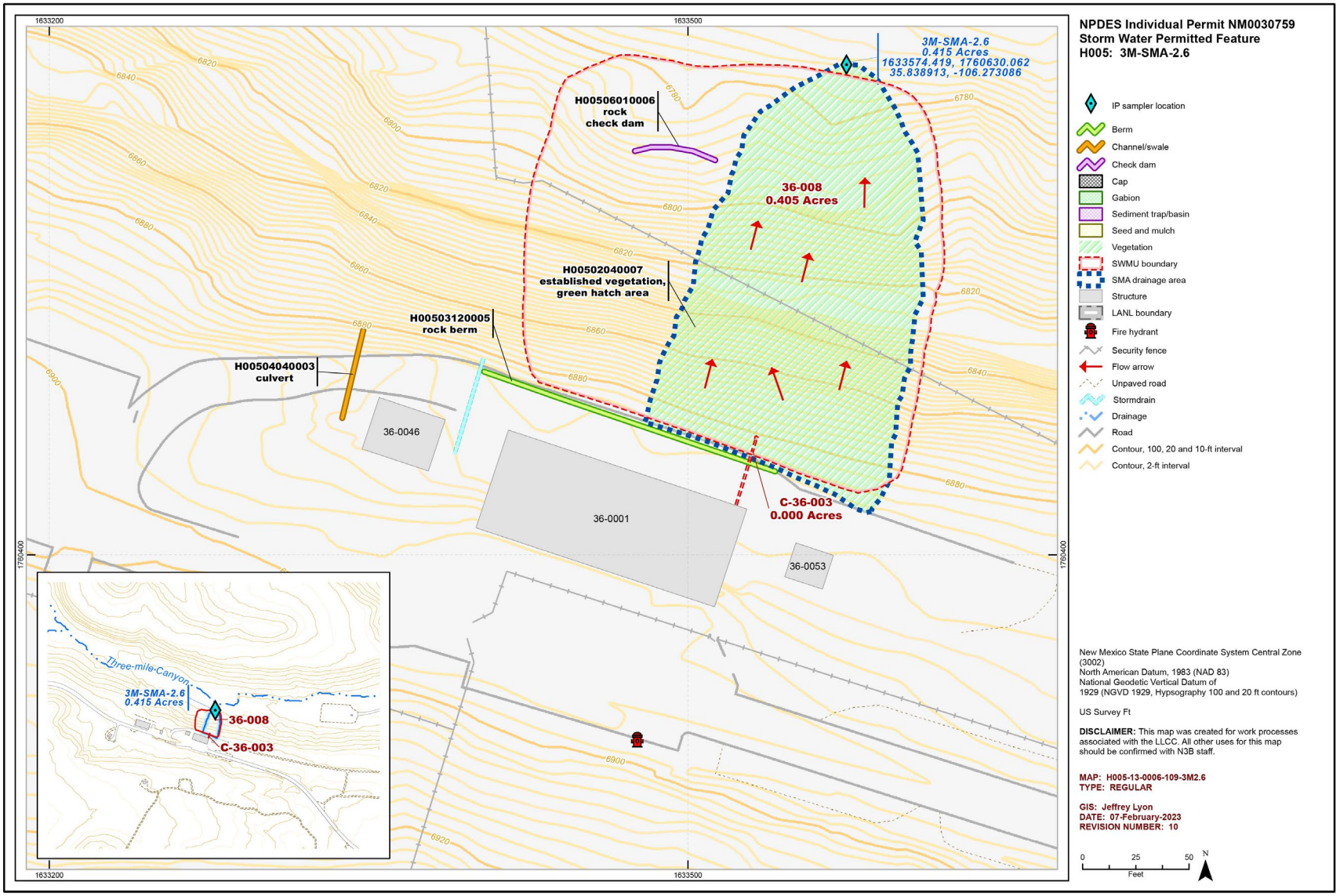

Figure 138-1 3M-SMA-2.6 location map

139.0 3M-SMA-4: SWMUs 18-002(b) and 18-003(c) and AOC 18-010(f)

Three historical industrial activity areas, Sites 18-002(b), 18-003(c), and 18-010(f), are associated with 3M-SMA-4 (permitted feature H006). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

139.1 Site Descriptions

18-002(b) (9/6/2023)

SWMU 18-002(b) is an inactive firing site in Threemile Canyon (AOC C-00-012) near the location of former building 18-32 (Kiva 2) at TA-18. The firing site was used from 1944 to 1945 for shots consisting of no more than a few pounds of HE. The Site consisted of a 2-ft-long × 2-ft-wide × 2-ft-deep firing chamber (former structure 18-4) constructed of 1-in.-thick steel and an aboveground armored bunker (structure 18-5), commonly called a "battleship," used to protect shot instrumentation. The top of the firing chamber was open and set flush with the ground west of structure 18-5. A ground-level wooden structure (former structure 18-6), located east of structure 18-5, was the battery building for the firing site cable conduit system. It contained racks of lead-acid batteries. Structure 18-4 was removed in 1945, and structure 18-6 was dismantled in 1951. Structure 18-5 was used as a calibration laboratory in the 1950s and 1960s. Structure 18-5 was subsequently decommissioned and is no longer used; however, the structure is considered a contributing historical building as part of the planned Manhattan Project National Historical Park.

Three additional inactive firing points, located west of structure 18-5, are also associated with SWMU 18-002(b). Firing Point C was 51 ft west of structure 18-5 and on its midline. Former building 18-32, Kiva 2 (also known as CASA 2), was a critical assembly building constructed over the location of Firing Point C in 1951. From 1955 to 1972, non-Rover Program critical assembly work was carried out in Kiva 2. Reactor mockups of various sizes and shapes were constructed using materials including deuterium oxide, uranium carbide, enriched uranium, graphite, niobium, and zirconium hydride. Beryllium oxide was also used in some mockups, and cadmium might also have been used. Unclad uranium [DU, enriched, etc.] and neutron flux were present throughout former building 18-32, and a critical assembly was melted within the structure. Building 18-32 was decommissioned in 2008 and underwent D&D in 2011 and 2012.

Firing Point G was 145 ft west of structure 18-5 and on its midline. Former building 18-122 was a metal building constructed directly northwest of former Firing Point G in 1960. The building functioned as a warehouse for former building 18-32 (CASA 2); the building had fixed uranium contamination (DU and/or natural) throughout and was a posted radiological control area. Hydraulic oil, solvent and rags were accumulated in a SAA formerly located in this building. Building 18-122 was decommissioned in 2008 and underwent D&D in 2011 and 2012.

The third firing point, Medium Firing Point, was built to handle HE charges of up to 2 tons, while Firing Points C and G were used in firing operations involving smaller charges. Medium Firing Point was located west of Firing Points C and G, 478 ft west of structure 18-5 and 15 ft south of its midline. A flat, graded area west of former building 18-32 marks the former location of this firing point. The firing points were all removed in the late 1940s, before the construction of former building 18-32 in 1951.

18-003(c) (12/29/2017)

SWMU 18-003(c) is an inactive septic system consisting of a reinforced concrete septic tank (structure 18-42), inlet and outlet drainlines, a drain field, and an outfall at TA-18. The septic tank is located approximately 15 ft east of former building 18-128 and approximately 90 ft northeast of former building 18-32. The tank measures 6 ft in diameter × 5 ft deep and has a capacity of 650 gal. The inlet line leading to the tank is approximately 130 ft in length, and the total length of the outlet line is approximately 115 ft. The drain field begins approximately 60 ft east of the septic tank and extends east 55 ft. The drain field consists of four drainlines spaced approximately 10 ft apart. Each line is approximately 75 ft long. An outfall, located at the distal end of the drain field, discharged into the Threemile Canyon stream channel (AOC C-00-012). The SWMU 18-003(c) septic system received sanitary waste from three restrooms and a janitorial sink in former building 18-32 from 1952 to 1995.

18-010(f) (1/5/2018)

AOC 18-010(f) is a former outfall that received discharges from the roof and floor drains in former building 18-32 at TA-18. The roof and floor drains discharged into a storm drain that exited the northeast corner of former building 18-32, beneath the pavement. The storm drainline discharged to an outfall, approximately 100 ft north of former building 18-32, on a sandy, grassy bank on the south side of the stream channel in Threemile Canyon (AOC C-00-012). Former building 18-32 was built in 1951 and used for nuclear critical assembly work. The date this outfall became operational is unknown, but it is likely that the outfall was operational from the time building 18-32 was constructed in 1951 until it underwent D&D in 2011 and 2012.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Sites are listed in Table 139-1.

Table 139-1 POCs Known or Suspected to Have Been Used Historically at the Sites

Site	Potential POC Source	Potential POCs
18-002(b)	Firing Site	Barium, beryllium, cadmium, lead, HE, uranium (depleted and enriched), inorganic and organic chemicals
18-003(c)	Outfall	Organic chemicals, radionuclides, uranium, and beryllium
18-010(f)	Outfall	Lead and uranium

139.2 Control Measures

All active control measures in use at 3M-SMA-4 are listed in Table 139-2. Their locations are shown on the project map (Figure 139-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 139-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
H00602040010	Established vegetation	-	X	X	-	5-2-2013
H00604020009	Concrete/asphalt channel/swale	X	-	X	-	5-25-2010
H00604060005	Riprap	X	-	X	-	5-25-2010

Table 139-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
H00604060013	Riprap	-	X	X	-	9-30-2015
H00604060015	Riprap	-	X	X	-	9-30-2015
H00606010011	Rock check dam	-	X	-	X	9-30-2015
H00607010002	Gabion	X	-	-	X	1-1-2000
H00607010012	Gabion	-	X	-	X	9-30-2015
H00607010014	Gabion	-	X	-	X	9-30-2015

139.3 Inspections and Maintenance

Rain gage RG245.5 recorded two storm rain events (0.50 in. or more occurring within 30 min) at 3M-SMA-4 during the 2025 season, requiring two post-storm inspections, summarized in Table 139-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 139-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112895	6-30-2025	0.59	7-10-2025	10	Yes
BMP-113380	7-23-2025	0.55	7-28-2025	5	Yes

139.4 Stormwater Monitoring

139.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on July 29, 2014. Analytical results from this sample yielded TAL exceedances for copper (4.72 µg/L) and gross-alpha activity (259 pCi/L). The complete analytical results are presented in the "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2014, NPDES Permit No. NM0030759" (LANL 2015, 600241).

Following certification of enhanced control installation, a confirmation-monitoring stormwater sample was collected on July 26, 2017. Analytical results from this sample yielded a TAL exceedance for copper (8.11 µg/L) and the complete analytical results are presented in the "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2017, NPDES Permit No. NM0030759" (LANL 2018, 602910).

139.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at 3M-SMA-4 from April 4 through November 10, 2025, resulting in a monitoring season of 220 days. Fourteen inspections performed during the monitoring period are summarized in Table 139-4. Rain gage RG245.5 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 139-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111269	4-11-2025	No	None	None
SMPLR-111350	5-8-2025	No	5-4-2025 5-5-2025 5-6-2025	0.3/1.21 0.25/0.73 0.19/0.55
SMPLR-111817	5-14-2025	No	5-9-2025	0.21/0.21
SMPLR-111919	6-5-2025	No	6-2-2025 6-3-2025 6-4-2025	0.36/0.44 0.09/0.31 0.07/0.25
SMPLR-112324	6-26-2025	No	6-24-2025	0.42/0.79
SMPLR-112798	7-2-2025	No	6-30-2025	0.59/0.06
SMPLR-112998	7-28-2025	No	7-18-2025 7-23-2025	0.1/0.15 0.55/0.59
SMPLR-113440	8-4-2025	No	7-30-2025	0.2/0.35
SMPLR-113580	8-21-2025	No	8-19-2025	0.15/0.17
SMPLR-113918	8-27-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.12/0.7 0.19/0.39 0.41/0.82 0.13/0.23
SMPLR-114131	9-9-2025	No	9-4-2025 9-5-2025 9-6-2025	0.24/0.24 0.13/0.43 0.03/0.11
SMPLR-114344	9-30-2025	No	9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.06/0.26 0.03/0.1 0.07/0.25 0.15/0.26
SMPLR-114661	10-17-2025	No	10-11-2025 10-13-2025 10-15-2025	0.05/0.11 0.12/0.72 0.09/0.15
SMPLR-114919	11-10-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

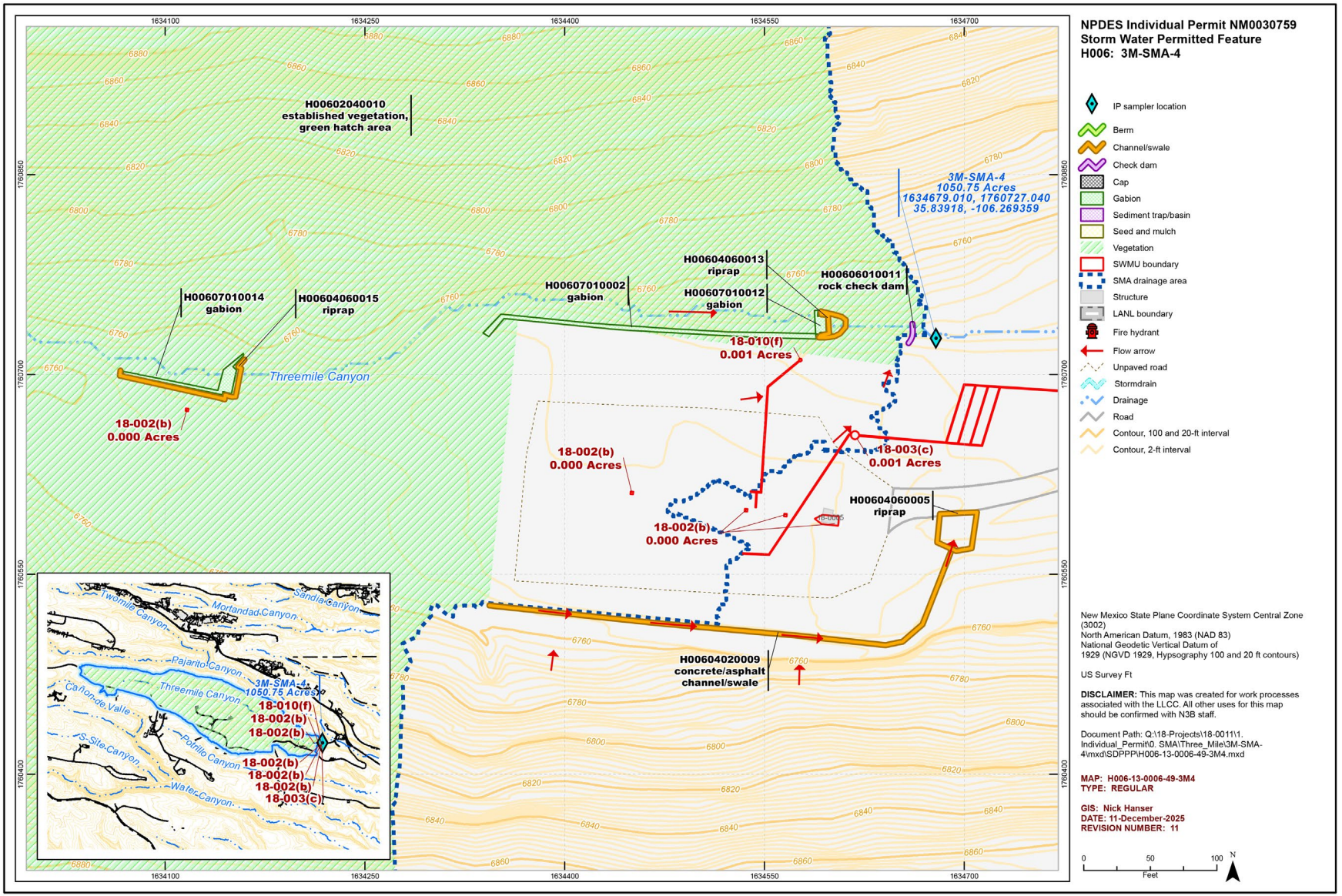

Figure 139-1 3M-SMA-4 location map

140.0 PJ-SMA-1.05: SWMU 09-013

One historical industrial activity area, Site 09-013, is associated with PJ-SMA-1.05 (permitted feature J001). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

140.1 Site Descriptions

09-013 (N3B 2025, 703890)

SWMU 09-013 is MDA M, which consists of two former surface disposal areas at TA-09; the main area and a smaller satellite area. The main area occupied approximately 3.2 acres and is located approximately 2800 ft southwest of building 22-120. The 15 ft wide × 260 ft long satellite area is located approximately 750 ft northwest of the main disposal area. MDA M was created during the demolition of the Old Anchor Ranch East and West sites. Structures were flash burned to remove any HE residue and deposited over the MDA surface. Debris from the construction of current TA-08 and TA-09 facilities in 1949−1965 and other sites in 1960−1965 was also deposited at MDA M. Materials present at the MDA included metal debris, wood debris, laboratory appliances and fixtures, and metal and glass containers. The main disposal area was surrounded by an earthen berm that eroded through by surface-water runoff (LANL 1993, 020949, pp. 2–19, 5–73). MDA M has been inactive since 1965. All debris and contaminated soil were removed from MDA M during an EC conducted in 1995−1996 (LANL 1996, 062053).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 140-1.

Table 140-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
09-013	MDA M	Metals, asbestos, PCBs, SVOCs, HE, and uranium

140.2 Control Measures

All active control measures in use at PJ-SMA-1.05 are listed in Table 140-2. Their locations are shown on the project map (Figure 140-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Earthen berm J00103010022 was certified to have the capacity to retain a volume of stormwater runoff from the SMA that is equivalent to a 3-yr, 24-hr storm event on May 29, 2025, and submitted to EPA on June 3, 2025, as part of corrective action, as described in "NPDES Permit No. NM0030759 - Certification of 3-Year, 24-Hour Retention for PJ-SMA-1.05, S-SMA-3.51, and STRM-SMA-5.05" (N3B 2025, 703837). Photographs of the retention controls are available at https://ext.em-la.doe.gov/IPS/Home/ConstructionCertifications.

Table 140-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00102040019	Established vegetation	-	X	X	-	4-23-2013
J00103010018	Earthen berm	-	X	-	X	8-27-2012
J00103010020	Earthen berm	-	X	-	X	8-10-2015
J00103010021	Earthen berm	-	X	-	X	8-10-2015
J00103010022	Earthen berm	-	X	-	X	8-10-2015
J00104050008	Waterbar	-	X	X	-	11-4-2009
J00104050012	Waterbar	X	-	X	-	4-4-2011
J00104050013	Waterbar	X	-	X	-	4-4-2011
J00104050014	Waterbar	X	-	X	-	4-4-2011

140.3 Inspections and Maintenance

Rain gage RG240 recorded four storm rain events (0.50 in. or more occurring within 30 min) at PJ-SMA-1.05 during the 2025 season, requiring four post-storm inspections, summarized in Table 140-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 140-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112155	5-31-2025	0.91	6-12-2025	12	Yes
BMP-113328	7-22-2025	0.97	8-6-2025	15	Yes
BMP-114284	9-5-2025	0.53	9-17-2025	12	Yes
BMP-114879	10-15-2025	0.72	10-28-2025	13	Yes

140.4 Stormwater Monitoring

140.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on September 13, 2013. Analytical results from this sample yielded a TAL exceedance for total PCBs (0.00872 µg/L). The complete analytical results are presented in the "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

140.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-1.05 from April 16 through May 29, 2025, resulting in a monitoring season of 43 days. One inspection performed during the monitoring period is summarized in Table 140-4. Rain gage RG240 recorded seven rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Certification of retention of volume of stormwater from a 3-yr 24-hr storm at RG240 was submitted to EPA in June 2025 (N3B 2025, 703837) and was also discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922). Stormwater monitoring is not required at S-SMA-3.51 per Permit Part I.D.1.c.

Table 140-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111458	5-29-2025	No	5-2-2025 5-4-2025 5-5-2025 5-6-2025 5-7-2025 5-25-2025 5-26-2025	0.04/0.1 0.16/1.2 0.1/0.36 0.17/0.95 0.1/0.25 0.13/0.17 0.16/0.24

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

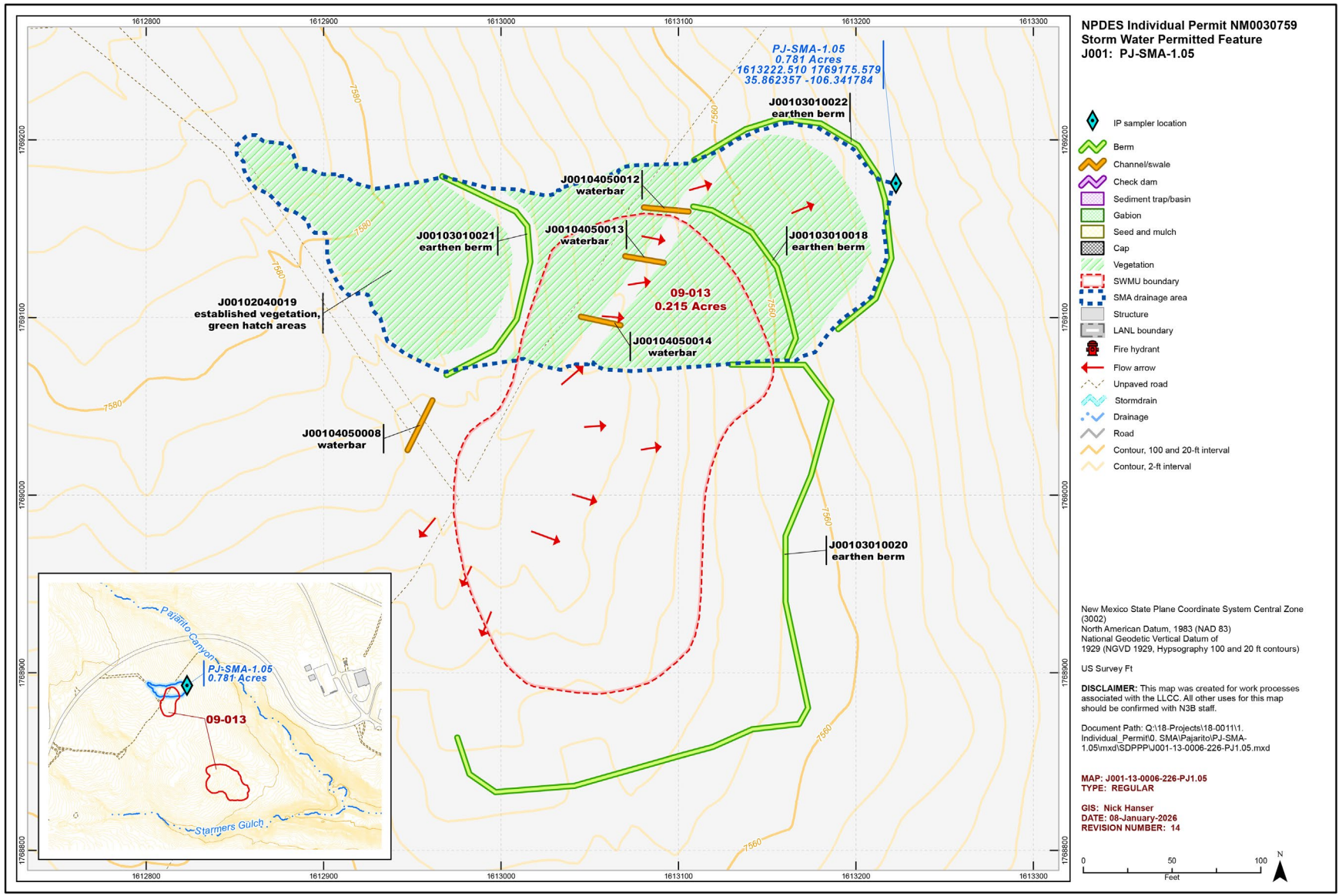

Figure 140-1 PJ-SMA-1.05 location map

141.0 PJ-SMA-2: SWMU 09-009

One historical industrial activity area, Site 09-009, is associated with PJ-SMA-2 (permitted feature J002). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

141.1 Site Descriptions

09-009 (N3B 2025, 703890)

SWMU 09-009 consists of a decommissioned surface impoundment (structure 09-218), a siphon box, two decommissioned sand filters, inlet and outlet drainlines, and a former NPDES-permitted outfall (EPA 55502S) at TA-09. The surface impoundment is located approximately 120 ft northeast of building 09-40, and the associated sand filters are approximately 120 ft northeast of the surface impoundment, and the former outfall is located approximately 300 ft to the northwest of the impoundment. The surface impoundment measures 32 ft wide × 60 ft long × 7 ft deep; the sides are constructed of concrete and the bottom of bentonite. The two sand filters, which measure 33 ft wide × 60 ft long × approximately 4 ft deep, have a flexible membrane liner (butyl rubber) and are surrounded by a concrete curb.

The surface impoundment was constructed in 1961 to treat sanitary waste from buildings 09-20, 09-21, 09-28, 09-29, 09-32, 09-33, 09-34, 09-35, 09-37, and 09-38 (LANL 1993, 020949, pp.5–45) and discharged to a formerly permitted outfall approximately 215 ft to the northwest (EPA 55502S). The outfall was included on the Laboratory's NPDES in 1974. In 1986, the sewer lines from TA-08 were connected to the surface impoundment via the SWMU 09-004(l) outlet drainline that had previously discharged to NPDES-permitted outfall 05A-066 [SWMU 09-004(h)]. Discharges from TA-08 included effluent from building 08-24, where a strontium-90 spill occurred in 1954. The surface impoundment and sand filter system were decommissioned in 1992, when the SWSC at TA-46 came online. Outfalls 55502S and 05A-066 were removed from the Laboratory's NPDES permit in the late 1990s. All active buildings formerly connected to the impoundment continue to discharge sanitary wastewater to the SWSC. The impoundment received sanitary wastewater only (LANL 1993, 020949).

During the 2022–2025 Starmer/Upper Pajarito Canyon Aggregate Area investigation conducted at SWMU 09-009, the field team located, surveyed, and collected samples beneath the outlet drainlines from the impoundment and sand filters and downgradient of the two former NPDES-permitted outfall locations [EPA 55502S at SWMU 09-009 and EPA 05A066 at SWMU 09-004(h)]. Geodetic surveys and field observations conducted during sampling activities indicated that the locations of the outlet drainlines and the outfalls depicted in the approved IWP (LANL 2011, 111794; NMED 2011, 201465) were incorrect. The field team located, surveyed, and collected samples (1) beneath the outlet drainline associated with SWMU 09-004(h) and the SWMU 09-009 outlet drainline that connects the SWMU 09-009 surface impoundment to the SWMU 09-004(h) outfall (EPA 05A066) and (2) downgradient of former outfall EPA 05A066. The field team determined former NPDES-permitted outfall EPA 05A066 is located approximately 45 ft further to the southwest than depicted in the IWP, and the outlet drainline from manhole 09-121 to former NPDES-permitted outfall EPA 05A066 was approximately 45 ft shorter than depicted in the IWP. Additionally, the outlet drainline from manhole 09-121 to former NPDES-permitted outfall EPA 05A066 was approximately 2.5 ft southeast of the location depicted in the IWP. The outlet drainline from surface impoundment 09-218 to former

NPDES-permitted outfall EPA 05A066 was found to exit the surface impoundment at the same location depicted in the IWP; however, the outlet drainline to the outfall is further southwest than depicted in the IWP (LANL 2011, 111794). Additionally, the field team determined that former NPDES-permitted outfall EPA 55502S is actually located approximately 4 ft further to the north than previously depicted in site figures, and the outlet drainline to the outfall exits the sand filters approximately 17 ft further west and continues approximately 60 ft further to the northeast to the outfall. The location of all other components of the inactive impoundment system was as depicted in the approved IWP's site figures (LANL 2011, 111794; NMED 2011, 201465).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 141-1.

Table 141-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
09-009	Surface impoundment	Metals, organic chemicals, and strontinum-90

141.2 Control Measures

All active control measures in use at PJ-SMA-2 are listed in Table 141-2. Their locations are shown on the project map (Figure 141-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 141-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00202040022	Established vegetation	-	X	X	-	5-8-2013
J00203010006	Earthen berm	X	-	-	X	11-5-2009
J00203010007	Earthen berm	X	-	-	X	11-5-2009
J00203010008	Earthen berm	X	-	-	X	11-5-2009
J00203010009	Earthen berm	X	-	-	X	11-5-2009
J00203010015	Earthen berm	X	-	-	X	8-1-2012
J00204050026	Waterbar	X	-	X	-	10-6-2015
J00206010014	Rock check dam	-	X	-	X	11-5-2009
J00206010019	Rock check dam	X	-	-	X	10-10-2012
J00206010020	Rock check dam	X	-	-	X	10-10-2012
J00206010021	Rock check dam	X	-	-	X	10-10-2012
J00206010024	Rock check dam	X	-	-	X	7-14-2015
J00206010025	Rock check dam	X	-	-	X	7-14-2015
J00206010027	Rock check dam	X	-	-	X	10-6-2015
J00206010028	Rock check dam	X	-	-	X	10-6-2015
J00208030029	Concrete/asphalt cap	-	X	-	-	10-6-2015

141.3 Inspections and Maintenance

Rain gage RG253 recorded five storm rain events (0.50 in. or more occurring within 30 min) at PJ-SMA-2 during the 2025 season, requiring five post-storm inspections, summarized in Table 141-3Maintenance activities conducted at PJ-SMA-2 during 2025 are summarized in Table 141-4 No other control measure inspections or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 141-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112166	5-31-2025	0.76	6-12-2025	12	Yes
BMP-112683	6-24-2025	0.73	7-1-2025	7	Yes
BMP-113067	7-7-2025	0.56	7-9-2025	2	Yes
BMP-113556	7-31-2025	0.52	8-6-2025	6	Yes
BMP-114890	10-15-2025	0.93	10-28-2025	13	Yes

Table 141-4 Maintenance Activities Conducted during 2025

Maintenance Reference	Maintenance Conducted	Maintenance Date	Response Time	Response Discussion
BMP-113556	Maintenance conducted on earthen berm J0020300006 at inspection to redefine the right end of control.	8-6-2025	0 days	Maintenance was conducted as soon as practicable.

141.4 Stormwater Monitoring

141.4.1 Previous Stormwater Monitoring Results

A baseline confirmation-monitoring sample was collected on July 31, 2022. Analytical results from this sample yielded TAL exceedances for aluminum (4840 µg/L), copper (23.1 µg/L), and zinc (95.6 µg/L). The complete results are presented in the "2022 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit No. NM0030759" (N3B 2023, 702681), and the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282), which have been updated with the inclusion of this sample into the SSD.

141.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-2 from April 10 through October 28, 2025, resulting in a monitoring season of 201 days. Ten inspections performed during the monitoring period are summarized in Table 141-5. Rain gage RG253 recorded 39 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no periods of sampler inoperability were encountered.

Table 141-5 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111075	5-1-2025	No	None	None
SMPLR-111626	6-5-2025	No	5-2-2025 5-4-2025 5-5-2025 5-6-2025 5-7-2025 5-8-2025 5-26-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025	0.04/0.1 0.19/1.17 0.09/0.35 0.15/0.76 0.05/0.15 0.08/0.11 0.19/0.2 0.76/0.79 0.18/0.26 0.14/0.4 0.05/0.14
SMPLR-112341	6-25-2025	No	6-9-2025 6-24-2025	0.06/0.13 0.73/1.16
SMPLR-112750	7-9-2025	No	6-27-2025 6-30-2025 7-7-2025	0.36/0.45 0.13/0.15 0.56/0.7
SMPLR-113146	7-24-2025	No	7-17-2025 7-18-2025 7-21-2025 7-22-2025 7-23-2025	0.07/0.14 0.11/0.13 0.46/0.94 0.34/0.44 0.09/0.1
SMPLR-113406	8-6-2025	No	7-31-2025	0.52/0.67
SMPLR-113633	8-28-2025	No	8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.15/0.15 0.13/0.73 0.41/1.07 0.09/0.52 0.09/0.19
SMPLR-114175	10-10-2025	No	8-31-2025 9-5-2025 9-6-2025 9-10-2025 9-13-2025 9-27-2025 10-8-2025 10-9-2025	0.32/0.37 0.29/0.56 0.24/0.49 0.09/0.14 0.15/0.27 0.19/0.43 0.08/0.14 0.15/0.19
SMPLR-114825	10-16-2025	No	10-11-2025 10-13-2025 10-15-2025	0.07/0.17 0.14/0.8 0.93/1.08

Table 141-5 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-114913	10-28-2025	No	10-24-2025	0.09/0.13

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

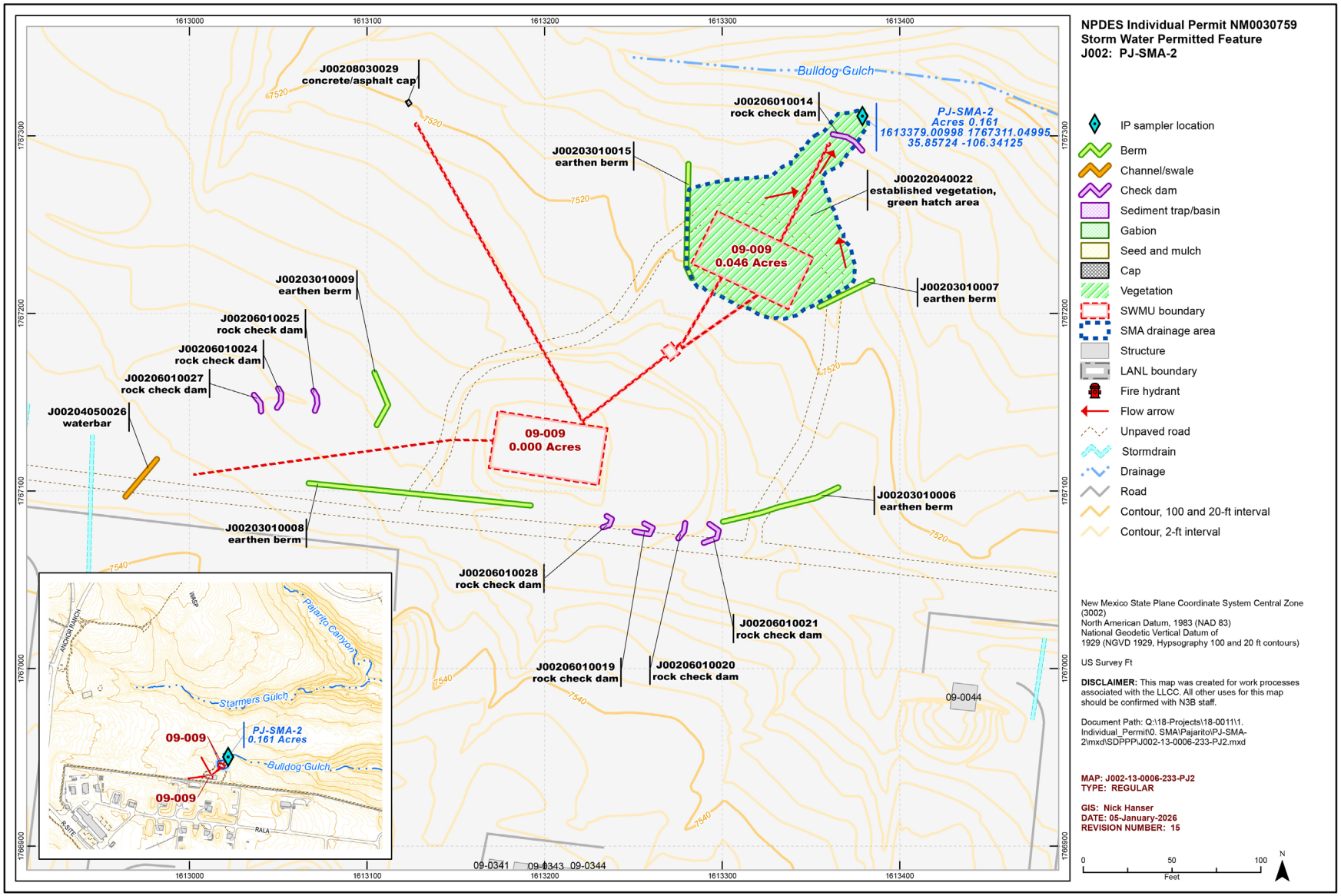

Figure 141-1 PJ-SMA-2 location map

142.0 PJ-SMA-3.05: SWMU 09-004(o)

One historical industrial activity area, Site 09-004(o), is associated with PJ-SMA-3.05 (permitted feature J003). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

142.1 Site Descriptions

09-004(o) (N3B 2025, 703890)

SWMU 09-004(o) consists of the decommissioned HE sump/settling tank (structure 09-198) located on the north side of building 09-48, an HE machining building at TA-09. The sump/settling tank, installed between 1950 and 1952, is constructed reinforced concrete with an aluminum liner and received industrial waste from building 09-48. Activities in the building involve HE machining. The sump/settling tank collected settling HE particles that were not filtered out by the building's waste system. Four trench drains located in HE machining bays 1–4 in the northern portion of building 09-48 each discharged to four concrete flumes that carried effluent to a collection flume north of the building and discharged to the HE sump/settling tank (structure 09-198) located north of the northwest corner of building 09-48. An 8-in. VCP outlet waste line carried effluent from HE sump/settling tank 09-198 to former NPDES-permitted outfall 05A068 located in Bull Dog Gulch, a tributary to upper Pajarito Canyon. Periodically, the sump was inspected, debris was removed using specially equipped trucks, and the sump/settling tank was cleaned (LANL 1993, 020949, pp. 5–36). The outfall was removed from the Laboratory's NPDES permit in the late 1990s. The sump/settling tank was then periodically cleaned by pumping to a specially equipped truck, and the sump was equipped with an overfill alarm and was regularly inspected. During the 2022–2025 investigation, field team reconnaissance confirmed that sump/settling tank 09-198 had been decommissioned and the outlet drainline to former NPDES-permitted outfall 05A068 had been removed.

Originally, effluent from the sump was discharged to a NPDES-permitted outfall (EPA 05A068) in Pajarito Canyon. The outfall was removed from the permit in the late 1990s. Currently, the sump contents are pumped out by a specially equipped truck and treated offsite. The sump is equipped with an overfill alarm and is regularly inspected.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 142-1.

Table 142-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
09-004(o)	Settling tank	Aluminum, inorganic, and organic chemicals, and HE

142.2 Control Measures

All active control measures in use at PJ-SMA-3.05 are listed in Table 142-2. Their locations are shown on the project map (Figure 142-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 142-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00302040012	Established vegetation	-	X	X	-	5-8-2013
J00303010010	Earthen berm	X	-	-	X	6-11-2012
J00303010011	Earthen berm	-	X	-	X	6-11-2012
J00303140013	Coir log	-	X	-	X	3-15-2022
J00303140015	Coir log	X	-	-	X	5-22-2024
J00303140016	Coir log	X	-	-	X	5-22-2024
J00303140017	Coir log	X	-	-	X	5-22-2024
J00303200014	Compost log	-	X	-	X	3-15-2022

142.3 Inspections and Maintenance

Rain gage RG257 recorded one storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-3.05 during the 2025 season, requiring one post-storm inspection, summarized in Table 142-3. All other control measure inspections conducted at the SMA in 2025 are summarized in Table 142-4. No maintenance activities were conducted at the SMA in 2025.

In 2025, site stabilization activities associated with Consent Order investigation activities were conducted at SWMU 09-004(o), as planned in the approved "2011 Investigation Work Plan for Starmer/Upper Pajarito Canyon Aggregate Area, Revision 1" (LANL 2011, 111794; NMED 2011, 201465).The SWPP team members conducted inspections at the SMA during active soil disturbance in the immediate area to assess potential impacts to the SMA, Sites, and control measures.

Table 142-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113829	8-19-2025	0.56	8-28-2025	9	Yes

Table 142-4 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Remediation Construction Activity	COMP-109921	2-4-2025	No findings.
Remediation Construction Activity	COMP-110540	4-10-2025	No findings. Closeout inspection.

142.4 Stormwater Monitoring

142.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on August 19, 2011. Analytical results from this sample yielded TAL exceedances for cyanide (0.02 mg/L) and gross-alpha activity (65.9 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures at PJ-SMA-3.05, corrective-action stormwater samples were collected on September 3, 2018, and July 27, 2021. Analytical results from these samples yielded TAL exceedances for copper (4.95 µg/L) and gross-alpha activity (40.8 pCi/L and 27 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2018, NPDES Permit No. NM0030759" (N3B 2019, 700320) and "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2021, NPDES Permit No. NM0030759" (N3B 2022, 701895).

Corrective-action confirmation-monitoring samples were collected on July 20 and August 6, 2022. Analytical results from the July 20 sample yielded TAL exceedances for copper (23.1 µg/L) and gross-alpha activity (16.8 pCi/L), and the August 6 sample had no TAL exceedances. The complete analytical results are presented in the "2022 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit No. NM0030759" (N3B 2023, 702681), and in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282), which has been updated with the inclusion of these samples into the SSD.

Confirmation-monitoring samples were collected on May 11, June 9, and September 5, 2024. Analytical results from the May sample yielded a TAL exceedance for total PCBs (1.41 µg/L). The remaining samples yielded no additional TAL exceedances, and the complete analytical results are presented in Appendix B of the Overview and in "2024 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit no. NM0030759" (N3B 2025, 703800); in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814); and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 2025, 703922).

142.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-3.05 from March 20 through July 21, 2025, resulting in a monitoring season of 123 days. Five inspections performed during the monitoring period are summarized in Table 142-5. Rain gage RG257 recorded 14 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

A confirmation-monitoring sample was collected on May 31, 2025. Analytical results from this sample yielded a TAL exceedance for copper (5.78 µg/L). The complete analytical results are presented in Appendix B of the Overview and in the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269), which has been updated with the inclusion of this sample into the SSD. A second sample was collected on July 7, 2025, but not retrieved after confirmation that the May sample met the SAP requirements. The sampling equipment was deactivated for the remainder of the monitoring season at the next inspection.

Table 142-5 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111173	5-1-2025	No	None	None
SMPLR-111622	6-11-2025	Yes	5-4-2025 5-5-2025 5-6-2025 5-7-2025 5-8-2025 5-9-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025	0.19/1.08 0.13/0.51 0.13/0.58 0.03/0.11 0.1/0.1 0.12/0.12 0.25/0.27 0.16/0.25 0.1/0.33 0.11/0.28
SMPLR-112415	6-25-2025	No	6-24-2025	0.38/0.69
SMPLR-112739	7-9-2025	No	6-27-2025 7-7-2025	0.08/0.14 0.26/0.37
SMPLR-113141	7-21-2025	No	7-18-2025	0.16/0.29

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

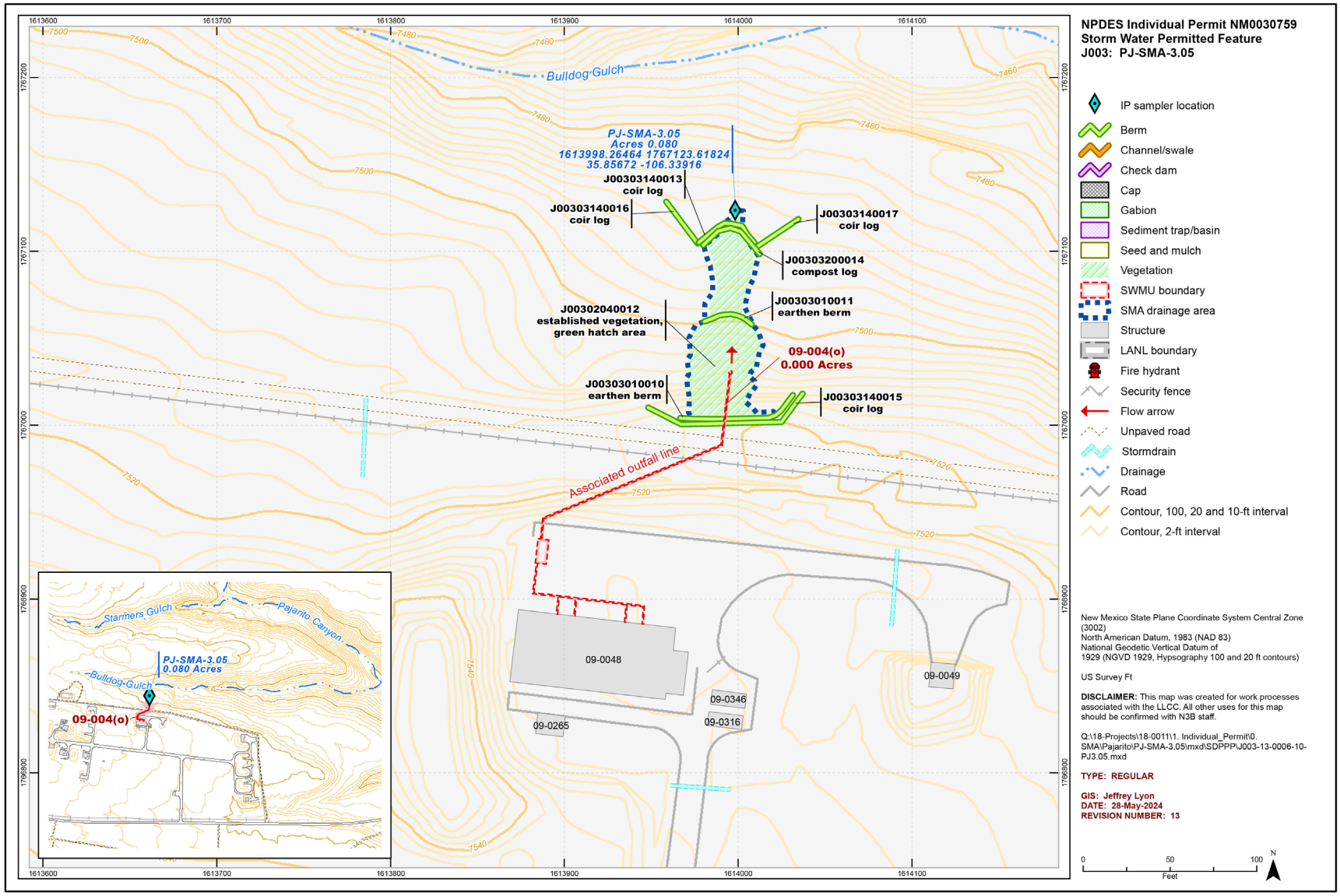

Figure 142-1 PJ-SMA-3.05 location map

143.0 PJ-SMA-4.05: SWMU 09-005(g)

One historical industrial activity area, Site 09-005(g), is associated with PJ-SMA-4.05 (permitted feature J004). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

143.1 Site Descriptions

09-005(g) (N3B 2025, 703890)

SWMU 09-005(g) consists of a septic system that includes an inactive septic tank (structure 09-109), drain field, and former NPDES-permitted outfall (EPA 04A155) located approximately 100 ft southeast of building 09-50, a shipping and receiving building at TA-09. Installed between 1950 and 1952, the inactive concrete septic tank (structure 09-109) measures approximately 5 ft wide × 8 ft long × 4 ft deep, with a capacity of 750-gal. and originally discharged to the same industrial waste line as the SWMU 09-004(g) sump. Floor drains in the equipment room (room 101) and restroom (room 102), as well as the toilet and lavatory drains in the restroom in building 09-50, discharged to a 6-in. inlet VCP sanitary sewer line coming off the south side of the building. The sanitary sewer line carried the effluent to septic tank 09-109 located southeast of building 09-50, east of the access road. Before 1989, the 6-in. VCP outlet line from septic tank 09-109 ran through manholes 09-145 and 09-146 and discharged to former NPDES-permitted outfall EPA 04A155. In 1989 septic tank 09-109 was rerouted to bypass the industrial waste line and discharge to an absorption trench (i.e., drain field) (LANL 1989, 014961). The septic tank was abandoned in place after the SWSC came online in 1992; outfall EPA 04A155 was removed from the Laboratory's NPDES permit in 1998 (EPA 1998, 109568) and the outlet drainline was plugged in 1989.

The precise location of the absorption trench was not known until the 2024–2025 investigation. Trenching near the junction box and along the absorption trench line identified the spatial location of the trench. The absorption trench line connects to the main line about 5 ft west of the point shown on the previous map and is oriented in a more northwest-southeast direction.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 143-1.

Table 143-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
09-005(g)	Settling tank	Metals, organic chemicals, and HE

143.2 Control Measures

All active control measures in use at PJ-SMA-4.05 are listed in Table 143-2. Their locations are shown on the project map (Figure 143-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 143-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00402040008	Established vegetation	-	X	X	-	5-8-2013
J00403010007	Earthen erm	X	-	-	X	10-31-2011
J00406010006	Rock check dam	-	X	-	X	10-27-2009

143.3 Inspections and Maintenance

Rain gage RG257 recorded one storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-4.05 during the 2025 season, requiring one post-storm inspection, summarized in Table 143-3. No other control measure inspections, maintenance activities, or facility modifications affecting drainage were conducted at the SMA in 2025.

Table 143-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113828	8-19-2025	0.56	8-28-2025	9	Yes

143.4 Stormwater Monitoring

143.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline-monitoring stormwater sample was collected on September 13, 2013. Analytical results from this sample yielded a TAL exceedance for gross-alpha activity (47.2 pCi/L). The complete analytical results are presented in the "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

143.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-4.05 from April 3 through October 28, 2025, resulting in a monitoring season of 208 days. Sixteen inspections performed during the monitoring period are summarized in Table 143-4. Rain gage RG257 recorded 34 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 143-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111271	5-1-2025	No	None	None
SMPLR-111623	5-6-2025	No	5-4-2025 5-5-2025	0.19/1.08 0.13/0.51
SMPLR-111715	5-7-2025	No	5-6-2025	0.13/0.58

Table 143-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111784	6-5-2025	No	5-7-2025 5-8-2025 5-9-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025	0.03/0.11 0.1/0.1 0.12/0.12 0.25/0.27 0.16/0.25 0.1/0.33 0.11/0.28
SMPLR-112326	6-25-2025	No	6-24-2025	0.38/0.69
SMPLR-112740	7-9-2025	No	6-27-2025 7-7-2025	0.08/0.14 0.26/0.37
SMPLR-113142	7-21-2025	No	7-18-2025	0.16/0.29
SMPLR-113294	7-24-2025	No	7-21-2025 7-22-2025 7-23-2025	0.49/0.96 0.09/0.14 0.05/0.15
SMPLR-113402	8-21-2025	No	7-30-2025 7-31-2025 8-19-2025	0.09/0.14 0.1/0.14 0.56/0.6
SMPLR-113928	8-25-2025	No	8-23-2025 8-24-2025	0.13/0.75 0.36/0.99
SMPLR-114026	8-28-2025	No	8-25-2025 8-26-2025	0.13/0.71 0.1/0.18
SMPLR-114170	9-9-2025	No	8-31-2025 9-5-2025 9-6-2025	0.08/0.15 0.25/0.48 0.11/0.26
SMPLR-114353	10-1-2025	No	9-13-2025 9-27-2025 9-28-2025	0.06/0.17 0.18/0.4 0.06/0.17
SMPLR-114701	10-15-2025	No	10-9-2025 10-11-2025 10-13-2025	0.13/0.16 0.07/0.15 0.13/0.95
SMPLR-114870	10-16-2025	No	10-15-2025	0.16/0.44
SMPLR-114907	10-28-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

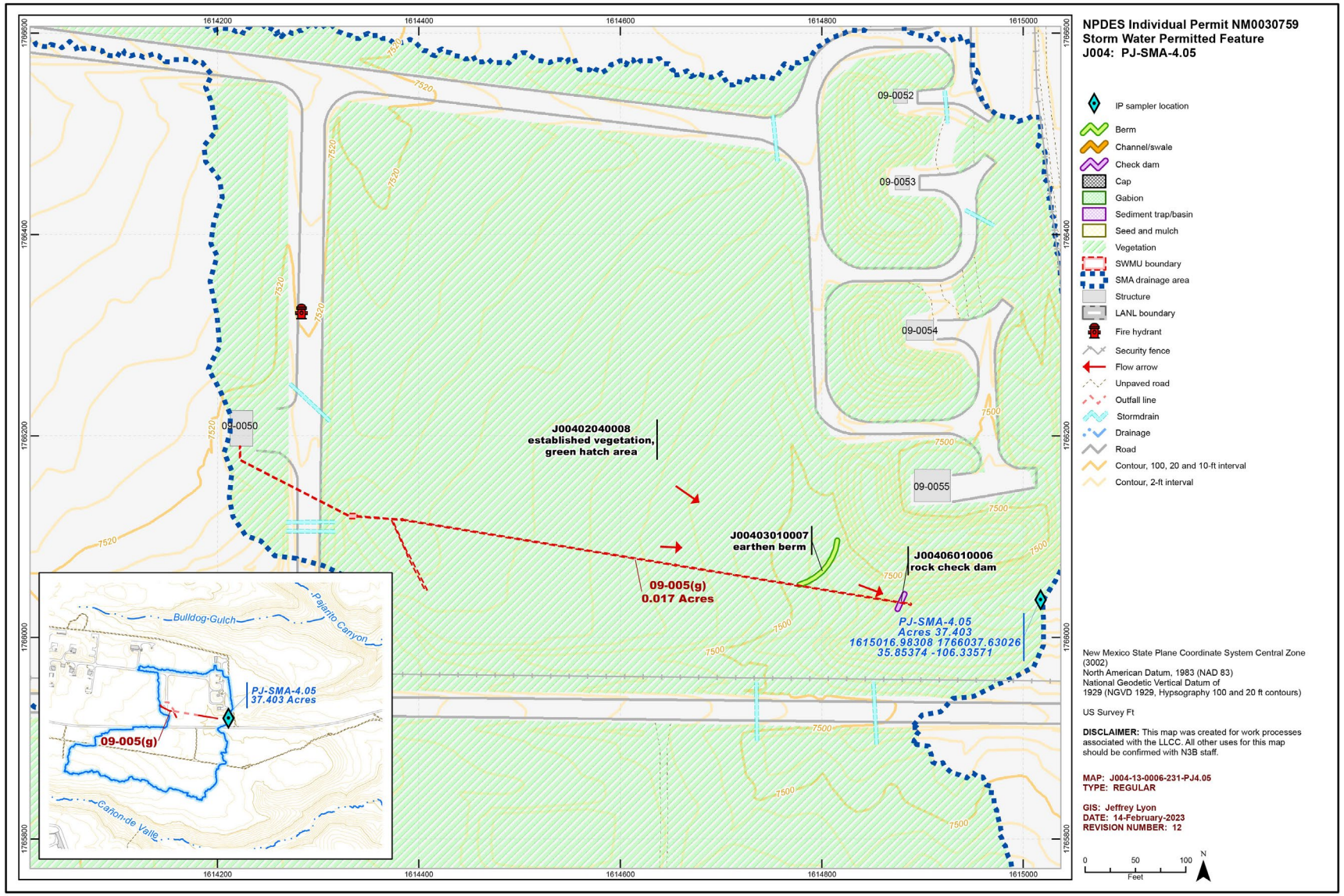

Figure 143-1 PJ-SMA-4.05 location map

144.0 PJ-SMA-5: SWMU 22-015(c)

One historical industrial activity area, Site 22-015(c), is associated with PJ-SMA-5 (permitted feature J005). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 703662) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

144.1 Site Descriptions

22-015(c) (N3B 2025, 703889)

SWMU 22-015(c) consists of a formerly permitted outfall (06A077) located approximately 80 ft south of building 22-52 at TA-22. The outfall served the floor drains in building 22-52, which discharged to the outfall via a 6-in.-diameter VCP drainline. The outfall daylighted in a channel that drained to a pond located near the edge of the mesa 80 ft south of building 22-52.

Beginning in 1952, building 22-52 was used as a plating laboratory and gold, copper, nickel, chromium, silver, cadmium, rhodium, zinc, and platinum were used in the plating processes. In 1974, standard printed-circuit etching operations began in the building, and depleted ferric chloride solutions, which contained iron and copper, were discharged to the outfall between 1974 to 1977. Discharge to the outfall was discontinued in 1977, when all liquid wastes were collected in drums and sent off-site for treatment and disposal.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 144-1.

Table 144-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
22-015(c)	Outfall from building 22-52	Arsenic, cadmium, chromium, copper, lead, nickel, silver, thallium, zinc, and cyanide

144.2 Control Measures

All active control measures in use at PJ-SMA-5 are listed in Table 144-2. Their locations are shown on the project map (Figure 144-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 144-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00502040015	Established vegetation	-	X	X	-	4-23-2013
J00503010025	Earthen berm	-	X	-	X	2-10-2015
J00503010037	Base course berm	X	-	X	-	2-14-2024
J00503120026	Rock berm	-	X	-	X	2-10-2015
J00503120027	Rock berm	-	X	-	X	2-10-2015
J00503120028	Rock berm	-	X	-	X	2-10-2015

Table 144-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00503200034	Compost log	-	X	-	X	9-29-2020
J00503200035	Compost log	-	X	-	X	9-29-2020
J00503200036	Compost log	-	X	-	X	9-29-2020
J00503200038	Compost log	-	X	-	X	2-14-2024
J00503200039	Compost log	-	X	-	X	2-14-2024
J00503200040	Compost log	-	X	-	X	2-14-2024
J00504010003	Earthen channel/swale	X	-	X	-	5-1-2008
J00504040016	Culvert	X	-	X	-	2-10-2015
J00504060017	Riprap	X	-	X	-	2-10-2015
J00504060020	Riprap	X	-	X	-	2-10-2015
J00506010018	Rock check dam	X	-	-	X	2-10-2015
J00506010021	Rock check dam	X	-	-	X	2-10-2015
J00506010022	Rock check dam	-	X	-	X	2-10-2015
J00506010023	Rock check dam	-	X	-	X	2-10-2015
J00506010024	Rock check dam	-	X	-	X	2-10-2015

144.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-5 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

144.4 Stormwater Monitoring

144.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline monitoring stormwater sample was collected on October 12, 2012. Analytical results from this sample yielded a TAL exceedance for copper (75.5 µg/L). The complete analytical results are presented in “Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2012, NPDES Permit No. NM0030759” (LANL 2013, 237680).

Following the 2015 installation of enhanced control measures, a corrective-action stormwater sample was collected on September 3, 2018. Analytical result from this sample yielded a TAL exceedance for copper (651 µg/L). The complete analytical results are presented in “Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2018, NPDES Permit No. NM0030759” (N3B 2019, 700320).

Following the 2020 installation of enhanced control measures, a corrective-action stormwater sample was collected on May 30, 2021. Analytical result from this sample yielded a TAL exceedance for copper (549 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2021, NPDES Permit No. NM0030759" (N3B 2022, 701895).

A corrective-action confirmation-monitoring sample was collected on July 26, 2022. Analytical results from this sample yielded a TAL exceedance for copper (141 µg/L), and the complete results are presented in the "2022 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit No. NM0030759" (N3B 2023, 702681), and in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282), which have been updated with the inclusion of this sample into the SSD.

A confirmation-monitoring sample was collected on September 5, 2024. Analytical results from this sample yielded a TAL exceedance for copper (292 µg/L). The complete analytical results are presented in "2024 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit no. NM0030759" (N3B 2025, 703800); in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814); and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

144.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-5 from March 31 through November 10, 2025, resulting in a monitoring season of 224 days. Eight inspections performed during the monitoring period are summarized in Table 144-3. RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 144-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111076	5-13-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-111899	6-24-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112602	6-30-2025	No	6-24-2025 6-26-2025 6-27-2025	0.28/0.64 0.17/0.19 0.08/0.12

Table 144-3 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-112892	8-13-2025	No	6-30-2025 7-7-2025 7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025	0.09/0.11 0.23/0.29 0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16
SMPLR-113708	8-29-2025	No	8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.47/0.51 0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17
SMPLR-114192	9-9-2025	No	8-31-2025 9-5-2025 9-6-2025	0.21/0.36 0.27/0.59 0.17/0.37
SMPLR-114366	10-22-2025	No	9-12-2025 9-13-2025 9-27-2025 9-28-2025 10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13 0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44
SMPLR-114971	11-10-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

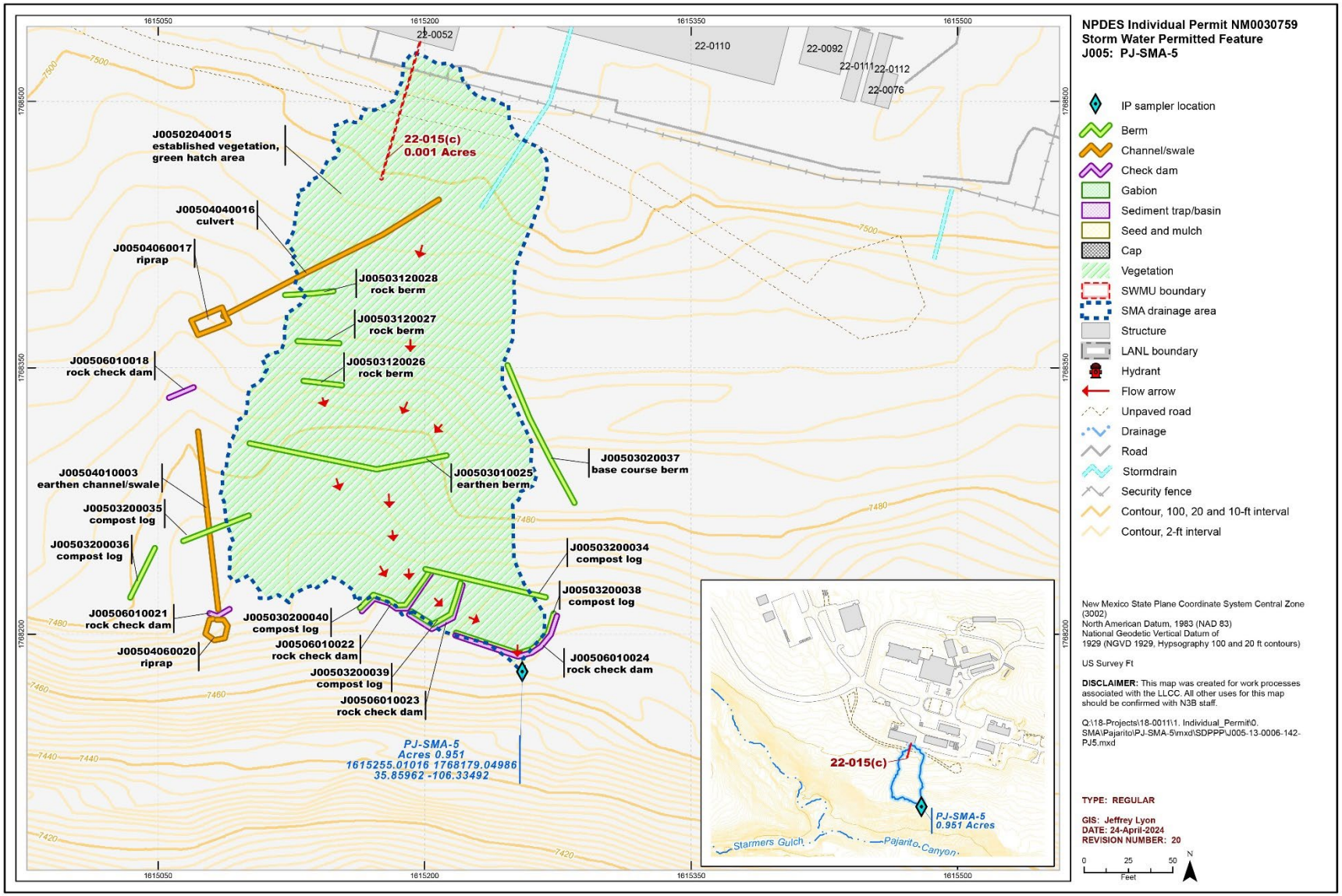

Figure 144-1 PJ-SMA-5 location map

145.0 PJ-SMA-5.1: SWMU 22-010(b)

One historical industrial activity area, Site 22-010(b), is associated with PJ-SMA-5.1 (permitted feature J006). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

145.1 Site Descriptions

22-010(b) (N3B 2025, 703889)

SWMU 22-010(b) consists of an inactive septic system located approximately 90 ft south of building 22-1 at TA-22. The septic system includes a septic tank (structure 22-51), inlet and outlet drainlines, distribution boxes, a leach field, a subsurface sand filter, and a former outfall. Septic tank 22-51 was installed in 1948, with a capacity of 8775 gal., and discharged to an outfall directly south of the septic tank. Septic tank 22-51 was installed to replace the SWMU 22-016 septic tank (structure 22-42) that originally served building 22-1, an HE assembly building, which also housed a pentaerythritol tetranitrate recrystallization room and laundry for protective clothing, and building 22-4, an office and fabrication building. The SWMU 22-010(b) septic tank was installed in tandem with, and upgradient of, the septic tank 22-42 and tied into the same outlet drainline. Building 22-5 (a shop and laboratory building) was tied in, and the leach field was added at the same time. During the 1950s, a leach field was added to the system and a shop, when a laboratory building (structure 22-5), a guard shack (structure 22-32), and a plating and circuit etching shop were constructed and connected to the SWMU 22-010(b) septic system.

In 1973, a subsurface sand filter was constructed (approximately 200 ft southeast of the leach field) to replace the leach field, which was abandoned in place. The sand filter discharged through a 6-in.-diameter VCP drainline that extends south 120 ft before terminating at an outfall in Pajarito Canyon. In 1984, an office building (structure 22-90), an assembly building (structure 22-91), and a detonator development building (structure 22-93) were constructed and tied into the system. The SWMU 22-010(b) septic system and sand filter operated until the 1990s, when the TA-22 sewer lines were tied into to the LANL SWSC; the SWMU 22-010(b) septic system was abandoned in place.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 145-1.

Table 145-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
22-010(b)	Septic system	Metals, chromium, silver, inorganic chemicals, organic chemicals, SVOCs, and HE

145.2 Control Measures

All active control measures in use at PJ-SMA-5.1 are listed in Table 145-2. Their locations are shown on the project map (Figure 145-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 145-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00602040010	Established vegetation	-	X	X	-	4-23-2013
J00603010011	Earthen berm	X	-	-	X	11-5-2013
J00608030012	Concrete/asphalt cap	-	X	X	-	11-5-2013

145.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 mins) at PJ-SMA-5.1 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

145.4 Stormwater Monitoring

145.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, two baseline stormwater samples were collected on August 21 and September 7, 2011. Analytical results from these samples yielded TAL exceedances for copper (8.2 µg/L and 11.1 µg/L), gross-alpha activity (38.4 pCi/L and 43.5 pCi/L), and zinc (50.6 µg/L and 59.4 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

145.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-5.1 from April 22 through October 31, 2025, resulting in a monitoring season of 192 days. Seven inspections performed during the monitoring period are summarized in Table 145-3. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Due to changes in recent site characteristics, a new location was identified as a better representation of runoff from 22-010(b) and the sampler was relocated in spring 2025. The sampler coordinates and the SMA drainage area have been updated to reflect the new monitoring location on the project map (Figure 145-1), located at the end of this SMA update.

Table 145-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111535	5-7-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-111791	6-17-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112489	6-26-2025	No	6-24-2025	0.28/0.64
SMPLR-112819	8-7-2025	No	6-26-2025 6-27-2025 6-30-2025 7-7-2025 7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025	0.17/0.19 0.08/0.12 0.09/0.11 0.23/0.29 0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16
SMPLR-113649	8-25-2025	No	8-19-2025 8-23-2025 8-24-2025	0.47/0.51 0.12/0.78 0.22/0.6
SMPLR-114031	9-16-2025	No	8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025	0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37 0.05/0.1 0.04/0.13
SMPLR-114472	10-31-2025	No	9-27-2025 9-28-2025 10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.17/0.4 0.07/0.13 0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

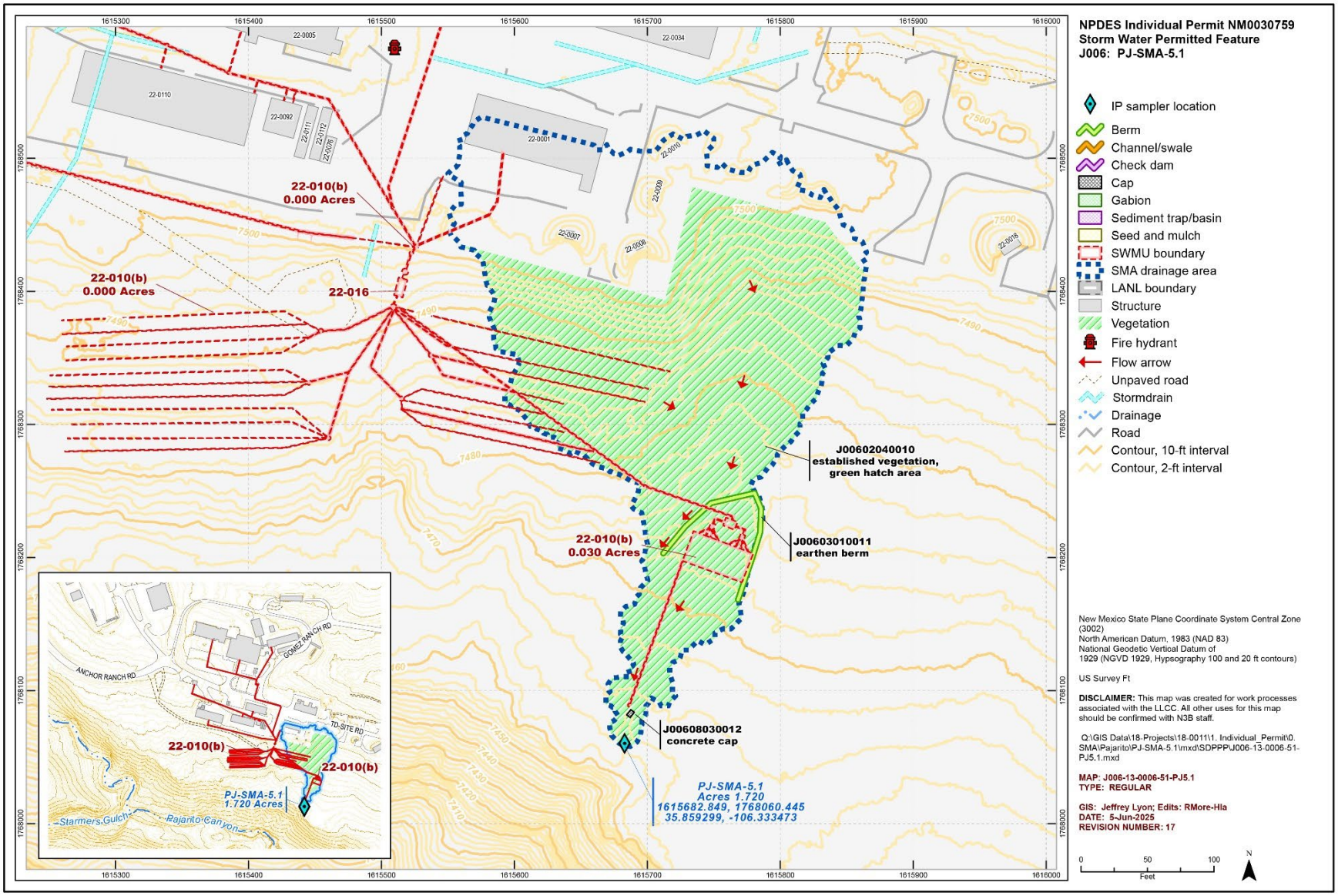

Figure 145-1 PJ-SMA-5.1 location map

146.0 PJ-SMA-6: SWMU 40-010

One historical industrial activity area, Site 40-010, is associated with PJ-SMA-6 (permitted feature J007). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

146.1 Site Descriptions

40-010 (N3B 2025, 703889)

SWMU 40-010 consists of a surface disposal area located on the edge of Pajarito Canyon, approximately 200 ft south of former building 40-72 at TA-40. The surface disposal area extends about 150 ft along the canyon edge and 140 ft down the canyon hillside. The area contained various debris, including 20 empty 30-gal. drums (LANL 1993, 026068). This area also contains debris from farm and home implements that predate Manhattan Project activities. Post-Cerro Grande fire activities removed all the drums and exposed debris, with the exception of the pre-Manhattan Project debris, which is considered to be of archaeological importance and therefore cannot be removed.

SWMU 40-010 is not listed in the 1990 SWMU Report (LANL 1990, 007513). SWMU 40-010 was one of 27 newly identified SWMUs added to the LANL HWFP by EPA in 1993 (LANL 1993, 030074).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 146-1.

Table 146-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-010	Surface disposal area	Metals and inorganic and organic chemicals

146.2 Control Measures

All active control measures in use at PJ-SMA-6 are listed in Table 146-2. Their locations are shown on the project map (Figure 146-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 146-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00702040018	Established vegetation	-	X	X	-	5-7-2013
J00703010009	Earthen berm	-	X	-	X	10-31-2011
J00703010010	Earthen berm	-	X	-	X	10-31-2011
J00703010011	Earthen berm	-	X	-	X	10-31-2011
J00703120012	Rock berm	X	-	-	X	11-2-2011
J00706010002	Rock check dam	X	-	-	X	9-20-2005
J00706010004	Rock check dam	X	-	-	X	10-28-2009

146.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-6 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

146.4 Stormwater Monitoring

146.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on July 8, 2014. Analytical results from this sample yielded a TAL exceedance for gross-alpha activity (81.6 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2014, NPDES Permit No. NM0030759" (LANL 2015, 600241).

146.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-6 from March 27 through November 4, 2025, resulting in a monitoring season of 222 days. Six inspections performed during the monitoring period are summarized in Table 146-3. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 146-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111186	5-8-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-111827	6-18-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112509	7-31-2025	No	6-24-2025 6-26-2025 6-27-2025 6-30-2025 7-7-2025 7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025	0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11 0.23/0.29 0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26

Table 146-3 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113532	8-21-2025	No	7-31-2025 8-19-2025	0.19/0.16 0.47/0.51
SMPLR-113941	10-2-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37 0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13
SMPLR-114739	11-4-2025	No	10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

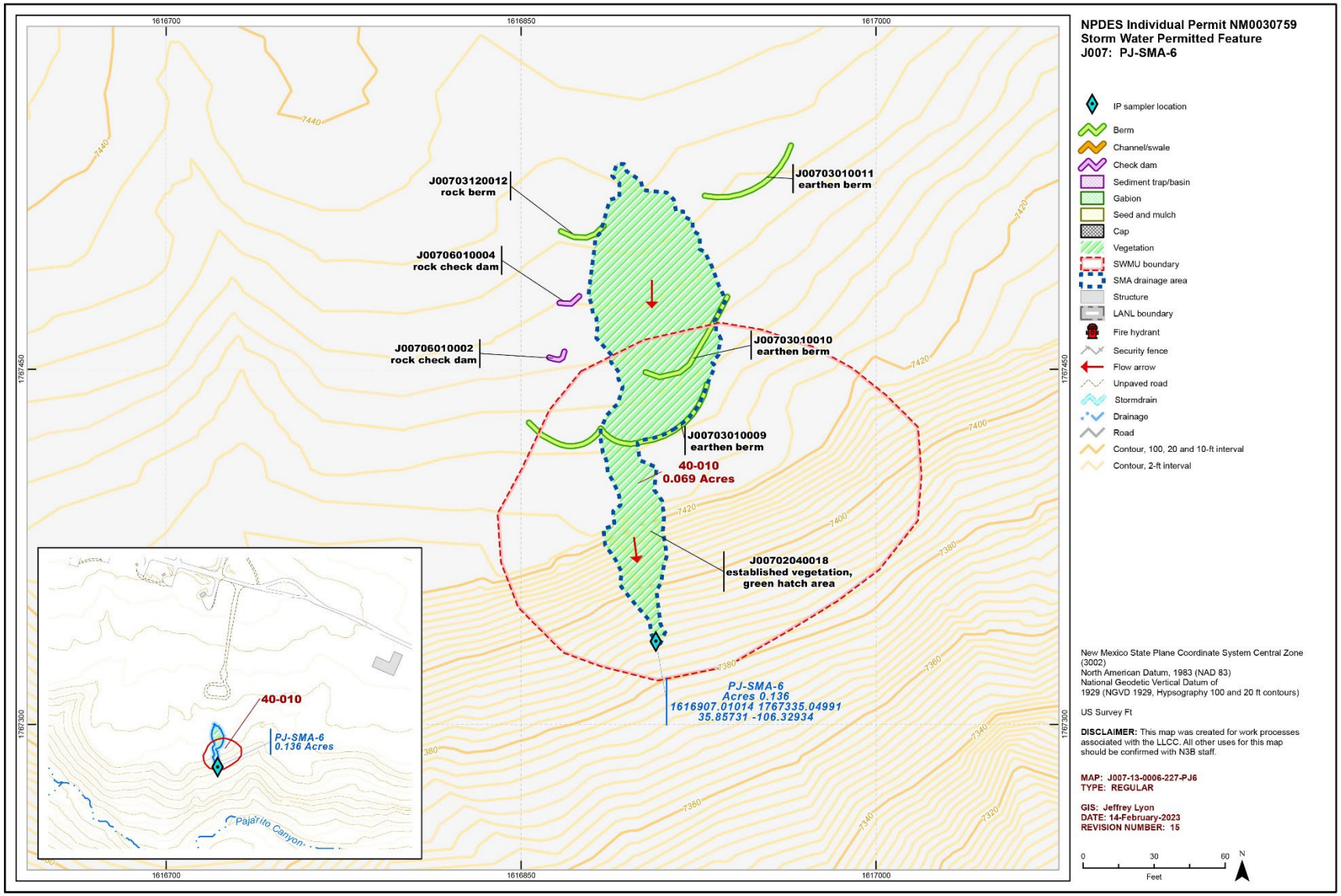

Figure 146-1 PJ-SMA-6 location map

147.0 PJ-SMA-7: SWMU 40-006(c)

One historical industrial activity area, Site 40-006(c), is associated with PJ-SMA-7 (permitted feature J008). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

147.1 Site Descriptions

40-006(c) (N3B 2025, 703889)

SWMU 40-006(c) consists of the location of a firing site at TA-40 that constituted the southern portion of building 40-5 on the north rim of Pajarito Canyon at the west end of TD Site Road.

The 1990 SWMU Report (LANL 1990, 007513) describes SWMU 40-006(c) as an active firing site consisting of a concrete pad located on the south side of building 40-5 at TA-40. The firing site consisted of a 16-ft × 8-ft reinforced-concrete and steel firing chamber that allowed observation of the test shots, a partially protected area on the south side of the building where shots were prepared, and a 16-ft × 15-ft open firing concrete pad connected to the south of the building where larger shots were fired.

Beginning in 1950, the original firing site was used to test detonators. In 1992, the SWMU 40-006(c) firing site was modified. The firing pad and the top 6 in. of soil were removed and replaced with a firing containment system, consisting of a large containment vessel equipped with an HEPA filtration system for gaseous emissions. The new firing chamber has been and continues to be used only to test and develop small explosive devices within the containment vessel. The 1992 addition to building 40-5 currently encapsulates the boundary of the original firing site [SWMU 40-006(c)].

Historically, the firing site included an open firing pad connected to the south of the building where the larger shots, which could use up to 85 lb of HE, were fired. In the past, after each shot, large pieces of debris were removed and disposed of, and sand and remaining debris were pushed to the rim of Upper Pajarito Canyon. This practice created a sand berm near the canyon edge. The SWMU 40-006(c) debris disposal area is on the edge and slope side of the north rim of Upper Pajarito Canyon, directly south of building 40-5.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 147-1.

Table 147-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-006(c)	Firing site	Barium, copper, lead, thallium, zinc, nitrates, PAHs, and HE

147.2 Control Measures

All active control measures in use at PJ-SMA-7 are listed in Table 147-2. Their locations are shown on the project map (Figure 147-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 147-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00802040006	Established vegetation	-	X	X	-	5-7-2013
J00803010004	Earthen berm	-	X	-	X	11-3-2009
J00804010002	Earthen channel/swale	X	-	X	-	6-1-2009
J00804040003	Culvert	X	-	X	-	6-1-2009

147.3 Inspections and Maintenance

PJ-SMA-7 was in long-term stewardship in 2025, subject to inspection requirements outlined in the Permit Part I.B.8.c. Rain gage RG-TA-06 did not record a 3-yr, 24-hr storm event in 2025, so no post-storm inspections were required. All other control measure inspections conducted at PJ-SMA-7 are summarized in Table 147-3. No maintenance activities or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 147-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Long-Term Stewardship	BMP-114612	10-27-2025	No deficiency noted.

147.4 Stormwater Monitoring

147.4.1 Previous Stormwater Monitoring Results

Through Calendar Year 2022, stormwater flow was not sufficient for sample collection at PJ-SMA-7.

In the initial SIP (N3B 2023, 702792; EPA 2023, 704169) for the 2022 Permit, PJ-SMA-7 screened into Long-Term Stewardship status per Permit Part 1.C.3, effective July 5, 2023.

147.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was not conducted at PJ-SMA-7 in 2025. The SMA was in Long-Term Stewardship status, as discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

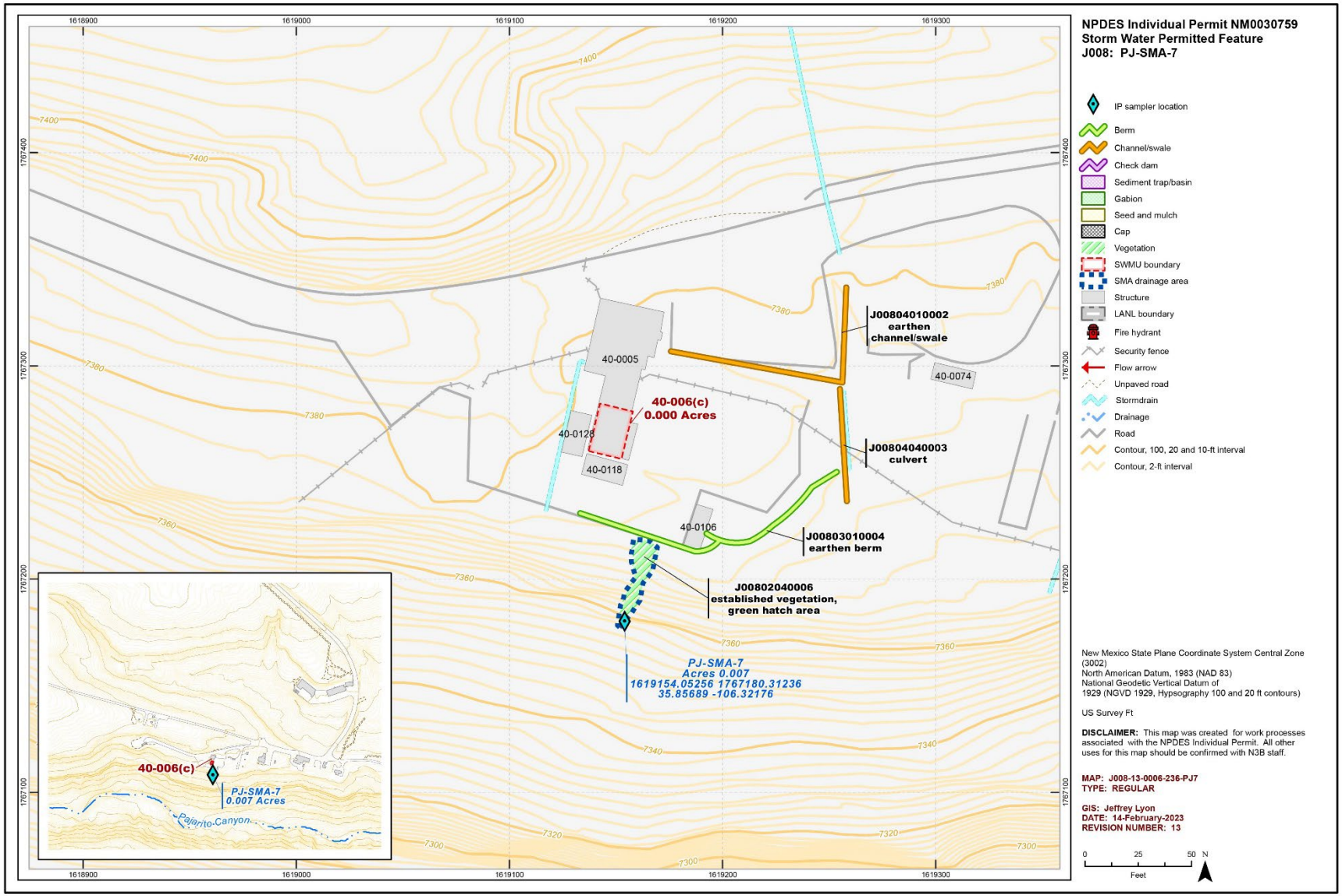

Figure 147-1 PJ-SMA-7 location map

148.0 PJ-SMA-8: SWMU 40-006(b)

One historical industrial activity area, Site 40-006(b), is associated with PJ-SMA-8 (permitted feature J009). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

148.1 Site Descriptions

40-006(b) (N3B 2025, 703889)

SWMU 40-006(b) consists of a former firing site located at TA-40 on the south side of building 40-8 on the northern rim of Upper Pajarito Canyon, at the west end of TD Site Road.

The firing site consisted of a 16-ft × 8-ft reinforced-concrete and steel firing chamber that allowed for observation of the test shots, a partially protected area on the south side of the building where shots were prepared, and a 16-ft × 10-ft open firing concrete pad connected to the south side of the building where larger shots were fired. The firing site was originally used to test detonators, and shots could use up to 85 lb of HE. Following each shot, large pieces of debris were removed and disposed of, and sand and remaining debris were pushed to the edge of Upper Pajarito Canyon, which created a sand berm near the canyon edge.

In 1992, the SWMU 40-006(b) firing site was modified. The firing pad and the top 6 in. of soil were removed and replaced with a containment system consisting of a large containment vessel with a HEPA filtration system for gaseous emissions. The modified firing chamber is used to test and develop small explosive devices within the containment vessel.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 148-1.

Table 148-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-006(b)	Firing site	Barium, copper, lead, thallium, zinc, nitrates, PAHs, HE, and uranium

148.2 Control Measures

All active control measures in use at PJ-SMA-8 are listed in Table 148-2. Their locations are shown on the project map (Figure 148-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 148-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00902040010	Established vegetation	-	X	X	-	5-7-2013
J00903010006	Earthen berm	-	X	-	X	11-2-2009
J00903010009	Earthen berm	-	X	-	X	11-2-2009

J00904020005	Concrete/asphalt channel/swale	X	-	X	-	6-1-2009

Table 148-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J00906010002	Rock heck dam	X	-	-	X	8-30-2006
J00906010004	Rock check dam	X	-	-	X	6-1-2009
J00906010011	Rock check dam	X	-	-	X	11-7-2013

148.3 Inspections and Maintenance

PJ-SMA-8 was in long-term stewardship in 2025, subject to inspection requirements outlined in the Permit Part I.B.8.c. Rain gage RG-TA-06 did not record a 3-yr, 24-hr storm event in 2025, so no post-storm inspections were required. All other control measure inspections conducted at PJ-SMA-8 are summarized in Table 148-3. No maintenance activities or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 148-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Long-Term Stewardship	BMP-114613	10-27-2025	No deficiency noted.

148.4 Stormwater Monitoring

148.4.1 Previous Stormwater Monitoring Results

Through Calendar Year 2022, stormwater flow was not sufficient for sample collection at PJ-SMA-8.

In the initial SIP (N3B 2023, 702792; EPA 2023, 704169) for the 2022 Permit, PJ-SMA-8 screened into Long-Term Stewardship status per Permit Part 1.C.3, effective July 5, 2023.

184.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was not conducted at PJ-SMA-8 in 2025. The SMA was in Long-Term Stewardship status, as discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

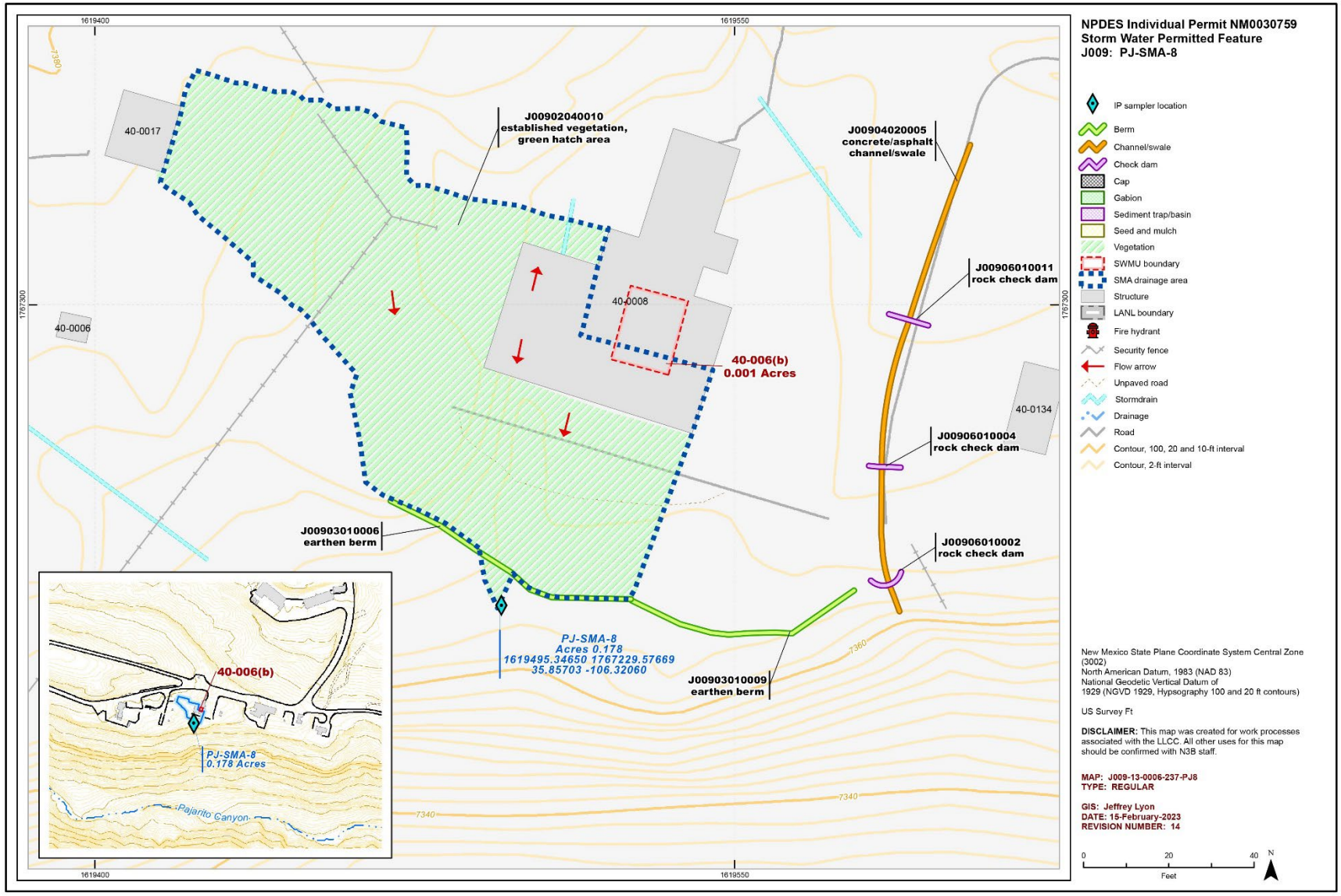

Figure 148-1 PJ-SMA-8 location map

149.0 PJ-SMA-9: SWMU 40-009

One historical industrial activity area, Site 40-009, is associated with PJ-SMA-9 (permitted feature J010). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

149.1 Site Descriptions

40-009 (N3B 2025, 703889)

SWMU 40-009 consists of a surface disposal area located south of building 40-9 at TA-40. The 1990 SWMU Report (LANL 1990, 007513) describes the site as a landfill that resulted from a 1967 decommissioning effort undertaken at TA-15, during which several structures were burned, and the debris was disposed of in Pajarito Canyon between buildings 40-5 and 40-15. The disposal area is located between two prominent berms on the steep hillside directly south of building 40-9 and is approximately 120- ft long × 100-ft wide.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 149-1.

Table 149-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-009	Landfill	Metals, dioxins/furans, and PAHs

149.2 Control Measures

All active control measures in use at PJ-SMA-9 are listed in Table 149-2. Their locations are shown on the project map (Figure 149-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 149-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01002040010	Established vegetation	-	X	X	-	5-7-2013
J01003010016	Earthen berm	X	-	-	X	9-17-2015
J01003010017	Earthen berm	X	-	-	X	9-17-2015
J01003010018	Earthen berm	X	-	-	X	9-17-2015
J01003010019	Earthen berm	-	X	-	X	9-17-2015
J01003200023	Compost log	X	-	-	X	5-24-2024
J01003200024	Compost log	X	-	-	X	5-24-2024
J01003200025	Compost log	X	-	-	X	5-24-2024
J01006010008	Rock check dam	X	-	-	X	10-29-2009
J01006010009	Rock check dam	X	-	-	X	10-29-2009

Table 149-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01006010026	Rock check dam	-	X	-	X	5-24-2024
J01006010027	Rock check dam	-	X	-	X	5-24-2024

149.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-9 during the 2025 season, so no post-storm inspections were required. All other control measure inspections conducted at the SMA are summarized in Table 149-3. No maintenance activities were conducted at the SMA in 2025.

In the fall of 2025, Triad performed construction activities within the drainage area of PJ-SMA-9. The SWPP team members conducted inspections at the SMA during active soil disturbance to assess potential impacts to the SMA, Sites, and control measures. Impacts to multiple controls were addressed by the construction project. Facility access restrictions precluded completion of inspection in mid-December, and active soil disturbance did not occur during the latter part of December. The project is continuing into 2026, and weekly inspections while active soil disturbance is occurring are planned to continue until activities are complete and the disturbed area is stabilized.

Table 149-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Remediation Construction Activity	COMP-114582	10-2-2025	Earthen berm J01003010017 has been impacted by activities. The project will re-establish the control soon. Backup controls are in place.
Remediation Construction Activity	COMP-114731	10-15-2025	Earthen berms J01003010016, J01003010017, and J01003010018 have been impacted by activities. The project will re-establish the controls soon. Backup controls are in place.
Remediation Construction Activity	COMP-114850	10-23-2025	Earthen berm J01003010017 has been repaired by the project and is no longer impacted. Earthen berms J01003010016 and J01003010018 have been impacted by activities. The project will re-establish the controls soon. Backup controls are in place.
Remediation Construction Activity	COMP-114972	11-4-2025	Earthen berms J0103010016 and J01003010017 have been repaired by the project and are no longer impacted. Earthen berm J01003010018 has been impacted by activities. The project will re-establish the controls soon. Backup controls are in place.

Table 149-3 Other Control Measure Inspections during 2025 (continued)

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Remediation Construction Activity	COMP-115037	11-12-2025	All the berms have been restored to near original condition. Backup controls are in place.
Remediation Construction Activity	COMP-115127	11-18-2025	
Remediation Construction Activity	COMP-115180	11-24-2025	All the berms have been restored to original condition. Backup controls are in place.
Remediation Construction Activity	COMP-115226	12-3-2025	
Remediation Construction Activity	COMP-115259	12-8-2025	

149.4 Stormwater Monitoring

149.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on June 21, 2014. Analytical results from this sample yielded TAL exceedances for copper (7.76 µg/L) and gross-alpha activity (41.6 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2014, NPDES Permit No. NM0030759" (LANL 2015, 600241).

Following the installation of enhanced control measures, a corrective-action stormwater sample was collected on July 27, 2021. Analytical result from this sample yielded a TAL exceedance for copper (8.52 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2021, NPDES Permit No. NM0030759" (N3B 2022, 701895).

A corrective-action confirmation-monitoring sample was collected on July 27, 2022. Analytical results from this sample yielded TAL exceedances for copper (11 µg/L) and gross-alpha activity (47 pCi/L). The complete results are presented in the "2022 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit No. NM0030759" (N3B 2023, 702681), and in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282), which have been updated with the inclusion of this sample into the SSD.

A confirmation-monitoring sample was collected on June 9, 2024. Analytical results from this sample yielded no TAL exceedances. The complete analytical results are presented in "2024 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit no. NM0030759" (N3B 2025, 703800); in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814); and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

149.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-9 from March 26 through October 27, 2025, resulting in a monitoring season of 214 days. Six inspections performed during the monitoring period are summarized in Table 149-5. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while

the sampling equipment was active. Soil disturbance associated with Triad construction activities did not require temporary shutdown of the sampling equipment at the SMA.

A confirmation-monitoring sample was collected on August 19, 2025. Analytical results from this sample yielded TAL exceedances for copper (11.1 µg/L) and hexachlorobenzene (0.015 µg/L). The complete analytical results are presented in Appendix B of the Overview and in the "2025 Sampling Implementation Plan, NPDES Permit No. NM000759" (N3B 2026, 704269), which has been updated with the inclusion of these samples into the SSD.

Table 149-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111187	5-6-2025	No	5-4-2025 5-5-2025 5-6-2025	0.38/1.08 0.15/0.6 0.03/0.12
SMPLR-111721	6-16-2025	No	5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112473	7-17-2025	No	6-24-2025 6-26-2025 6-27-2025 6-30-2025 7-7-2025	0.28/0.64 0.17/0.19 0.08/0.12 0.09/0.11 0.23/0.29
SMPLR-113246	8-20-2025	Yes	7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025 8-19-2025	0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16 0.47/0.51
SMPLR-113890	9-29-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37 0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13

Table 149-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-114644	10-27-2025	No	10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

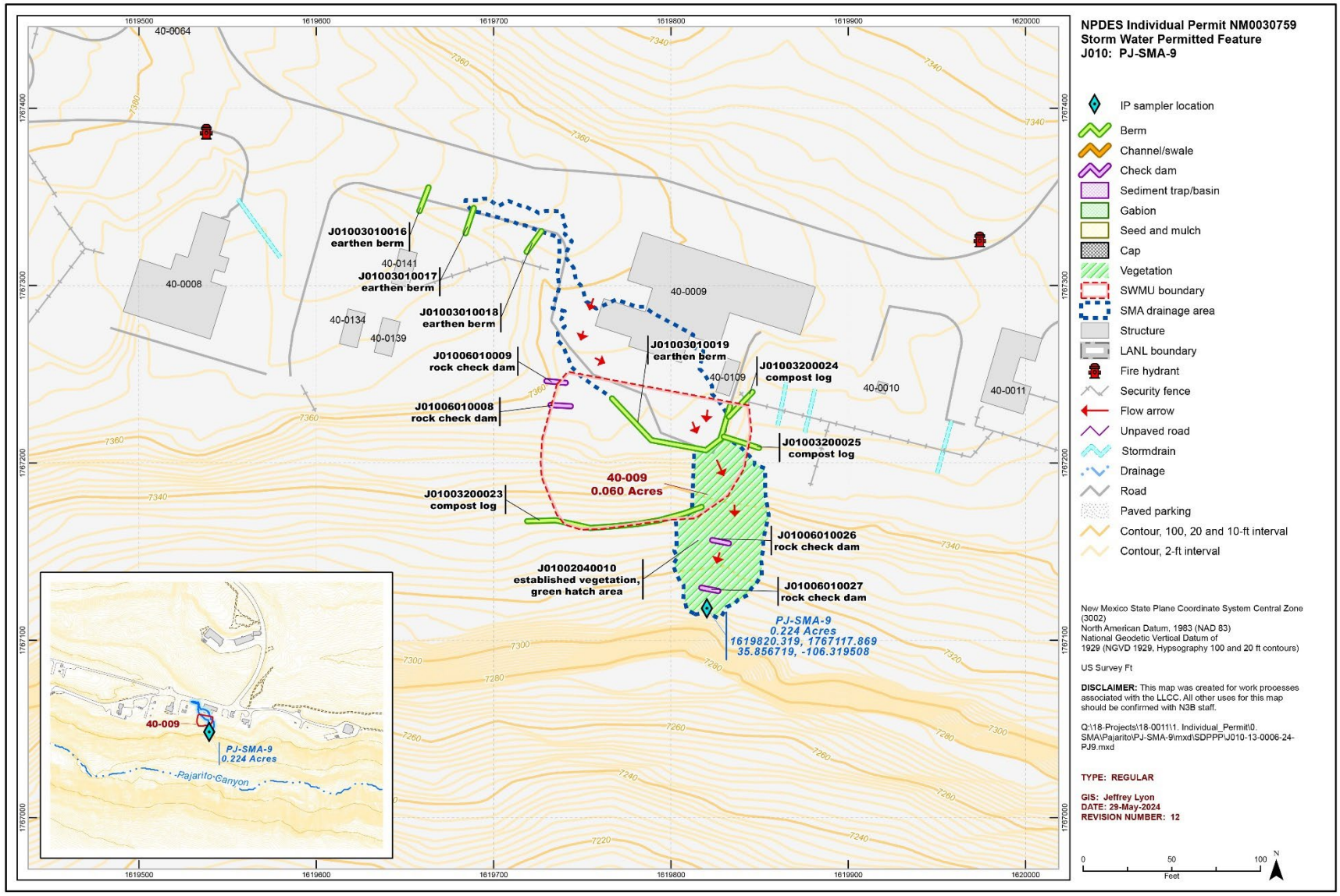

Figure 149-1 PJ-SMA-9 location map

150.0 PJ-SMA-9.2: SWMU 40-001(c)

One historical industrial activity area, Site 40-001(c), is associated with PJ-SMA-9.2 (permitted feature J011). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

150.1 Site Descriptions

40-001(c) (N3B 2024, 703369)

SWMU 40-001(c) consists of an inactive septic system that includes a septic tank (structure 40-25) located approximately 25 ft east of building 40-11, associated inlet and outlet drainlines, two former outfalls, and a leach field at TA-40. Constructed of reinforced concrete, the septic tank measures 4 ft wide × 7 ft long × 6 ft deep and has a capacity of 540 gal. (LASL 1949, 110465). The septic system was installed in 1950 and serves building 40-11, which houses changing rooms and restrooms. Operators at TA-40 firing sites changed into Laboratory-provided protective clothing. Originally, the septic tank discharged northeast to an outfall located in Twomile Canyon. In 1951, the 6-in.-diameter VCP outlet drainline was rerouted south to an outfall in Upper Pajarito Canyon (LASL 1951, 110464). In 1988, the septic tank drainline was rerouted to a leach field constructed south of the septic tank (LANL 1988, 110466). In 2012, the septic system was abandoned in place, and the drainlines leading to both outfalls were plugged (LANL 2012, 521455).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 150-1.

Table 150-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-001(c)	Septic system	Metals, inorganic, and organic chemicals, and HE

150.2 Control Measures

All active control measures in use at PJ-SMA-9.2 are listed in Table 150-2. Their locations are shown on the project map (Figure 150-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 150-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01103140001	Coir log	-	X	-	X	8-1-2022
J01103140002	Coir log	-	X	-	X	8-1-2022
J01103140003	Coir log	-	X	-	X	8-1-2022
J01103140004	Coir log	-	X	-	X	8-1-2022
J01103140005	Coir log	-	X	-	X	8-1-2022

150.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-9.2 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

150.4 Stormwater Monitoring

150.4.1 Previous Stormwater Monitoring Results

Stormwater monitoring was not conducted at PJ-SMA-9.2 under the 2010 IP requirements. Under the 2022 IP requirements, confirmation-monitoring samples were collected on June 9, and October 18, 2024. Analytical results from the June sample yielded no TAL exceedances, while the October sample yielded a TAL exceedance for copper (5.65 µg/L). The complete analytical results are presented in "2024 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit no. NM0030759" (N3B 2025, 703800); in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814); and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

150.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-9.2 from March 24 through October 27, 2025, resulting in a monitoring season of 217 days. Twenty-two inspections performed during the monitoring period are summarized in Table 150-3. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 150-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111125	4-17-2025	No	None	None
SMPLR-111452	4-28-2025	No	None	None
SMPLR-111568	5-5-2025	No	5-4-2025	0.38/1.08
SMPLR-111650	5-8-2025	No	5-5-2025 5-6-2025	0.15/0.6 0.03/0.12
SMPLR-111810	6-4-2025	No	5-31-2025 6-2-2025 6-3-2025	0.2/0.35 0.13/0.2 0.09/0.33
SMPLR-112249	6-9-2025	No	6-4-2025	0.12/0.24
SMPLR-112364	6-16-2025	No	6-9-2025 6-12-2025	0.06/0.17 0.11/0.15
SMPLR-112461	6-25-2025	No	6-24-2025	0.28/0.64
SMPLR-112715	6-27-2025	No	6-26-2025	0.17/0.19

Table 150-3 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-112834	7-9-2025	No	6-27-2025 6-30-2025 7-7-2025	0.08/0.12 0.09/0.11 0.23/0.29
SMPLR-113150	7-21-2025	No	7-17-2025 7-18-2025	0.07/0.1 0.1/0.26
SMPLR-113290	7-24-2025	No	7-21-2025 7-23-2025	0.23/0.53 0.17/0.25
SMPLR-113396	7-31-2025	No	7-30-2025	0.18/0.26
SMPLR-113510	8-6-2025	No	7-31-2025	0.19/0.16
SMPLR-113621	8-25-2025	No	8-19-2025 8-23-2025 8-24-2025	0.47/0.51 0.12/0.78 0.22/0.6
SMPLR-114012	8-26-2025	No	8-25-2025	0.07/0.56
SMPLR-114071	9-4-2025	No	8-26-2025 8-31-2025	0.08/0.17 0.21/0.36
SMPLR-114248	9-8-2025	No	9-5-2025 9-6-2025	0.27/0.59 0.17/0.37
SMPLR-114297	9-11-2025	No	None	None
SMPLR-114415	9-29-2025	No	9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13
SMPLR-114635	10-16-2025	No	10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44
SMPLR-114901	10-27-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

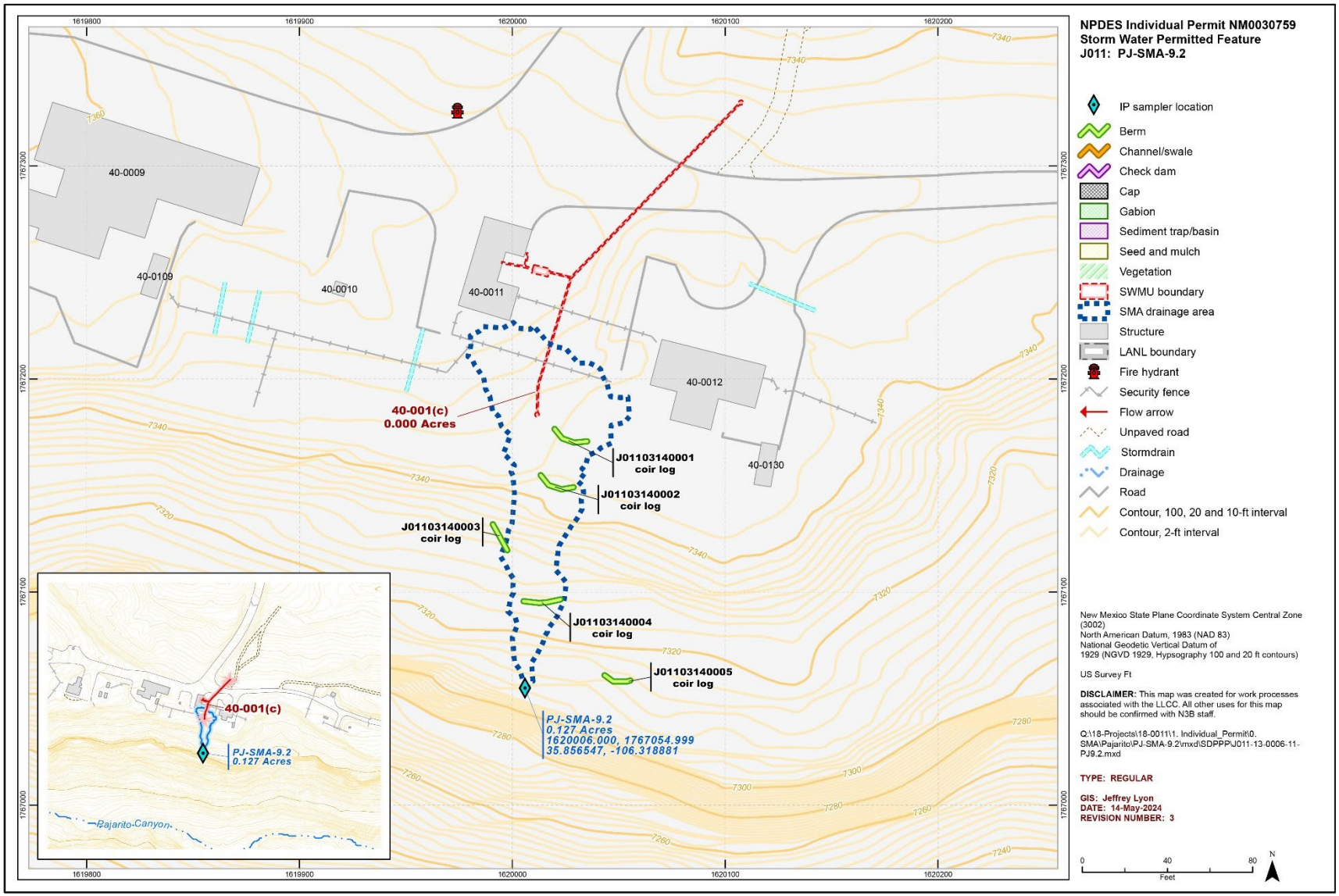

Figure 150-1 PJ-SMA-9.2 location map

151.0 PJ-SMA-10: SWMU 40-006(a)

One historical industrial activity area, Site 40-006(a), is associated with PJ-SMA-10 (permitted feature J012). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

151.1 Site Descriptions

40-006(a) (N3B 2025, 703889)

SWMU 40-006(a) consists of a firing site (structure 40-15) located at TA-40 on the northern rim of Pajarito Canyon, at the east end of TD Site Road.

The SWMU 40-006(a) firing site consists of a reinforced-concrete and steel building that allows observation of the test shots, a partially protected area on the south side of the building where shots are prepared, and an open firing pad connected to the south of the building where larger shots are fired. Since 1950, this firing site has been used to test and develop detonators. Tests conducted at this site include detonator booster tests, which use up to 2 lb of explosives, and large open-air shots, which could use up to 50 lb of explosives (LANL 993, 026068, pp. 5–79). After each shot, large pieces of debris are removed and disposed of, the open area is graded, and the sand and debris are pushed to the edge of the canyon. This practice created a sand berm near the canyon edge. Building 40-15 also served as the remote-control point for the SWMU 40-003(a) detonation sites.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 151-1.

Table 151-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-006(a)	Active firing site	Barium, copper, lead, thallium, PAHs, and HE

151.2 Control Measures

All active control measures in use at PJ-SMA-10 are listed in Table 151-2. Their locations are shown on the project map (Figure 151-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 151-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01203040032	Asphalt berm	X	-	-	X	10-8-2018
J01204030030	Rock channel/swale	-	X	-	X	9-22-2015
J01204040034	Culvert	-	X	-	X	10-8-2018
J01205020033	Sediment basin	-	X	-	X	10-8-2018
J01206010011	Rock check dam	-	X	-	X	9-22-2015

Table 151-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01206010012	Rock check dam	-	X	-	X	9-22-2015
J01206010013	Rock check dam	-	X	-	X	9-22-2015
J01206010014	Rock check dam	-	X	-	X	9-22-2015
J01206010015	Rock check dam	-	X	-	X	9-22-2015
J01206010017	Rock check dam	-	X	-	X	9-22-2015
J01206010021	Rock check dam	X	-	-	X	9-22-2015
J01206010022	Rock check dam	X	-	-	X	9-22-2015
J01206010023	Rock check dam	X	-	-	X	9-22-2015
J01206010024	Rock check dam	X	-	-	X	9-22-2015
J01206010025	Rock check dam	X	-	-	X	9-22-2015
J01206010026	Rock check dam	X	-	-	X	9-22-2015
J01206010031	Rock check dam	-	X	-	X	9-22-2015

151.3 Inspections and Maintenance

PJ-SMA-10 was in long-term stewardship in 2025, subject to inspection requirements outlined in the Permit Part I.B.8.c. Rain gage RG-TA-06 did not record a 3-yr, 24-hr storm event in 2025, so no post-storm inspections were required. All other control measure inspections conducted at PJ-SMA-10 are summarized in Table 151-3. No maintenance activities or facility modifications were conducted at the SMA in 2025.

Table 151-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Long-Term Stewardship	BMP-114611	10-2-2025	No deficiency noted.

151.4 Stormwater Monitoring

151.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on July 7, 2014. Analytical results from this sample yielded TAL exceedances for copper (16.8 µg/L) and gross-alpha activity (280 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2014, NPDES Permit No. NM0030759" (LANL 2015, 600241).

In the initial SIP (N3B 2023, 702792; EPA 2023, 704169) for the 2022 Permit, PJ-SMA-10 screened into Long-Term Stewardship status per Permit Part 1.C.3, effective July 5, 2023.

151.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was not conducted at PJ-SMA-10 in 2025. The SMA was in Long-Term Stewardship status, as discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

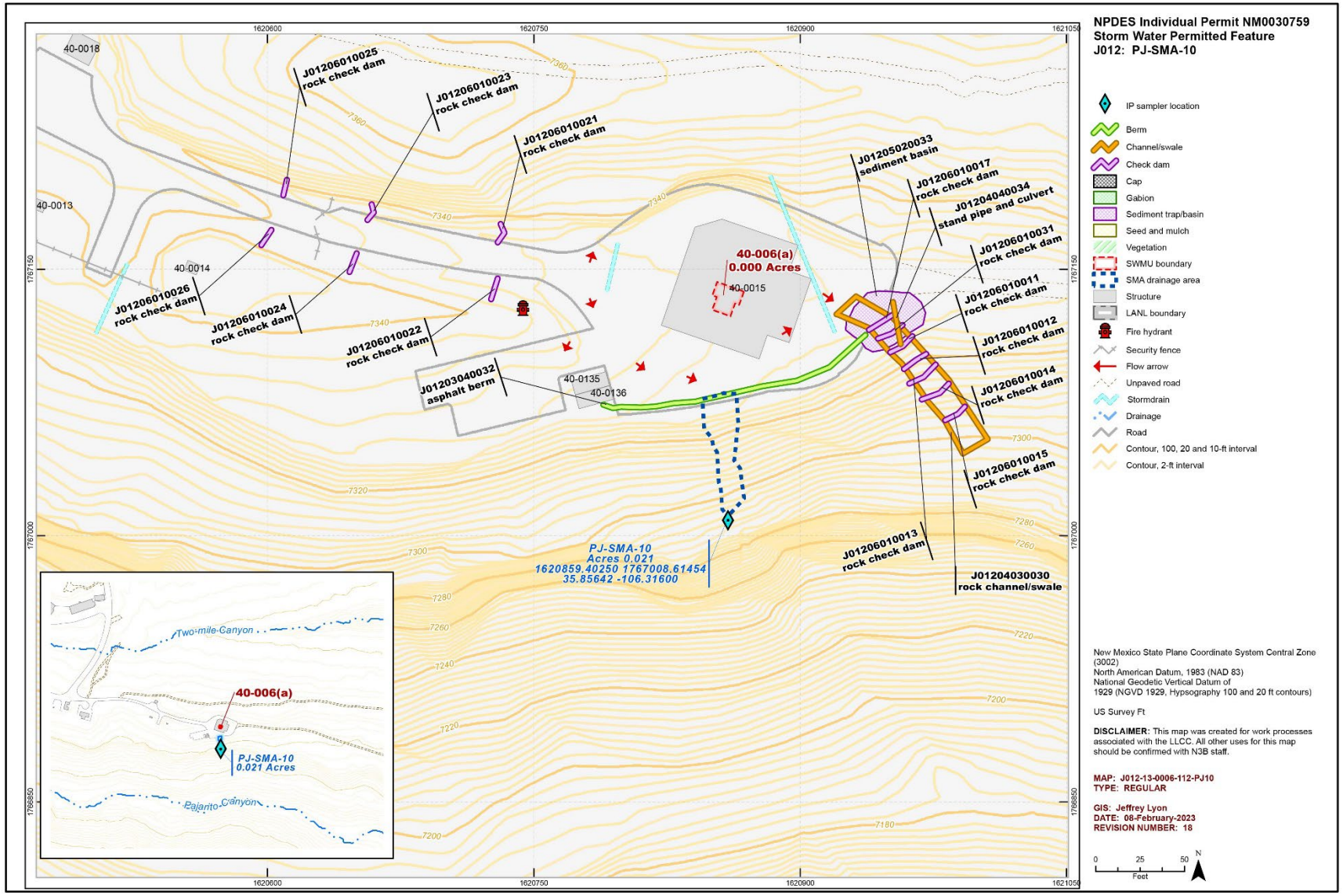

Figure 151-1 PJ-SMA-10 location map

152.0 PJ-SMA-11: SWMU 40-003(a)

One historical industrial activity area, Site 40-003(a), is associated with PJ-SMA-11 (permitted feature J013). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

152.1 Site Descriptions

40-003(a) (N3B 2025, 703889)

SWMU 40-003(a) consists of two former detonation sites at TA-40. The first site was located approximately 450 ft east of structure 40-15. The detonation area is roughly circular and approximately 30 ft in diameter. Use of the site for disposal of scrap HE and detonators began in the early 1950s; detonations were remotely controlled from structure 40-15. In 1958, several instances occurred where intact detonators and pieces of HE were released during detonations. Efforts to recover all the scattered detonators and HE were unsuccessful. Detonation activities at the first site ceased in the early 1960s, when a second open detonation site was developed at a location further to the east.

The second former detonation site was located approximately 1300 ft east of structure 40-15, within a natural amphitheater at the end of an unnamed dirt road. At the second site, scrap explosive materials were detonated and controlled remotely from structure 40-15. The detonation area measured approximately 90 ft (east-west) × 110 ft (north-south). After each detonation, scattered debris was picked up and transported to an appropriate waste disposal site. Rock rubble and crushed tuff that sloughed from the amphitheater wall was pushed to the south, creating an area of fill that extended nearly to the edge of Pajarito Canyon. The second detonation site was later operated under RCRA interim status. All detonation operations ceased in 1985. The interim status open detonation area underwent RCRA closure from 1992 to 1994. The closure report was approved by NMED in August 1995.

The 1990 SWMU Report (LANL 1990, 007513) and the Operable Unit 1111 RCRA RFI Work Plan (LANL 1993, 026068) both describe SWMU 40-003(a) as being located 450 ft east of structure 40-15 and state that a RCRA closure plan was being developed for the Site. Both documents mistakenly identify the location 450 ft east of structure 40-15 as undergoing RCRA closure. The 1991 Final Closure Plan (LANL 1991, 007653) developed for the second detonation site located 1300 ft east of structure 40-15 specifically states that the first detonation site located 450 ft east of structure 40-15 would not be addressed under RCRA closure. The first detonation site was omitted from the closure because its period of use occurred prior to RCRA regulation; therefore, the Site is subject to Consent Order requirements.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 152-1.

Table 152-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-003(a)	Scrap burn site/open detonation	Barium, lead, thallium, PAHs, and HE

152.2 Active Control Measures

All active control measures in use at PJ-SMA-11 are listed in Table 152-2. Their locations are shown on the project map (Figure 152-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

In 2025, changes were made to the list of existing control measures associated with the SMA that are not associated with corrective action. More information is provided in Attachment 1, located at the end of this volume.

Table 152-2 Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01302040018	Established vegetation	-	X	X	-	5-7-2013
J01303010024	Earthen berm	-	X	-	X	3-4-2015
J01303010025	Earthen berm	-	X	-	X	3-4-2015
J01303010026	Earthen berm	-	X	-	X	3-4-2015
J01303010027	Earthen berm	-	X	-	X	3-4-2015
J01303120030	Rock berm	-	X	X	X	1-21-2021
J01303140029	Coir log	X	-	-	X	12-2-2015
J01303140031	Coir log	X	-	-	X	1-21-2021
J01303200033	Compost log	-	X	-	X	4-13-2022
J01303210032	Coir roll	X	-	-	X	1-21-2021
J01304030034	Rock channel/swale	-	X	X	-	4-13-2022

152.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-11 during the 2025 season, so no post-storm inspections were required. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

152.4 Stormwater Monitoring

152.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on September 13, 2013. Analytical results from this sample yielded TAL exceedances for copper (42.9 µg/L) and gross-alpha activity (65.4 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

Following the 2015 installation of enhanced control measures, corrective-action stormwater samples were collected on August 10, 2018, and July 2, 2019. Analytical results from these samples yielded TAL exceedances for copper (28 µg/L and 92.7 µg/L), gross-alpha activity (164 pCi/L and 108 pCi/L), and selenium (5.48 µg/L). Selenium exceeded the TAL in the 2018 sample, but not in the 2019 sample. As both corrective-action samples are used to calculate the geomean, the geomean is less than the ATAL and thus not considered a TAL exceedance in corrective-action monitoring. The complete analytical

results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2018, NPDES Permit No. NM0030759" (N3B 2019, 700320) and "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2019, NPDES Permit No. NM0030759" (N3B 2020, 700767).

Following the 2021 installation of enhanced control measures, corrective-action stormwater samples were collected on June 27 and August 26, 2021. Analytical results from these samples yielded TAL exceedances for copper (35.3 µg/L and 42.8 µg/L) and gross-alpha activity (18.8 pCi/L and 157 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2021, NPDES Permit No. NM0030759" (N3B 2022, 701895).

152.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-11 from March 24 through October 27, 2025, resulting in a monitoring season of 217 days. Eight inspections performed during the monitoring period are summarized in Table 152-4. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no periods of sampler inoperability were encountered.

Table 152-3 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111490	5-6-2025	No	5-4-2025 5-5-2025	0.38/1.08 0.15/0.6
SMPLR-111714	6-16-2025	No	5-6-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.03/0.12 0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112470	6-27-2025	No	6-24-2025 6-26-2025	0.28/0.64 0.17/0.19
SMPLR-112848	8-14-2025	No	6-27-2025 6-30-2025 7-7-2025 7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025	0.08/0.12 0.09/0.11 0.23/0.29 0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16
SMPLR-113719	8-20-2025	No	8-19-2025	0.47/0.51

Table 152-3 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113883	9-8-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025	0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37
SMPLR-114317	10-21-2025	No	9-12-2025 9-13-2025 9-27-2025 9-28-2025 10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13 0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44
SMPLR-114954	10-27-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

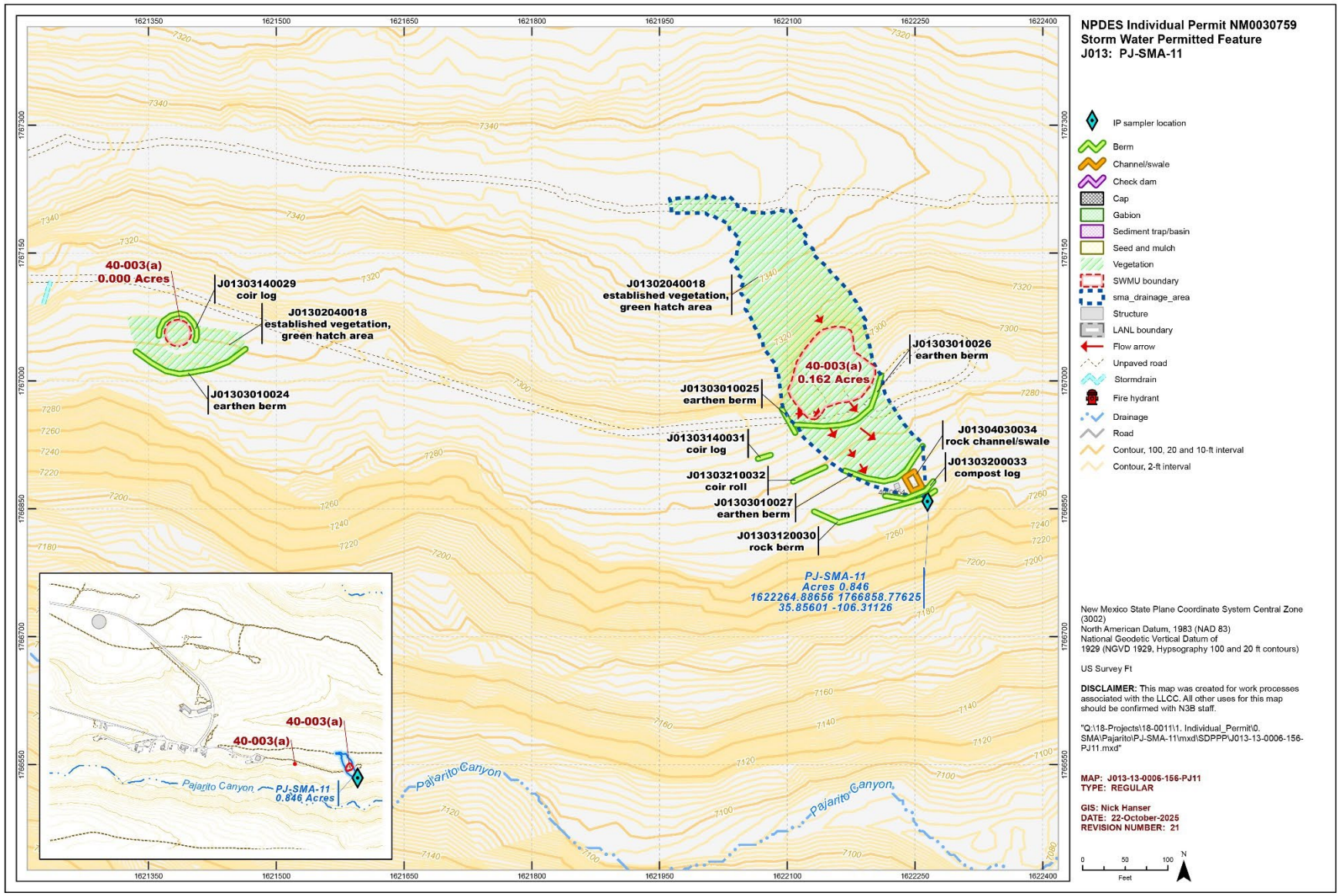

Figure 152-1 PJ-SMA-11 location map

153.0 PJ-SMA-11.1: AOC 40-003(b)

One historical industrial activity area, Site 40-003(b), is associated with PJ-SMA-11.1 (permitted feature J014). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

153.1 Site Descriptions

40-003(b) (N3B 2025, 703889)

AOC 40-003(b) consists of a former burn site located approximately 1400 ft east of building 40-15 at TA-40. The Site is adjacent to the second former open detonation site associated with SWMU 40-003(a). The burn site consists of three former small burning areas (burn cage locations) and a burn pit. Materials burned consisted of HE-contaminated combustibles, including rags, paper, wood, and glassware. From 1960 to 1985, a wire burn cage measuring 4 ft wide × 4 ft long × 5 ft high and equipped with a steel-plate floor was used at three different locations. The burn cage was used to contain burning materials and to prevent wastes from being windblown before and during burning activities. Kerosene was poured over the stacked waste, and burning was initiated with the use of explosive detonators fired remotely from building 40-15. The burn cage locations operated as a hazardous waste thermal treatment unit under RCRA interim status from 1980 until operations ceased in 1985. The burn cage locations underwent RCRA closure from 1992 to 1994. The closure report was approved by NMED in August 1995 (LANL 1991, 007653; NMED 1995, 065408).

The former burn pit was located between the two former northern burn cage locations and measured approximately 12 ft wide × 50 ft long × 12 ft deep. Burn pit operations began in 1961 and ceased sometime before 1977. Aerial photographs showed that the entire area, including the burn pit, had been backfilled and covered by 1976. The burn pit was omitted from the RCRA closure because its period of use occurred before 1980 and, therefore, before RCRA regulation was established.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 153-1.

Table 153-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
40-003(b)	Burning area	Barium, lead, thallium, tungsten, dioxins/furans, PAHs, and HE

153.2 Control Measures

All active control measures in use at PJ-SMA-11.1 are listed in Table 153-2. Their locations are shown on the project map (Figure 153-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Enhanced controls were certified on September 17, 2025, and submitted to EPA on September 18, 2025, as part of corrective action, as described in "NPDES Permit No. NM0030759 - Certification of Installation of Enhanced Control Measures for LA-SMA-3.1 and PJ-SMA-11.1" (N3B 2025, 703907). Photographs of the enhanced controls are available at https://ext.em-la.doe.gov/IPS/Home/ConstructionCertifications.

Table 153-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01402040015	Established vegetation	-	X	X	-	5-7-2013
J01403010020	Earthen berm	-	X	-	X	3-4-2015
J01403010021	Earthen berm	-	X	-	X	3-4-2015
J01403010022	Earthen berm	-	X	-	X	3-4-2015
J01403010023	Earthen berm	-	X	-	X	3-4-2015
J01403210024	Coir roll	-	X	X	X	7-15-2025
J01403210025	Coir roll	-	X	X	X	7-15-2025
J01406010007	Rock check dam	-	X	-	X	11-16-2009
J01406010008	Rock check dam	-	X	-	X	11-16-2009
J01406010009	Rock check dam	-	X	-	X	11-16-2009

153.3 Inspections and Maintenance

Rain gage RG-TA-06 did not record any storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-11.1 during the 2025 season, so no post-storm inspections were required. All other control measure inspections conducted at PJ-SMA-11.1 are summarized in Table 153-4. No maintenance activities or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 153-3 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Control Measure Verification	BMP-113147	7-16-2025	Control installation is satisfactory, certification documentation for installation of enhanced controls as a corrective action can be prepared.

153.4 Stormwater Monitoring

153.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on September 13, 2013. Analytical results from this sample yielded TAL exceedances for aluminum (1040 µg/L), copper (20.9 µg/L), and gross-alpha activity (89.4 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

Following the installation of enhanced control measures, a corrective-action stormwater sample was collected on August 26, 2021. Analytical results from this sample yielded TAL exceedances for copper (37.6 µg/L) and gross-alpha activity (132 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2021, NPDES Permit No. NM0030759" (N3B 2022, 701895).

153.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-11.1 from March 24 through October 27, 2025, resulting in a monitoring season of 217 days. Eight inspections performed during the monitoring period are summarized in Table 153-4. Rain gage RG-TA-06 recorded 37 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no periods of sampler inoperability were encountered. Soil disturbance associated with enhanced control installation was not significant and did not require shutdown of the sampling equipment at this SMA.

Table 153-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111159	5-6-2025	No	5-4-2025 5-5-2025	0.38/1.08 0.15/0.6
SMPLR-111711	6-16-2025	No	5-6-2025 5-31-2025 6-2-2025 6-3-2025 6-4-2025 6-9-2025 6-12-2025	0.03/0.12 0.2/0.35 0.13/0.2 0.09/0.33 0.12/0.24 0.06/0.17 0.11/0.15
SMPLR-112466	6-27-2025	No	6-24-2025 6-26-2025	0.28/0.64 0.17/0.19
SMPLR-112846	8-14-2025	No	6-27-2025 6-30-2025 7-7-2025 7-17-2025 7-18-2025 7-21-2025 7-23-2025 7-30-2025 7-31-2025	0.08/0.12 0.09/0.11 0.23/0.29 0.07/0.1 0.1/0.26 0.23/0.53 0.17/0.25 0.18/0.26 0.19/0.16
SMPLR-113717	8-20-2025	No	8-19-2025	0.47/0.51
SMPLR-113876	9-8-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025 9-5-2025 9-6-2025	0.12/0.78 0.22/0.6 0.07/0.56 0.08/0.17 0.21/0.36 0.27/0.59 0.17/0.37

Table 153-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-114314	10-21-2025	No	9-12-2025 9-13-2025 9-27-2025 9-28-2025 10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.05/0.1 0.04/0.13 0.17/0.4 0.07/0.13 0.08/0.14 0.05/0.1 0.05/0.15 0.1/0.78 0.16/0.44
SMPLR-114953	10-27-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

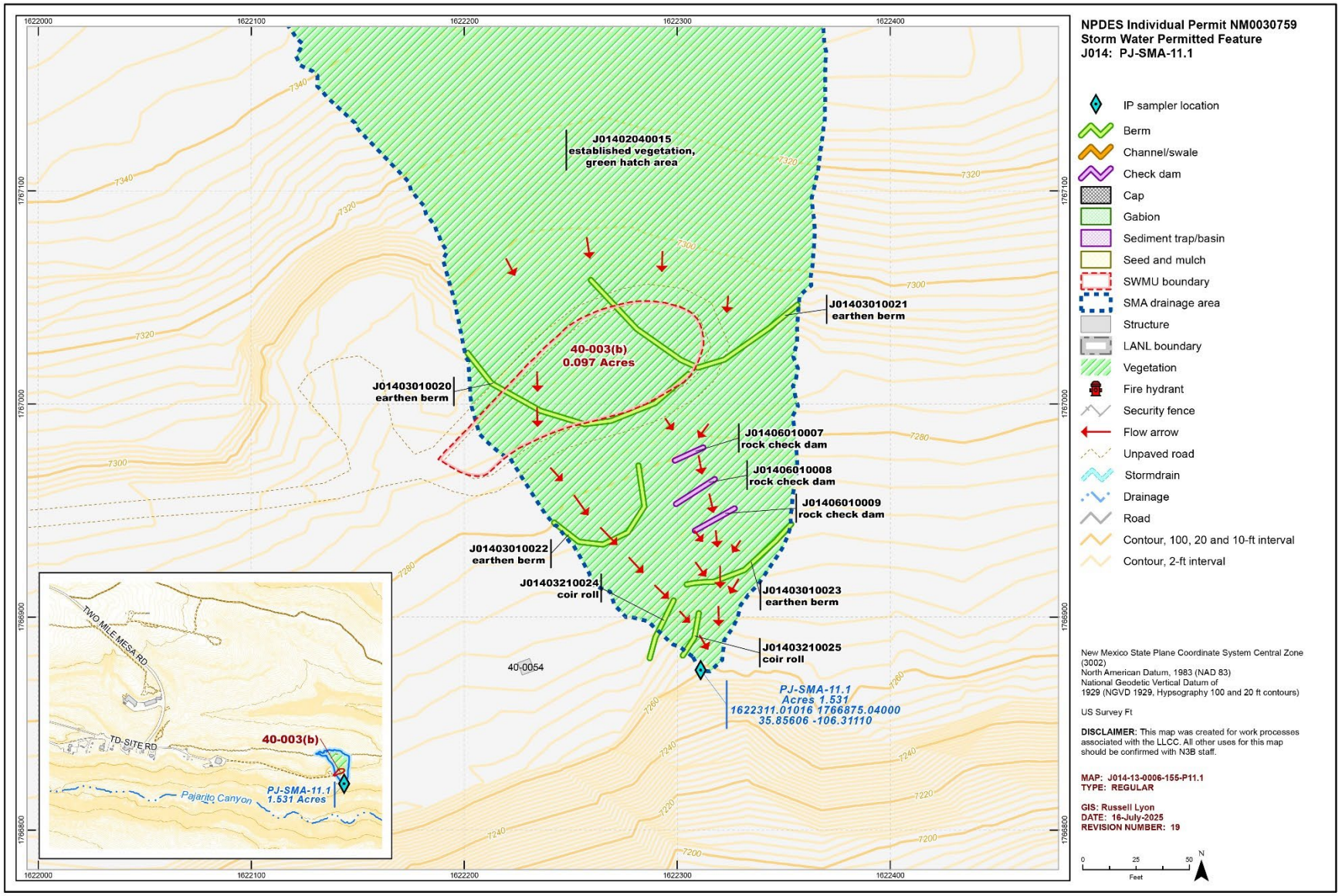

Figure 153-1 PJ-SMA-11.1 location map

154.0 PJ-SMA-13.7: AOC 18-010(b)

One historical industrial activity area, Site 18-010(b), is associated with PJ-SMA-13.7 (permitted feature J016). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

154.1 Site Descriptions

18-010(b) (1/5/2018)

AOC 18-010(b) is an outfall that receives stormwater runoff from an asphalt-paved drainage ditch running southward along the west side of the paved area, west of former building 18-30 in TA-18. The outfall discharges to a flat, grassy area at the fence southwest of former building 18-30. The discharge point is approximately 25 ft north of the stream channel in Pajarito Canyon (AOC C-00-011). The date this outfall became operational is unknown, but it is likely that the outfall has been operational from the time former building 18-30 was constructed in 1951.

Former building 18-30 served as the main administrative building at TA-18 and was constructed in 1951. Building 18-30 also housed three control rooms with systems for remote nuclear criticality research, a welding shop, machine shops, laboratory space, darkrooms (Rooms 120A and 120B) with floor drains and piping to an outfall [SWMU 18-012(b)]. No radioactive liquids were ever present in former building 18-30. Building 18-30 underwent D&D in 2011 and 2012.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 154-1.

Table 154-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
18-010(b)	Outfall	Lead and uranium

154.2 Control Measures

All active control measures in use at PJ-SMA-13.7 are listed in Table 154-2. Their locations are shown on the project map (Figure 154-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 154-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01602040011	Established vegetation	-	X	X	-	5-2-2013
J01605020008	Sediment basin	-	X	-	X	1-22-2013
J01605020009	Sediment basin	-	X	-	X	1-22-2013
J01606010007	Rock check dam	X	-	-	X	5-3-2010
J01607010002	Gabion	-	X	X	-	6-1-2009
J01608030010	Concrete/asphalt cap	-	X	-	-	5-28-2013

154.3 Inspections and Maintenance

Rain gage RG245.5 recorded two storm rain events (0.50 in. or more occurring within 30 min) at PJ-SMA-13.7 during the 2025 season, requiring two post-storm inspections, summarized in Table 154-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 154-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112911	6-30-2025	0.59	7-10-2025	10	Yes
BMP-113385	7-23-2025	0.55	8-1-2025	9	Yes

154.4 Stormwater Monitoring

154.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on September 1, 2011. Analytical results from this sample yielded a TAL exceedance for gross-alpha activity (52.6 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

154.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-13.7 from April 17 through November 6, 2025, resulting in a monitoring season of 203 days. Eleven inspections performed during the monitoring period are summarized in Table 154-4. Rain gage RG245.5 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 154-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111467	5-12-2025	No	5-4-2025 5-5-2025 5-6-2025 5-9-2025	0.3/1.21 0.25/0.73 0.19/0.55 0.21/0.21
SMPLR-111868	6-9-2025	No	6-2-2025 6-3-2025 6-4-2025	0.36/0.44 0.09/0.31 0.07/0.25
SMPLR-112370	6-26-2025	No	6-24-2025	0.42/0.79
SMPLR-112804	7-8-2025	No	6-30-2025	0.59/0.06
SMPLR-113101	7-28-2025	No	7-18-2025 7-23-2025	0.1/0.15 0.55/0.59
SMPLR-113443	8-8-2025	No	7-30-2025	0.2/0.35

Table 154-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113658	8-27-2025	No	8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.15/0.17 0.12/0.7 0.19/0.39 0.41/0.82 0.13/0.23
SMPLR-114133	9-9-2025	No	9-4-2025 9-5-2025 9-6-2025	0.24/0.24 0.13/0.43 0.03/0.11
SMPLR-114348	9-29-2025	No	9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.06/0.26 0.03/0.1 0.07/0.25 0.15/0.26
SMPLR-114641	10-17-2025	No	10-11-2025 10-13-2025 10-15-2025	0.05/0.11 0.12/0.72 0.09/0.15
SMPLR-114920	11-6-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

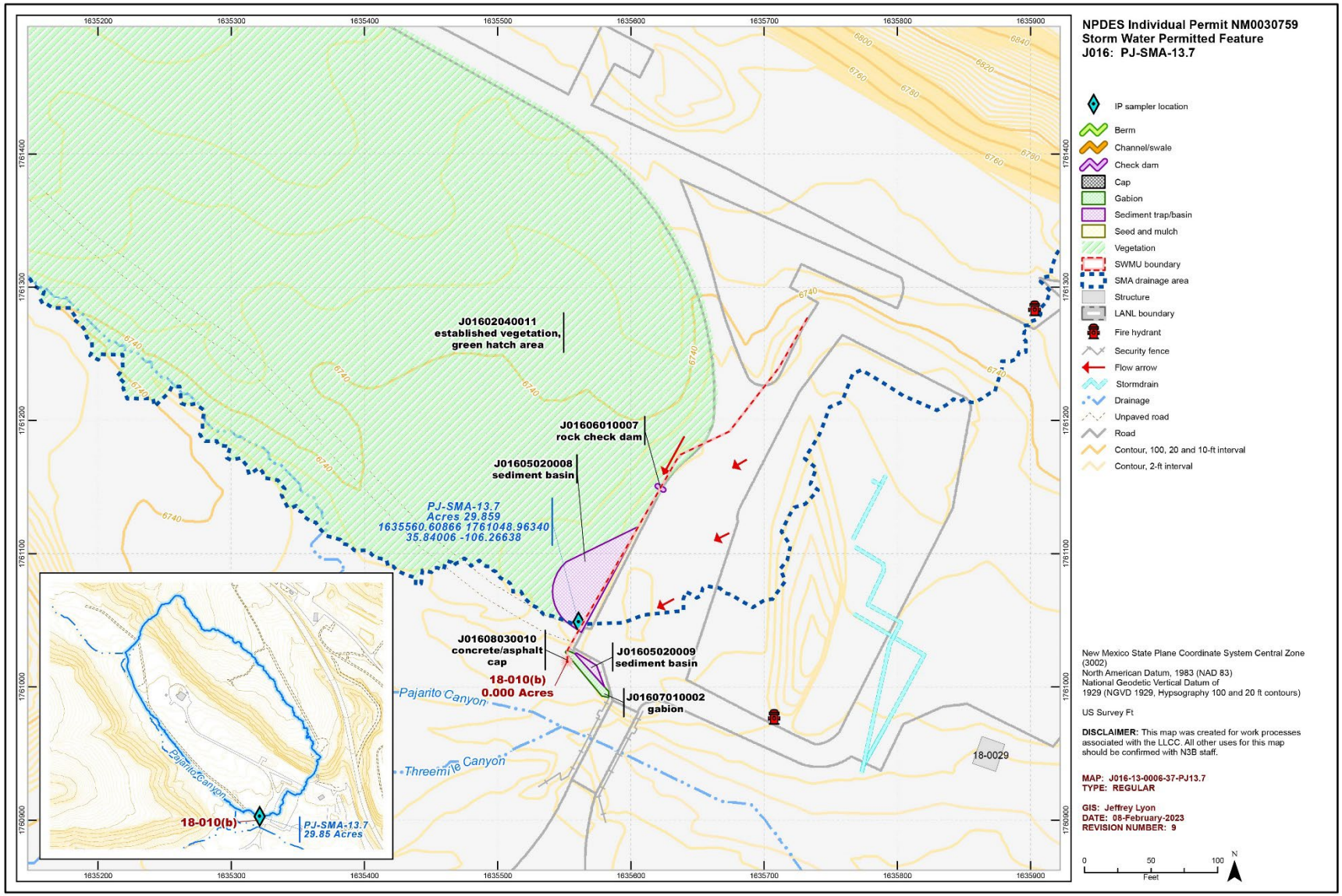

Figure 154-1 PJ-SMA-13.7 location map

155.0 PJ-SMA-14.2: SWMU 18-012(b)

One historical industrial activity area, Site 18-012(b), is associated with PJ-SMA-14.2 (permitted feature J018). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

155.1 Site Descriptions

18-012(b) (12/6/2017)

SWMU 18-012(b) is a former outfall that received discharge from several sources in former buildings 18-30 and 18-31 at TA-18. The outfall is located south of former building 18-31 approximately 20 ft north of the main drainage channel in Pajarito Canyon (AOC C-00-011), and was active from the early 1950s, when the buildings were constructed until they were decommissioned in 2008. The outfall received discharges from an associated sump [SWMU 18-001(c)], floor drains, sinks, stormwater from the east-wing roof of former building 18-31, and a welding quench tank in former building 18-30. The outfall also received discharges from machine shop floor drains and stormwater from the roof of former building 18-31. Discharge from both buildings was transported to the outfall via a series of 4-in. polyethylene pipes connected to the sources within the buildings. The drainline that previously exited the southeast corner of former building 18-31 flowed into the SWMU 18-003(e) septic system and was not associated with SWMU 18-012(b).

Former building 18-30 served as the main administrative building at TA-18 and was constructed in 1951. Building 18-30 also housed three control rooms with systems for remote nuclear criticality research, a welding shop, machine shops, laboratory space, and darkrooms. Former building 18-31 was the main utility building for TA-18 and was constructed in 1952. Buildings 18-30 and 18-31 underwent D&D in 2011 and 2012.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 155-1.

Table 155-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
18-012(b)	Outfall	Beryllium, silver, cyanide, polonium, and uranium

155.2 Control Measures

All active control measures in use at PJ-SMA-14.2 are listed in Table 155-2. Their locations are shown on the project map (Figure 155-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 155-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01802040005	Established vegetation	-	X	X	-	5-2-2013
J01803060007	Straw wattle	X	-	-	X	8-29-2022
J01803120004	Rock berm	-	X	-	X	5-3-2010

155.3 Inspections and Maintenance

Rain gage RG245.5 recorded two storm rain events (0.50 in. or more occurring within 30 min) at PJ-SMA-14.2 during the 2025 season, requiring two post-storm inspections, summarized in Table 155-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 155-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112912	6-30-2025	0.59	7-10-2025	10	Yes
BMP-113386	7-23-2025	0.55	8-1-2025	9	Yes

155.4 Stormwater Monitoring

155.4.1 Previous Stormwater Monitoring Results

Following baseline certification, a confirmation-monitoring sample was collected on July 2, 2024. Analytical results from this sample yielded no TAL exceedances. The complete analytical results are presented in Appendix B of the Overview and in "2024 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit no. NM0030759" (N3B 2025, 703800); and in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814); and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

155.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-14.2 from April 11 through November 3, 2025, resulting in a monitoring season of 206 days. Nine inspections performed during the monitoring period are summarized in Table 155-4. Rain gage RG245.5 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 155-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111366	5-12-2025	No	5-4-2025 5-5-2025 5-6-2025 5-9-2025	0.3/1.21 0.25/0.73 0.19/0.55 0.21/0.21
SMPLR-111863	5-21-2025	No	None	None
SMPLR-111988	6-9-2025	No	6-2-2025 6-3-2025 6-4-2025	0.36/0.44 0.09/0.31 0.07/0.25
SMPLR-112366	6-26-2025	No	6-24-2025	0.42/0.79
SMPLR-112790	7-8-2025	No	6-30-2025	0.59/0.06
SMPLR-113091	7-28-2025	No	7-18-2025 7-23-2025	0.1/0.15 0.55/0.59
SMPLR-113435	9-2-2025	No	7-30-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.2/0.35 0.15/0.17 0.12/0.7 0.19/0.39 0.41/0.82 0.13/0.23
SMPLR-114206	9-22-2025	No	9-4-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025	0.24/0.24 0.13/0.43 0.03/0.11 0.06/0.26 0.03/0.1
SMPLR-114531	11-3-2025	No	9-27-2025 9-28-2025 10-11-2025 10-13-2025 10-15-2025	0.07/0.25 0.15/0.26 0.05/0.11 0.12/0.72 0.09/0.15

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

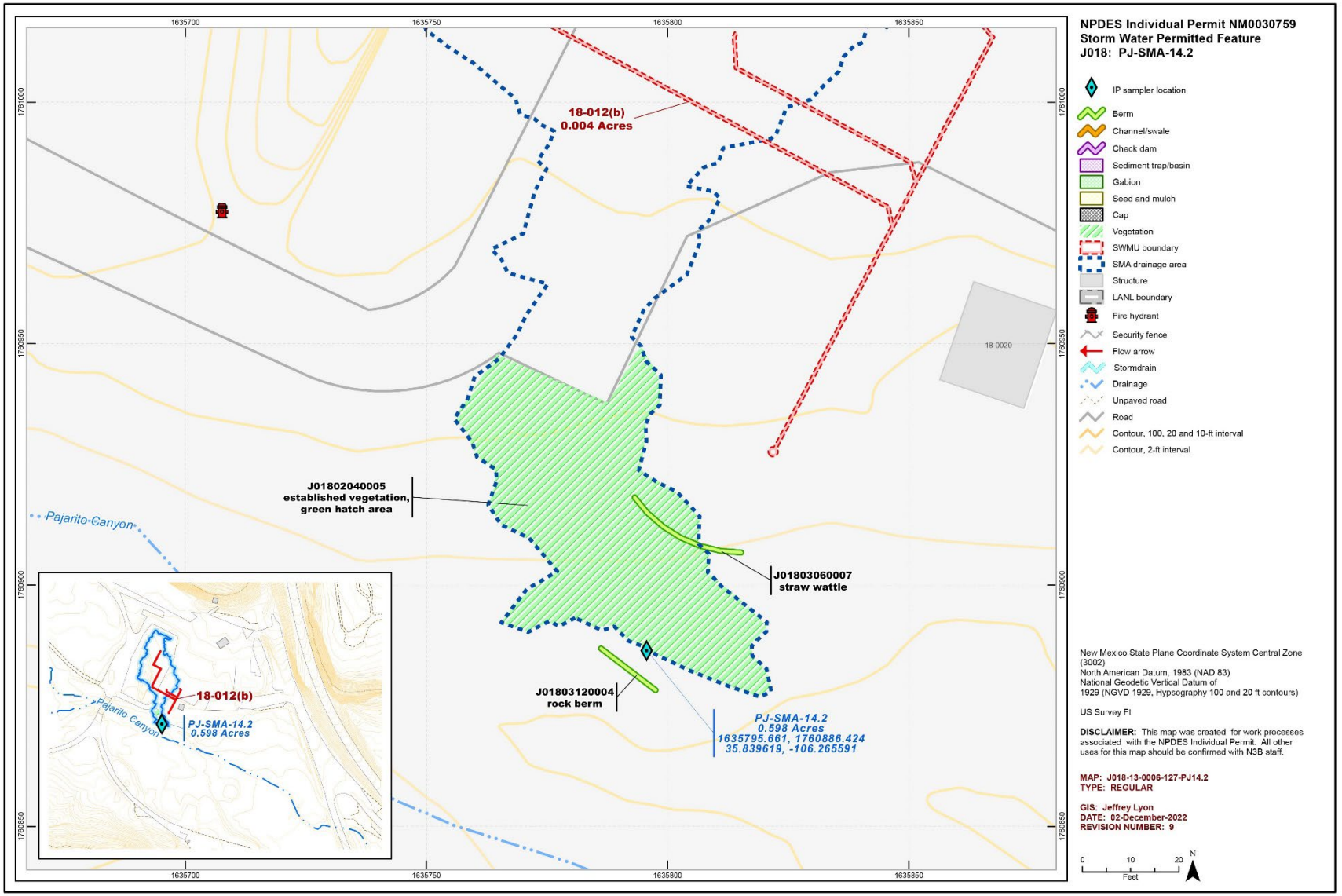

Figure 155-1 PJ-SMA-14.2 location map

156.0 PJ-SMA-14.3: SWMU 18-003(e)

One historical industrial activity area, Site 18-003(e), is associated with PJ-SMA-14.3 (permitted feature J019). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

156.1 Site Descriptions

18-003(e) (1/5/2018)

SWMU 18-003(e) is an inactive septic system consisting of a cylindrical septic tank (structure 18-40), inlet and outlet drainlines, a drain field, and a former outfall at TA-18. The septic tank is located approximately 50 ft southwest of former building 18-37 and approximately 50 ft east of building 18-29 (a historical log cabin). The septic tank is constructed of reinforced concrete and measures 6 ft in diameter × 6 ft deep. The septic system received sanitary waste from former building 18-31 (a utility building), former building 18-37 (a guard tower), former building 18-129 (a reactor subassembly building), former building 18-189 (an electronics building for site security), and former building 18-190 (the main guard station for TA-18). While in operation from 1951 to 1969, the septic system may have also received industrial waste from a sink in former building 18-28 (a warehouse). Septic tanks associated with SWMUs 18-003(g) and 18-003(h) (structure 18-43 and structure 18-152, respectively) may have also discharged to this septic system.

Effluent from the septic tank was discharged through the outlet drainline to a drain field consisting of four drainlines, each of which is approximately 40 ft long. The drainlines, which are 10 ft apart, merge at the distal end of the drain field and continue an estimated 100 ft to the south to the former outfall in the Pajarito Canyon drainage channel (AOC C-00-011). In 1969, sanitary waste lines from the buildings listed above were connected to the TA-18 sewer system that routed effluent to the sanitary sewage lagoons [SWMUs 18-001(a) and 18-001(b)]. At that time, the septic tank was backfilled with sand.

Buildings 18-31, 18-37, 18-129, 18-189, and 18-190 underwent D&D in 2011 and 2012. Building 18-29, the historical log cabin near the SWMU 18-003(e) septic system, is considered a contributing historical building as part of the planned Manhattan Project National Historical Park and the septic system is located within the planned Manhattan Project National Historical Park boundary.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 156-1.

Table 156-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
18-003(e)	Septic system	Beryllium, chromium, silver, cyanide, organic chemicals, and uranium

156.2 Control Measures

All active control measures in use at PJ-SMA-14.3 are listed in Table 156-2. Their locations are shown on the project map (Figure 156-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 156-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J01902040003	Established vegetation	-	X	X	-	5-2-2013
J01903060007	Straw wattle	-	X	-	X	9-16-2021

156.3 Inspections and Maintenance

Rain gage RG245.5 recorded two storm rain events (0.50 in. or more occurring within 30 min) at PJ-SMA-14.3 during the 2025 season, requiring two post-storm inspections, summarized in Table 156-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 156-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112913	6-30-2025	0.59	7-10-2025	10	Yes
BMP-113387	7-23-2025	0.55	8-1-2025	9	Yes

156.4 Stormwater Monitoring

156.4.1 Previous Stormwater Monitoring Results

Through Calendar Year 2024, stormwater flow was not sufficient for sample collection at PJ-SMA-14.3.

156.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-14.3 from April 2 through November 3, 2025, resulting in a monitoring season of 215 days. Nine inspections performed during the monitoring period are summarized in Table 156-4. Rain gage RG245.5 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 156-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111241	5-13-2025	No	5-4-2025 5-5-2025 5-6-2025 5-9-2025	0.3/1.21 0.25/0.73 0.19/0.55 0.21/0.21
SMPLR-111887	6-5-2025	No	6-2-2025 6-3-2025 6-4-2025	0.36/0.44 0.09/0.31 0.07/0.25
SMPLR-112320	6-26-2025	No	6-24-2025	0.42/0.79
SMPLR-112791	7-2-2025	No	6-30-2025	0.59/0.06

Table 156-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-112992	7-28-2025	No	7-18-2025 7-23-2025	0.1/0.15 0.55/0.59
SMPLR-113436	8-27-2025	No	7-30-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.2/0.35 0.15/0.17 0.12/0.7 0.19/0.39 0.41/0.82 0.13/0.23
SMPLR-114126	9-2-2025	No	None	None
SMPLR-114207	9-22-2025	No	9-4-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025	0.24/0.24 0.13/0.43 0.03/0.11 0.06/0.26 0.03/0.1
SMPLR-114532	11-3-2025	No	9-27-2025 9-28-2025 10-11-2025 10-13-2025 10-15-2025	0.07/0.25 0.15/0.26 0.05/0.11 0.12/0.72 0.09/0.15

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

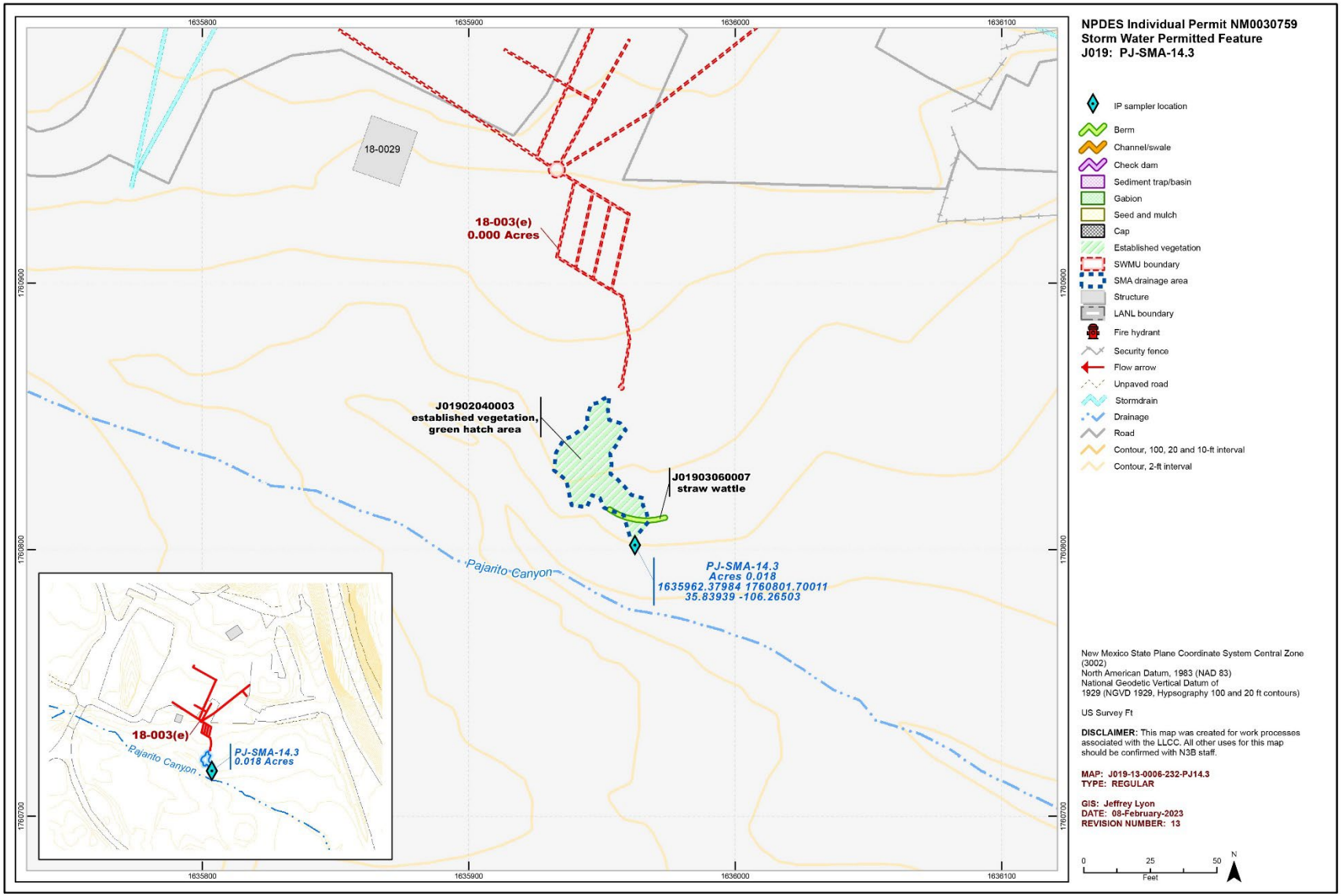

Figure 156-1 PJ-SMA-14.3 location map

157.0 PJ-SMA-14.4: AOC 18-010(d)

One historical industrial activity area, Site 18-010(d), is associated with PJ-SMA-14.4 (permitted feature J020). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

157.1 Site Descriptions

18-010(d) (1/5/2018)

AOC 18-010(d) is an outfall that receives discharge in the form of sheet flow from a storm drainage collection area that drains the paved area northeast of former building 18-37 at TA-18. The outfall discharges to a flat graveled and grassy area southeast of former building 18-37 and west of building 18-258. The discharge point is approximately 100 ft north of the stream channel in Pajarito Canyon (AOC C-00-011). The date this outfall became operational is unknown, but it is likely that the outfall has been operational from the time former building 18-37 was constructed in 1951.

Former building 18-37 was an inactive guard station, constructed between 1949 and 1951. The structure consisted of 10-in.-thick concrete walls on a concrete slab. Former building 18-37 underwent D&D in 2011 and 2012.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 157-1.

Table 157-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
18-010(d)	Outfall	Lead and uranium

157.2 Control Measures

All active control measures in use at PJ-SMA-14.4 are listed in Table 157-2. Their locations are shown on the project map (Figure 157-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 157-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02002040010	Established vegetation	-	X	X	-	5-2-2013
J02003010013	Earthen berm	-	X	-	X	1-4-2018
J02003140014	Coir log	X	-	X	-	8-29-2022

157.3 Inspections and Maintenance

Rain gage RG245.5 recorded two storm rain events (0.50 in. or more occurring within 30 min) at PJ-SMA-14.4 during the 2025 season, requiring two post-storm inspections, summarized in Table 157-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 157-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112914	6-30-2025	0.59	7-10-2025	10	Yes
BMP-113388	7-23-2025	0.55	8-4-2025	12	Yes

157.4 Stormwater Monitoring

157.4.1 Previous Stormwater Monitoring Results

Through Calendar Year 2024, stormwater flow was not sufficient for sample collection at PJ-SMA-14.4.

157.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-14.4 from April 2 through November 6, 2025, resulting in a monitoring season of 218 days. Eight inspections performed during the monitoring period are summarized in Table 157-4. Rain gage RG245.5 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 157-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111242	5-12-2025	No	5-4-2025 5-5-2025 5-6-2025 5-9-2025	0.3/1.21 0.25/0.73 0.19/0.55 0.21/0.21
SMPLR-111864	6-9-2025	No	6-2-2025 6-3-2025 6-4-2025	0.36/0.44 0.09/0.31 0.07/0.25
SMPLR-112367	6-26-2025	No	6-24-2025	0.42/0.79
SMPLR-112792	7-8-2025	No	6-30-2025	0.59/0.06
SMPLR-113092	7-29-2025	No	7-18-2025 7-23-2025	0.1/0.15 0.55/0.59

Table 157-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113469	9-2-2025	No	7-30-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.2/0.35 0.15/0.17 0.12/0.7 0.19/0.39 0.41/0.82 0.13/0.23
SMPLR-114208	9-29-2025	No	9-4-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.24/0.24 0.13/0.43 0.03/0.11 0.06/0.26 0.03/0.1 0.07/0.25 0.15/0.26
SMPLR-114638	11-6-2025	No	10-11-2025 10-13-2025 10-15-2025	0.05/0.11 0.12/0.72 0.09/0.15

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

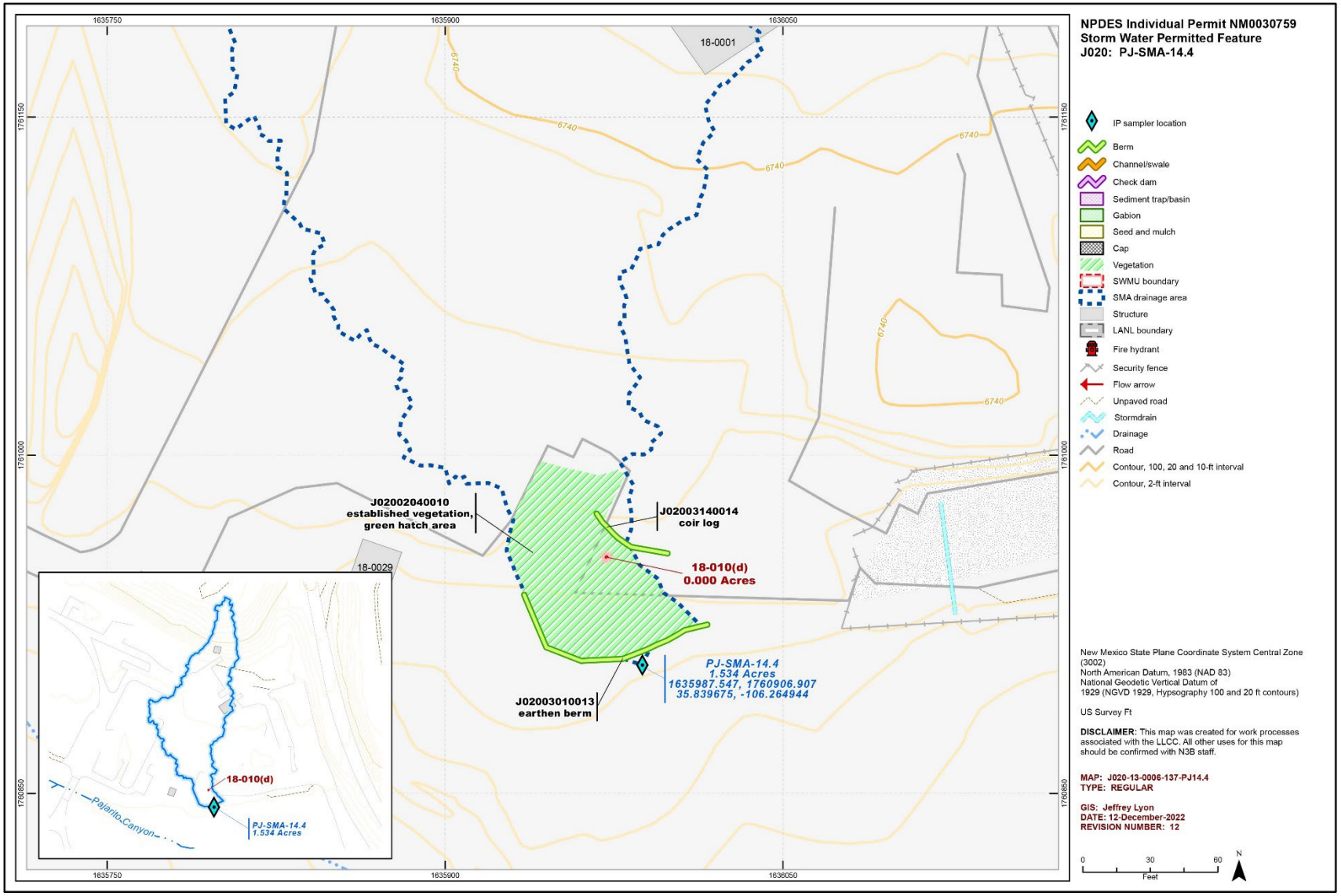

Figure 157-1 PJ-SMA-14.4 location map

158.0 PJ-SMA-14.6: AOC 18-010(e)

One historical industrial activity area, Site 18-010(e), is associated with PJ-SMA-14.6 (permitted feature J021). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

158.1 Site Descriptions

18-010(e) (9/6/2023)

AOC 18-010(e) is an outfall that receives discharge from a storm sewer drainage that drains the paved area between former building 18-28 and former building 18-147 at TA-18. The drainage enters a storm drain that runs southeast under the paved area west of former building 18-129 to a grating east of former building 18-190 and turns south. The drainage reaches the outfall south of former building 18-129 where stormwater is discharged to a small grassy gully leading to the main stream channel in Pajarito Canyon (AOC C-00-011). The outfall is located approximately 200 ft north of the Pajarito Canyon stream channel. The date this outfall became operational is unknown, but it is likely the outfall has been operational from the time former building 18-37 was constructed in 1951.

Former building 18-28 was a 40-ft × 110-ft prefabricated metal warehouse and was constructed between 1949 and 1950. One end of this building was offices. Radiation work was conducted in the middle of the building. Former building 18-37 was an inactive guard station, constructed between 1949 and 1951. The structure consisted of 10-in.-thick concrete walls on a concrete slab. Former building 18-129 was the reactor sub-assembly building, constructed in 1962. Fixed sources were stored in Room 4A along with lead; there were also eight holes 10-12 ft deep in the concrete floor of Room 4A that were previously used for fuel rod storage. Former building 18-190 was the main guard station for TA-18, constructed in 1985. An addition on the west side of the building housed sumps and hydraulic pumps for the vehicle access gate. All four buildings underwent D&D in 2011 and 2012.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 158-1.

Table 158-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
18-010(e)	Outfall	Lead and uranium

158.2 Control Measures

All active control measures in use at PJ-SMA-14.6 are listed in Table 158-2. Their locations are shown on the project map (Figure 158-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 158-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02102040008	Established vegetation	-	X	X	-	5-2-2013
J02103010005	Earthen berm	-	X	-	X	11-16-2011
J02104060007	Riprap	X	-	X	-	9-11-2012

158.3 Inspections and Maintenance

Rain gage RG245.5 recorded two storm rain events (0.50 in. or more occurring within 30 min) at PJ-SMA-14.6 during the 2025 season, requiring two post-storm inspections, summarized in Table 158-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 158-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112915	6-30-2025	0.59	7-10-2025	10	Yes
BMP-113389	7-23-2025	0.55	8-4-2025	12	Yes

158.4 Stormwater Monitoring

158.4.1 Previous Stormwater Monitoring Results

Through Calendar Year 2024, stormwater flow was not sufficient for sample collection at PJ-SMA-14.6.

158.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-14.6 from April 2 through November 3, 2025, resulting in a monitoring season of 215 days. Seven inspections performed during the monitoring period are summarized in Table 158-4. Rain gage RG245.5 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 158-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111243	5-13-2025	No	5-4-2025 5-5-2025 5-6-2025 5-9-2025	0.3/1.21 0.25/0.73 0.19/0.55 0.21/0.21
SMPLR-111888	6-26-2025	No	6-2-2025 6-3-2025 6-4-2025 6-24-2025	0.36/0.44 0.09/0.31 0.07/0.25 0.42/0.79

Table 158-4 Sampler Inspections during 2024 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-112793	7-8-2025	No	6-30-2025	0.59/0.06
SMPLR-113093	7-29-2025	No	7-18-2025 7-23-2025	0.1/0.15 0.55/0.59
SMPLR-113470	9-2-2025	No	7-30-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.2/0.35 0.15/0.17 0.12/0.7 0.19/0.39 0.41/0.82 0.13/0.23
SMPLR-114209	9-22-2025	No	9-4-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025	0.24/0.24 0.13/0.43 0.03/0.11 0.06/0.26 0.03/0.1
SMPLR-114533	11-3-2025	No	9-27-2025 9-28-2025 10-11-2025 10-13-2025 10-15-2025	0.07/0.25 0.15/0.26 0.05/0.11 0.12/0.72 0.09/0.15

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

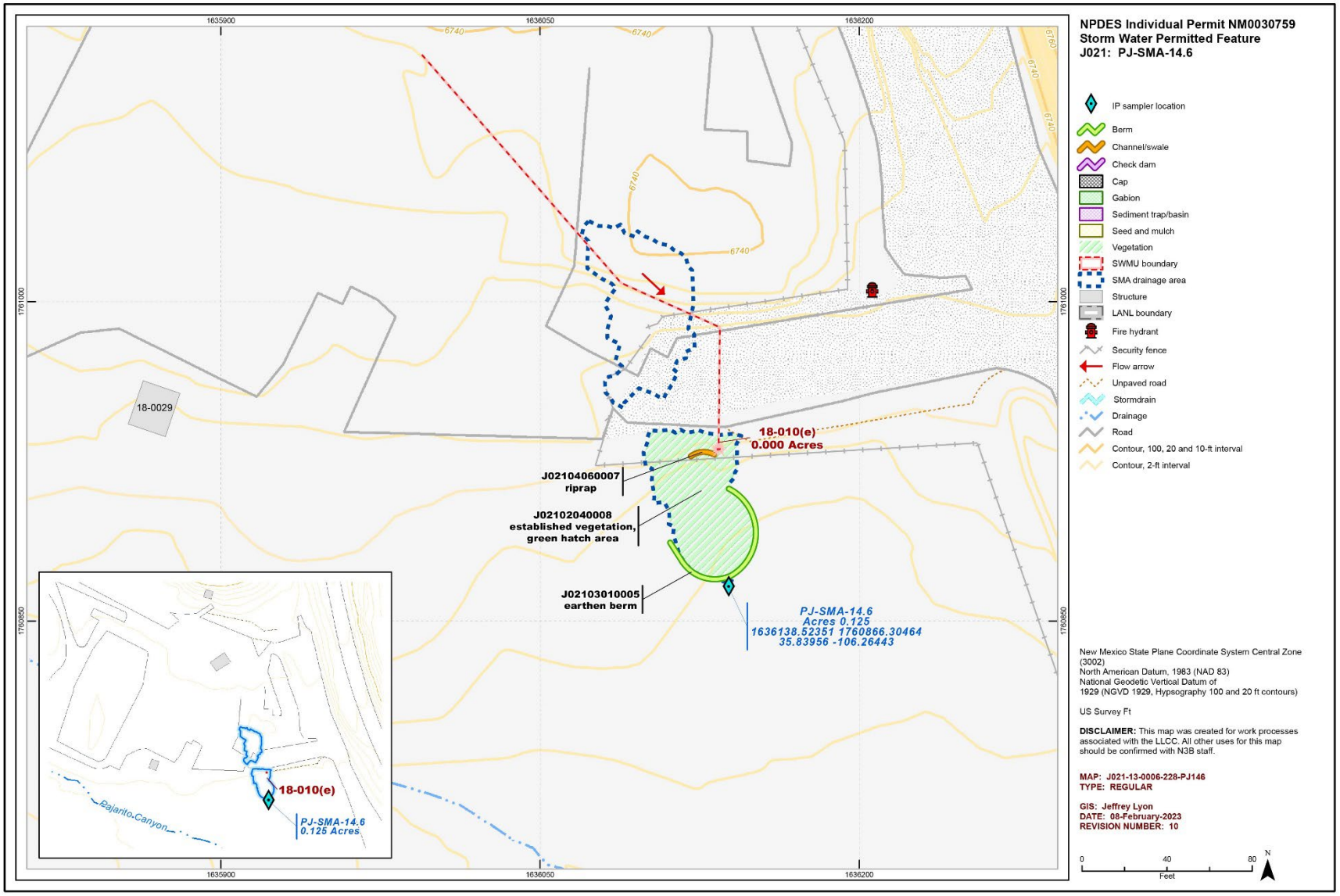

Figure 158-1 PJ-SMA-14.6 location map

159.0 PJ-SMA-14.8: SWMU 18-012(a)

One historical industrial activity area, Site 18-012(a), is associated with PJ-SMA-14.8 (permitted feature J022). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

159.1 Site Descriptions

18-012(a) (12/6/2017)

SWMU 18-012(a) is a former outfall for a combined industrial drain and storm sewer drain associated with former building 18-116 (Kiva 3) at TA-18. The drainlines that discharged to this outfall were connected to the building 18-116 roof drains, floor drains, and sinks. The outfall, identified during 1992 field inspections using a dye-trace test, is located approximately 120 ft northeast of former building 18-116 and approximately 150 ft from the main stream channel in Pajarito Canyon (AOC C-00-011). Former building 18-116 was constructed in 1960 and was used for uranium mockup tests for the Rover Program—a nuclear rocket propulsion program conducted at the Laboratory from 1955 to 1972. The date this outfall became operational is unknown, but it is likely that the outfall was used from the time building 18-116 was completed in 1960 until the building was decommissioned in 2008. Building 18-116 underwent D&D in 2011 and 2012.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 159-1.

Table 159-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
18-012(a)	Outfall	Beryllium, silver, plutonium-238, and uranium

159.2 Control Measures

All active control measures in use at PJ-SMA-14.8 are listed in Table 159-2. Their locations are shown on the project map (Figure 159-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 159-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02202040007	Established vegetation	-	X	X	-	5-2-2013
J02203060008	Straw wattle	-	X	-	X	11-6-2013

159.3 Inspections and Maintenance

Rain gage RG245.5 recorded two storm rain events (0.50 in. or more occurring within 30 min) at PJ-SMA-14.8 during the 2025 season, requiring two post-storm inspections, summarized in Table 159-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 159-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112916	6-30-2025	0.59	7-10-2025	10	Yes
BMP-113390	7-23-2025	0.55	8-4-2025	12	Yes

159.4 Stormwater Monitoring

159.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, baseline stormwater samples were collected on July 28 and August 18, 2011. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

159.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-14.8 from April 17 through November 6, 2025, resulting in a monitoring season of 203 days. Seven inspections performed during the monitoring period are summarized in Table 159-4. Rain gage RG245.5 recorded 27 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 159-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111466	5-13-2025	No	5-4-2025 5-5-2025 5-6-2025 5-9-2025	0.3/1.21 0.25/0.73 0.19/0.55 0.21/0.21
SMPLR-111889	6-26-2025	No	6-2-2025 6-3-2025 6-4-2025 6-24-2025	0.36/0.44 0.09/0.31 0.07/0.25 0.42/0.79
SMPLR-112794	7-8-2025	No	6-30-2025	0.59/0.06
SMPLR-113094	7-28-2025	No	7-18-2025 7-23-2025	0.1/0.15 0.55/0.59

Table 159-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113437	9-2-2025	No	7-30-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025	0.2/0.35 0.15/0.17 0.12/0.7 0.19/0.39 0.41/0.82 0.13/0.23
SMPLR-114210	9-30-2025	No	9-4-2025 9-5-2025 9-6-2025 9-12-2025 9-13-2025 9-27-2025 9-28-2025	0.24/0.24 0.13/0.43 0.03/0.11 0.06/0.26 0.03/0.1 0.07/0.25 0.15/0.26
SMPLR-114660	11-6-2025	No	10-11-2025 10-13-2025 10-15-2025	0.05/0.11 0.12/0.72 0.09/0.15

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

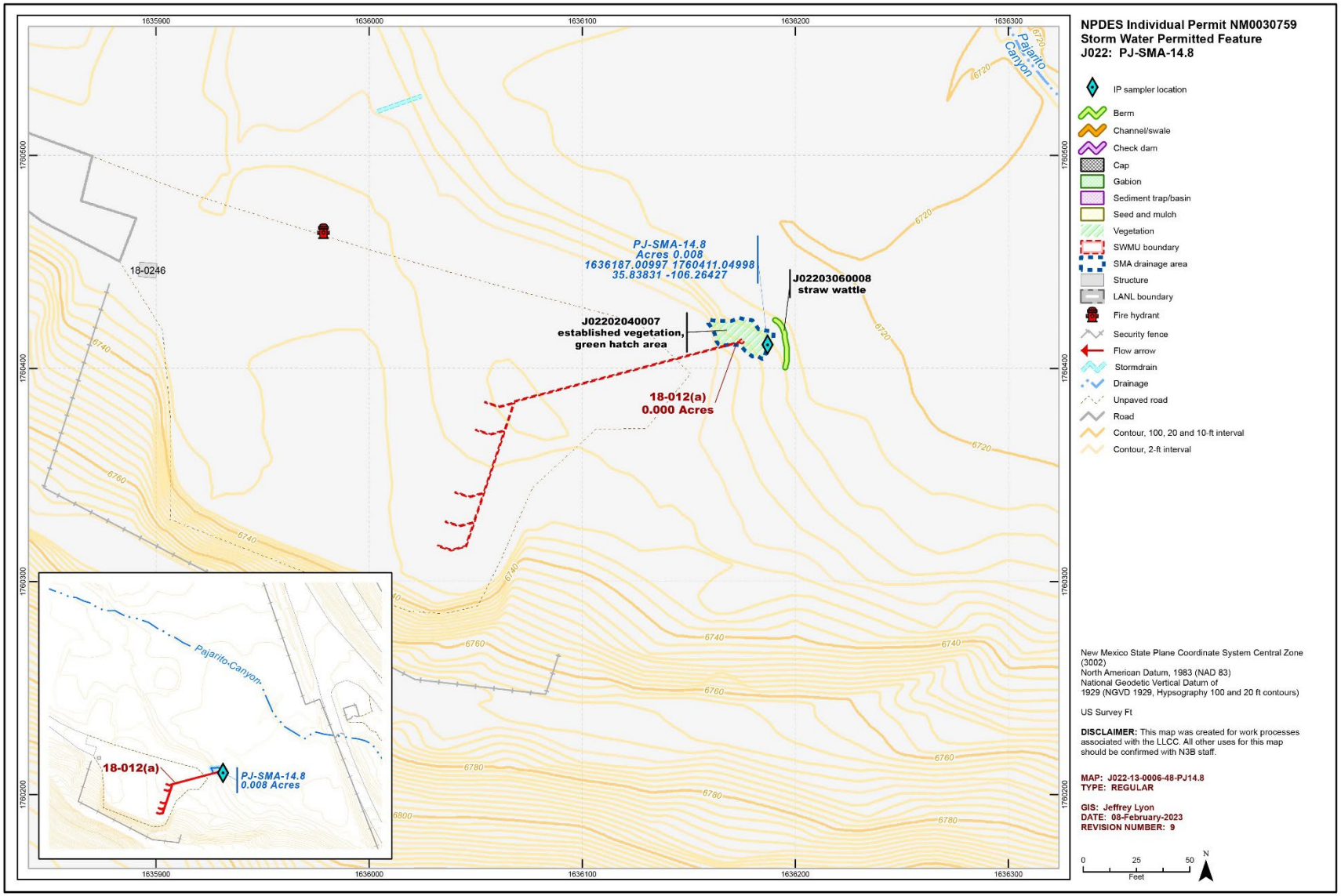

Figure 159-1 PJ-SMA-14.8 location map

160.0 PJ-SMA-16: SWMU 27-002

One historical industrial activity area, Site 27-002, is associated with PJ-SMA-16 (permitted feature J023). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

160.1 Site Descriptions

27-002 (1/5/2018)

SWMU 27-002 is an inactive firing site in Pajarito Canyon used between 1944 and 1947 (LANL 1993, 015310) in former TA-27. The Site consists of five former firing pits situated on either side of Pajarito Road, approximately 0.9 mi southeast of main area of TA-18. Former TA-27 is located within the boundary of TA-18. Firing Pit 1 is located in the grassy area approximately 100 ft south of the TA-36 fence. Firing Pits 2 and 3 are approximately 200 ft east of Firing Pit 1, between the fence and Pajarito Road. Firing Pit 4 was impacted by the construction of Pajarito Road but is located on the north side of Pajarito Road. Firing Pit 5 is located on a small curve on the north side of Pajarito Road. The pits were used for explosives testing with materials such as beryllium, thorium, and uranium. A 1946 bullet sensitivity test at Firing Pit 1 caused a block of Composition B explosive to undergo a low-order explosion, scattering unexploded HE over a 250-yd radius (LANL 1995, 052183). The sites of all former structures were located in relation to the current Pajarito Road. Firing Pits 4 and 5 were north of the road; all other structures were south of the road. Only Firing Pit 4 had a surface expression; the other firing pits are buried. The material in and around Firing Pit 5 may have been removed during excavations for road gravel.

During the 1960s, all structures, concrete foundations, and HE, and other debris were removed from former TA-27, the firing pits were backfilled, and the ground surface was leveled. LANL personnel made several surface sweeps to collect HE fragments; however, some may remain.

Former TA-27 is located approximately 1 mi southeast of TA-18. In late 1945, former TA-27 was upgraded with several structures from TA-18 and became known as Gamma Site. The 1945 site upgrade included improving the access road from TA-18 with a layer of gravel. In early 1947, the entire site was abandoned and fenced off; since then, no Laboratory operations have been conducted at former TA-27. Gravel was excavated for road material between 1949 and 1962 throughout the length of Pajarito Canyon east of TA-18, including the area within the former boundary of TA-27. The former TA-27 area was reopened in March 1960 to begin construction of a road to White Rock from Los Alamos. The gravel road from TA-18 was shifted north, bisecting Pit 5. It was widened, paved, and opened to the public as Pajarito Road on July 11, 1962.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 160-1.

Table 160-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
27-002	Firing site	Beryllium, lead, HE, thorium, and uranium

160.2 Control Measures

All active control measures in use at PJ-SMA-16 are listed in Table 160-2. Their locations are shown on the project map (Figure 160-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 160-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02302040004	Established vegetation	-	X	X	-	5-2-2013
J02303060003	Straw wattle	-	X	-	X	10-3-2012

160.3 Inspections and Maintenance

Rain gage RG-TA-54 recorded one storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-16 during the 2025 season, requiring one post-storm inspection, summarized in Table 160-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 160-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113989	8-25-2025	0.54	9-3-2025	9	Yes

160.4 Stormwater Monitoring

160.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, baseline stormwater samples were collected on July 30, 2011, and August 8, 2013. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408) and "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

160.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-16 from March 27 through October 29, 2025, resulting in a monitoring season of 216 days. Eight inspections performed during the monitoring period are summarized in Table 160-5. Rain gage RG-TA-54 recorded 28 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 160-5 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111149	5-9-2025	No	5-4-2025 5-5-2025 5-6-2025	0.26/0.85 0.17/0.63 0.22/0.59
SMPLR-111843	5-12-2025	No	5-9-2025	0.23/0.24
SMPLR-111865	5-28-2025	No	5-25-2025 5-26-2025	0.07/0.13 0.46/0.52
SMPLR-112111	7-8-2025	No	6-2-2025 6-3-2025 6-4-2025 6-24-2025	0.08/0.13 0.08/0.31 0.41/0.52 0.13/0.43
SMPLR-113095	8-4-2025	No	7-13-2025 7-21-2025 7-23-2025 7-28-2025 7-30-2025	0.14/0.14 0.14/0.17 0.14/0.15 0.17/0.18 0.32/0.41
SMPLR-113576	9-2-2025	No	8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025	0.09/0.55 0.14/0.38 0.54/1.07 0.06/0.13 0.08/0.1
SMPLR-114211	9-16-2025	No	9-5-2025 9-12-2025 9-13-2025	0.15/0.37 0.05/0.13 0.23/0.34
SMPLR-114464	10-29-2025	No	9-27-2025 9-28-2025 10-8-2025 10-11-2025 10-13-2025	0.09/0.22 0.1/0.21 0.19/0.22 0.04/0.1 0.09/0.52

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

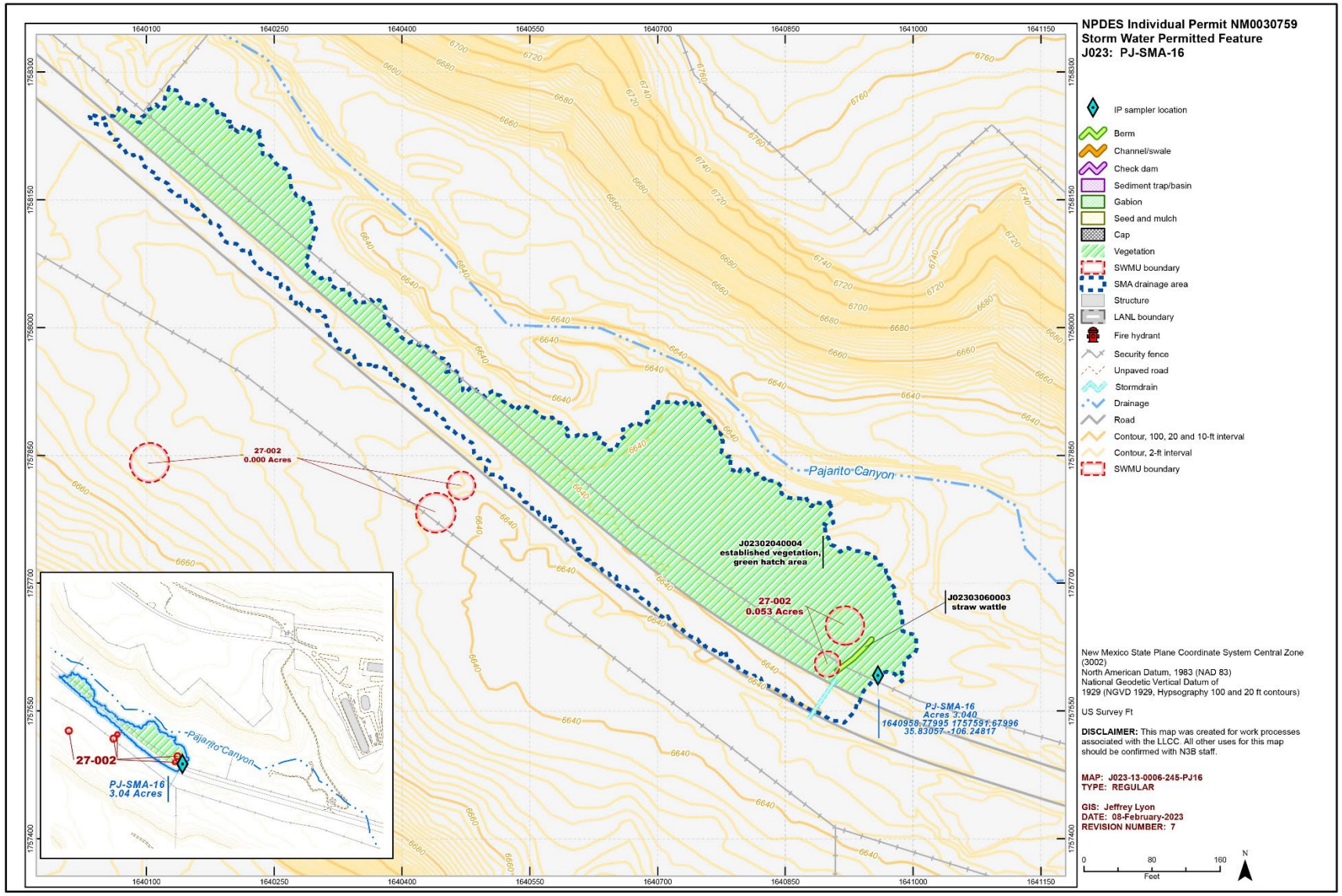

Figure 160-1 PJ-SMA-16 location map

161.0 PJ-SMA-17: SWMU 54-018

One historical industrial activity area, Site 54-018, is associated with PJ-SMA-17 (permitted feature J024). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

161.1 Site Descriptions

54-018 (7/18/2019)

SWMU 54-018 consists of inactive disposal Pits 25 through 33 and 35 through 37 located in Area G at TA-54. Only Pit 29 (although no longer in use) is considered a RCRA-regulated unit until RCRA closure is certified and approved by NMED. Pits 25 through 28, 30 through 33, and 34 through 36 received low-level radioactive, mixed, and TRU-contaminated waste in the form of reactor control rods, D&D waste, contaminated soil, transformers, glove boxes, asbestos, and lab waste and range in volume from 20,957 to 59,930 yd^3. Pit 29 operated until 1986, after which the surface of Pit 29 was used to store retrievable TRU waste in cement-filled sections of corrugated pipe [SWMU 54-015(k)]. Pit 37 operated from 1990 to 1997 and primarily received circuit boards and contaminated soil. When filled, the pits were covered with 3.3 ft of consolidated crushed tuff and 4 in. of topsoil and reseeded with native grasses. SWMU 54-018 is part of MDA G, which consists of the subsurface disposal units within Area G that are subject to the Consent Order.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 161-1.

Table 161-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
54-018	Inactive disposal pits at MDA G	Metals, asbestos, PCBs, fission products (strontium-90), plutonium, and uranium

161.2 Control Measures

All active control measures in use at PJ-SMA-17 are listed in Table 161-2. Their locations are shown on the project map (Figure 161-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 161-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02402040008	Established vegetation	-	X	X	-	5-16-2013
J02404060006	Riprap	-	X	X	-	6-1-2009
J02404060007	Riprap	-	X	X	-	6-1-2009
J02405010005	Sediment trap	-	X	-	X	6-1-2009
J02406010004	Rock check dam	X	-	-	X	6-1-2009

161.3 Inspections and Maintenance

Rain gage RG-TA-54 recorded one storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-17 during the 2025 season, requiring one post-storm inspection, summarized in Table 161-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 161-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113987	8-25-2025	0.54	9-3-2025	9	Yes

161.4 Stormwater Monitoring

161.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on July 25, 2013. Analytical results from this sample yielded TAL exceedances for copper (5.13 µg/L) and gross-alpha activity (61.6 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

Following certification of no exposure, a corrective-action-investigation stormwater sample was collected on May 21, 2015. Analytical results from this sample are presented in "NPDES Permit No. NM030759 – Submittal of Analytical Results for Site 54-018 in Site Monitoring Area PJ-SMA-17 after Certification of a No Exposure Condition" (LANL 2015, 600951).

A partial-volume confirmation-monitoring sample was collected on September 13, 2023. Analytical results from this sample yielded no TAL exceedances. The complete analytical results are presented in the "2023 Update to the Site Discharge Pollution Prevention Plan, Overview" (N3B 2024, 703196) and were included in the SSD in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282).

Confirmation-monitoring samples were collected on July 11 and August 26, 2024. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in "2024 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit no. NM0030759" (N3B 2025, 703800); in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814); and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

161.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-17 from April 1 through September 2, 2025, resulting in a monitoring season of 154 days. Sixteen inspections performed during the monitoring period are summarized in Table 161-4. Rain gage RG-TA-54 recorded 20 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

Confirmation-monitoring samples were collected on May 26, and August 25, 2025. The May sample was a partial volume collection. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in Appendix B of the Overview and in the "2025

Sampling Implementation Plan, NPDES Permit No. NM000759" (N3B 2026, 704269), which has been updated with the inclusion of these samples into the SSD.

The sampling equipment was deactivated for the remainder of the monitoring season at the next inspection after confirmation that the May and August samples met the SAP requirements.

It was later discovered that not all Site-related POCs were included in the analysis of the 2025 samples. Monitoring will resume in 2026.

Table 161-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111151	5-5-2025	No	5-4-2025	0.26/0.85
SMPLR-111657	5-6-2025	No	5-5-2025	0.17/0.63
SMPLR-111709	5-7-2025	No	5-6-2025	0.22/0.59
SMPLR-111775	5-13-2025	No	5-9-2025	0.23/0.24
SMPLR-111890	5-27-2025	Yes	5-25-2025 5-26-2025	0.07/0.13 0.46/0.52
SMPLR-112082	6-4-2025	No	6-2-2025 6-3-2025	0.08/0.13 0.08/0.31
SMPLR-112260	6-5-2025	No	6-4-2025	0.41/0.52
SMPLR-112322	6-25-2025	No	6-24-2025	0.13/0.43
SMPLR-112730	7-14-2025	No	7-13-2025	0.14/0.14
SMPLR-113182	7-22-2025	No	7-21-2025	0.14/0.17
SMPLR-113314	7-24-2025	No	7-23-2025	0.14/0.15
SMPLR-113399	7-29-2025	No	7-28-2025	0.17/0.18
SMPLR-113472	7-31-2025	No	7-30-2025	0.32/0.41
SMPLR-113522	8-25-2025	No	8-23-2025 8-24-2025	0.09/0.55 0.14/0.38
SMPLR-114022	8-26-2025	Yes	8-25-2025	0.54/1.07
SMPLR-114063	9-2-2025	No	8-26-2025 8-31-2025	0.06/0.13 0.08/0.1

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

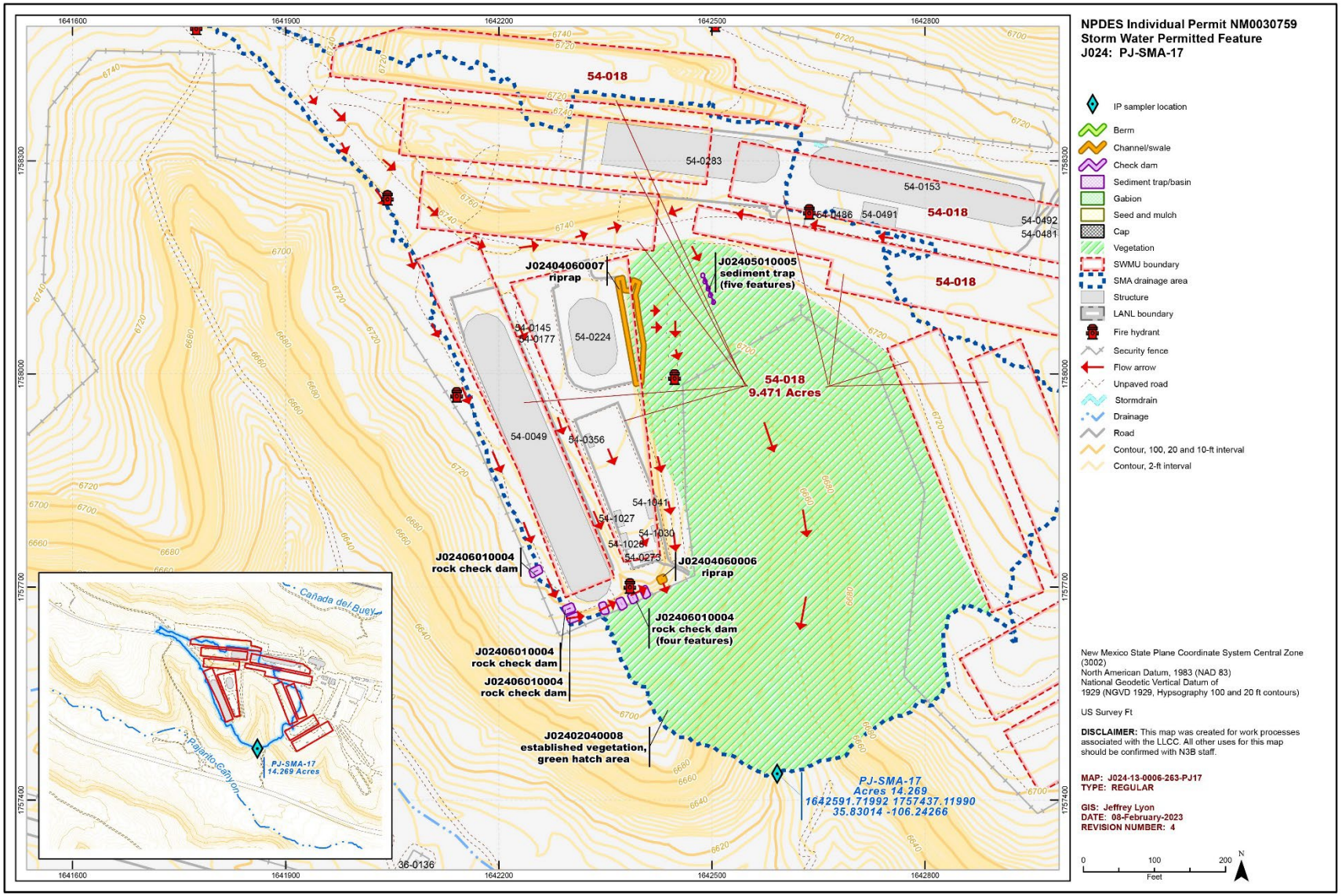

Figure 161-1 PJ-SMA-17 location map

162.0 PJ-SMA-18: SWMUs 54-014(d) and 54-017

Two historical industrial activity areas, Sites 54-014(d) and 54-017, are associated with PJ-SMA-18 (permitted feature J026). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

162.1 Site Descriptions

54-014(d) (7/18/2019)

SWMU 54-014(d) consists of retrievable TRU waste storage trenches A, B, C, and D, which are located in the south-central portion of Area G at TA-54. These trenches began receiving TRU waste in 1974. Trenches A, B, and C vary in size from 219 ft to 262.5 ft long × 13 ft wide × 6 ft to 8 ft deep. Trench D is 60 ft long × 13 ft wide × 6 ft deep. The TRU waste placed in these trenches was packaged in 30-gal. containers inside concrete casks. When filled, the trenches were backfilled with 3.3 ft of crushed tuff followed by 4 in. of topsoil. The surface was reseeded with native grasses. The TRU waste in these trenches was placed for future retrieval and processing for disposal at WIPP.

54-017 (7/18/2019)

SWMU 54-017 consist of inactive disposal Pits 1 through 8, 10, 12, 13, 16 through 22, and 24 located in Area G at TA-54. Pits 1 through 8, 10, 12, 13, 16 through 22, and 24 were operational between 1959 and 1980 and received low-level radioactive, mixed LLW, and non-retrievable TRU waste in the form of wing tanks, dry boxes, building debris, sludge drums, lab waste, contaminated soil, D&D waste, filter plenums, and uranium. Pits 1 through 8, 10, 12, 13, 16 through 22, and 24 are located in the eastern portion of Area G with volumes ranging from 1371 to 56,759 yd^3. When filled, the pits were covered with 3.3 ft of consolidated crushed tuff and 4 in. of topsoil and reseeded with native grasses. SWMU 54-017 is part of MDA G, which consists of the subsurface disposal units within Area G that are subject to the Consent Order.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 162-1.

Table 162-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
54-014(d)	Storage trenches A, B, C, and D at MDA G	Plutonium-238 and plutonium-239
54-017	Inactive disposal pits at MDA G	Metals, asbestos, PCBs, fission products (strontium-90), plutonium, and uranium

162.2 Control Measures

All active control measures in use at PJ-SMA-18 are listed in Table 162-2. Their locations are shown on the project map (Figure 162-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 162-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02602040010	Established vegetation	-	X	X	-	5-16-2013
J02604010009	Earthen channel/swale	X	-	X	-	9-27-2011
J02604010011	Earthen channel/swale	-	X	X	-	11-6-2014
J02604060007	Riprap	-	X	X	-	8-20-2010
J02604060012	Riprap	-	X	X	-	11-6-2014
J02605010005	Sediment trap	-	X	-	X	6-1-2009
J02606010004	Rock check dam	-	X	-	X	6-1-2009

162.3 Inspections and Maintenance

Rain gage RG-TA-54 recorded one storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-18 during the 2025 season, requiring one post-storm inspection, summarized in Table 162-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 162-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113983	8-25-2025	0.54	9-3-2025	9	Yes

162.4 Stormwater Monitoring

162.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on July 25, 2013. Analytical results from this sample yielded a TAL exceedance for gross alpha (23.6 pCi/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

Following certification of no exposure, a corrective-action investigation stormwater sample was collected on August 10, 2018. Analytical results from this sample are presented in "NPDES Permit No. NM030759 –Analytical Results Following Completion of Corrective Action by Certification of a No Exposure Condition at Sites 54-014(d) and 54-017 in Site Monitoring Area PJ-SMA-18 after Certification of a No Exposure Condition" (N3B 2018, 700144).

162.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-18 from April 1 through November 18 2025, resulting in a monitoring season of 231 days. Forty inspections performed during the monitoring period are summarized in Table 162-4. Rain gage RG-TA-54 recorded 28 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 162-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111150	4-9-2025	No	None	None
SMPLR-111314	4-29-2025	No	None	None
SMPLR-111585	5-5-2025	No	5-4-2025	0.26/0.85
SMPLR-111656	5-6-2025	No	5-5-2025	0.17/0.63
SMPLR-111708	5-7-2025	No	5-6-2025	0.22/0.59
SMPLR-111774	5-8-2025	No	None	None
SMPLR-111816	5-9-2025	No	None	None
SMPLR-111844	5-12-2025	No	5-9-2025	0.23/0.24
SMPLR-111866	5-22-2025	No	None	None
SMPLR-112034	5-27-2025	No	5-25-2025 5-26-2025	0.07/0.13 0.46/0.52
SMPLR-112081	6-3-2025	No	6-2-2025	0.08/0.13
SMPLR-112229	6-4-2025	No	6-3-2025	0.08/0.31
SMPLR-112259	6-5-2025	No	6-4-2025	0.41/0.52
SMPLR-112321	6-10-2025	No	None	None
SMPLR-112391	6-12-2025	No	None	None
SMPLR-112434	6-25-2025	No	6-24-2025	0.13/0.43
SMPLR-112729	6-26-2025	No	None	None
SMPLR-112795	7-2-2025	No	None	None
SMPLR-112993	7-8-2025	No	None	None
SMPLR-113096	7-14-2025	No	7-13-2025	0.14/0.14
SMPLR-113181	7-18-2025	No	None	None
SMPLR-113261	7-21-2025	No	None	None
SMPLR-113292	7-22-2025	No	7-21-2025	0.14/0.17
SMPLR-113313	7-24-2025	No	7-23-2025	0.14/0.15
SMPLR-113398	7-29-2025	No	7-28-2025	0.17/0.18
SMPLR-113471	7-31-2025	No	7-30-2025	0.32/0.41
SMPLR-113521	8-25-2025	No	8-23-2025 8-24-2025	0.09/0.55 0.14/0.38
SMPLR-114021	8-26-2025	No	8-25-2025	0.54/1.07
SMPLR-114080	8-27-2025	No	8-26-2025	0.06/0.13
SMPLR-114127	9-2-2025	No	8-31-2025	0.08/0.1
SMPLR-114212	9-9-2025	No	9-5-2025	0.15/0.37
SMPLR-114343	9-11-2025	No	9-12-2025	0.05/0.13
SMPLR-114420	9-15-2025	No	9-13-2025	0.23/0.34
SMPLR-114448	9-22-2025	No	None	None

Table 162-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-114534	9-23-2025	No	None	None
SMPLR-114546	9-29-2025	No	9-27-2025 9-28-2025	0.09/0.22 0.1/0.21
SMPLR-114639	10-9-2025	No	10-8-2025	0.19/0.22
SMPLR-114805	10-14-2025	No	10-11-2025 10-13-2025	0.04/0.1 0.09/0.52
SMPLR-114836	10-15-2025	No	None	None
SMPLR-114866	11-18-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

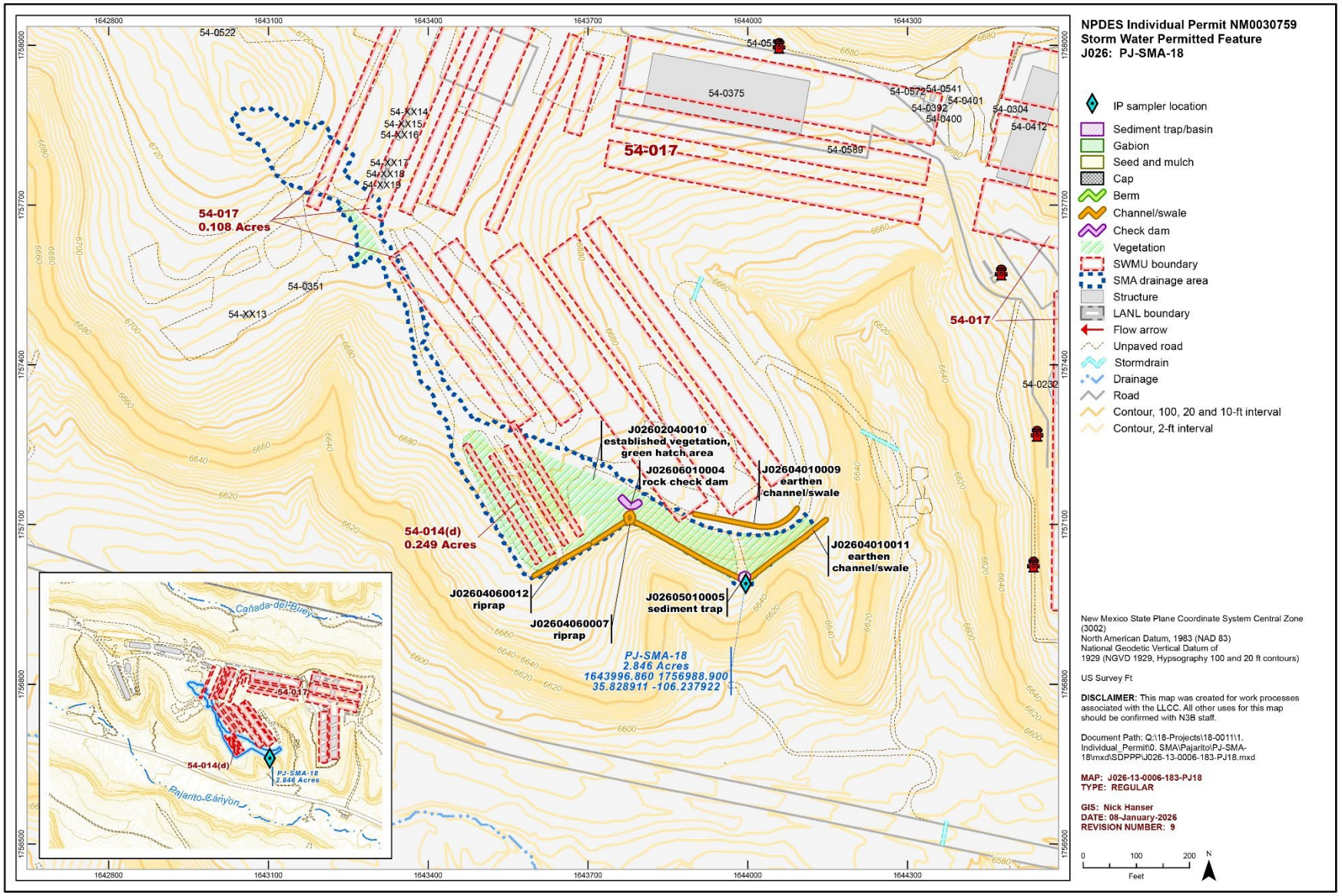

Figure 162-1 PJ-SMA-18 location map

163.0 PJ-SMA-19: SWMUs 54-013(b), 54-017, and 54-020

Three historical industrial activity areas, Sites 54-013(b), 54-017, and 54-020, are associated with PJ-SMA-19 (permitted feature J025). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

163.1 Site Descriptions

54-013(b) (7/18/2019)

SWMU 54-013(b) was a vehicle monitoring and decontamination area located in the northcentral portion of Area G at TA-54. This Site was excavated in April 1971 specifically to be used as a decontamination pit for washing trucks carrying equipment used at MDA G and TRU waste drums. The truck washing and decontamination pit was converted to an LLW disposal pit (Pit 19) in November 1975 when truck-washing activities ceased. Pit 19 is one of the LLW disposal pits comprising SWMU 54-017 and is also part of MDA G, which consists of the subsurface disposal units within Area G that are subject to the Consent Order.

54-017 (7/18/2019)

SWMU 54-017 consists of inactive disposal Pits 1 through 8, 10, 12, 13, 16 through 22, and 24 located in Area G at TA-54. Pits 1 through 8, 10, 12, 13, 16 through 22, and 24 were operational between 1959 and 1980 and received low-level radioactive, mixed LLW, and non-retrievable TRU waste in the form of wing tanks, dry boxes, building debris, sludge drums, lab waste, contaminated soil, D&D waste, filter plenums, and uranium. Pits 1 through 8, 10, 12, 13, 16 through 22, and 24 are located in the eastern portion of Area G, with volumes ranging from 1371 to 56,759 yd^3. When filled, the pits were covered with 3.3 ft of consolidated crushed tuff and 4 in. of topsoil and reseeded with native grasses. SWMU 54-017 is part of MDA G, which consists of the subsurface disposal units within Area G that are subject to the Consent Order.

54-020 (9/13/2023)

SWMU 54-020 consists of 68 disposal shafts (Shafts C1 through C10, C12, C13, 22, 35 through 37, 93 through 95, 99 through 108, 114, 115, 118 through 136, 138 through 140, 151 through 160, 189 through 192, and 196) located in Area G at TA-54. These shafts were operational between 1970 and the early 1990s. Shafts 189 and 192 are described in the 1990 SWMU Report (LANL 1990, 007514) as being "triplet shafts" where three shafts are associated with one shaft number and shaft 191 is a "doublet shaft" where two shafts are associated with one shaft number. Only Shaft 124 (although no longer in use) is considered an RCRA-regulated unit until RCRA closure is certified and approved by NMED. The shafts contain one or a combination of the following waste types: PCB residues, LLW, hazardous, and mixed LLW. The shafts range in size from 1 ft to 8 ft in diameter and 25 ft to 65 ft deep and are located throughout the eastern portion of Area G. Most shafts are unlined, although a few are lined with cement or CMP. The shafts are separated by a minimum distance of 7.5 ft (the distance between doublet and triplet shafts is unknown). The shafts have 0.5 ft-thick layers of crushed tuff between the waste layers. Disposal shafts were typically filled with waste to within 3 ft of the ground surface, backfilled with crushed tuff, and covered with a concrete dome. SWMU 54-020 is part of MDA G, which consists of the subsurface disposal units within Area G that are subject to the Consent Order.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 163-1.

Table 163-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
54-013(b)	Former Vehicle Monitoring/ Decontamination Area at MDA G	Asbestos and radionuclides
54-017	Inactive disposal pits at MDA G	Metals, asbestos, PCBs, fission products (strontium-90), plutonium, and uranium
54-020		Metals, asbestos, PCBs, fission products (strontium-90), plutonium, and uranium

163.2 Control Measures

All active control measures in use at PJ-SMA-19 are listed in Table 163-2. Their locations are shown on the project map (Figure 163-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 163-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02502040011	Established vegetation	-	X	X	-	5-16-2013
J02504020004	Concrete/asphalt channel/swale	X	-	X	-	4-1-2009
J02504020006	Concrete/asphalt channel/swale	X	-	X	-	6-1-2009
J02504060010	Riprap	-	X	X	-	8-20-2010
J02505020002	Sediment basin	-	X	-	X	1-1-2000
J02506010005	Rock check dam	-	X	-	X	6-1-2009
J02506010008	Rock check dam	-	X	-	X	8-20-2010
J02506010009	Rock check dam	-	X	-	X	8-24-2010
J02507010001	Gabion	-	X	-	X	1-1-2000

163.3 Inspections and Maintenance

Rain gage RG-TA-54 recorded one storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-19 during the 2025 season, requiring one post-storm inspection, summarized in Table 163-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 163-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113985	8-25-2025	0.54	9-3-2025	9	Yes

163.4 Stormwater Monitoring

163.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on August 8, 2013. Analytical results from this sample yielded TAL exceedances for aluminum (761 µg/L), gross-alpha activity (51.2 pCi/L), mercury (1.67 µg/L), radium-226 and radium-228 activity (43.7 pCi/L), and total PCBs (0.0204 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

Following certification of no exposure, a corrective-action investigation stormwater sample was collected on August 22, 2021. Analytical results from this sample are presented in "NPDES Permit No. NM0030759 – Analytical Results for Sites 54-013(b), 54-017, and 54-020 in Site Monitoring Area PJ-SMA-19 and Site 50-009 in Site Monitoring Area T-SMA-1 after Certification of No Exposure Condition" (N3B 2021, 701780).

Partial-volume confirmation-monitoring samples were collected on September 9 and September 13, 2023. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in the "2023 Update to the Site Discharge Pollution Prevention Plan, Overview" (N3B 2024, 703196) and were included in the SSD in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282).

Confirmation-monitoring samples were collected on June 21, July 2, July 11, August 26, and September 17, 2024. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in Appendix B of the Overview and in "2024 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit no. NM0030759" (N3B 2025, 703800); and in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814); and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

163.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-19 from April 1 through September 2, 2025, resulting in a monitoring season of 154 days. Twenty-eight inspections performed during the monitoring period are summarized in Table 163-4. Rain gage RG-TA-54 recorded 20 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

Confirmation-monitoring samples were collected on July 30 and August 25, 2025. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in Appendix B of the Overview and in the "2025 Sampling Implementation Plan, NPDES Permit No. NM000759" (N3B 2026, 704269), which has been updated with the inclusion of these samples into the SSD.

Table 163-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111131	4-9-2025	No	None	None
SMPLR-111309	4-29-2025	No	None	None
SMPLR-111582	5-5-2025	No	5-4-2025	0.26/0.85

Table 163-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111649	5-6-2025	No	5-5-2025	0.17/0.63
SMPLR-111702	5-7-2025	No	5-6-2025	0.22/0.59
SMPLR-111767	5-8-2025	No	None	None
SMPLR-111813	5-9-2025	No	None	None
SMPLR-111840	5-12-2025	No	5-9-2025	0.23/0.24
SMPLR-111860	5-27-2025	No	5-25-2025 5-26-2025	0.07/0.13 0.46/0.52
SMPLR-112080	6-3-2025	No	6-2-2025	0.08/0.13
SMPLR-112226	6-4-2025	No	6-3-2025	0.08/0.31
SMPLR-112251	6-5-2025	No	6-4-2025	0.41/0.52
SMPLR-112316	6-10-2025	No	None	None
SMPLR-112388	6-12-2025	No	None	None
SMPLR-112432	6-25-2025	No	6-24-2025	0.13/0.43
SMPLR-112719	6-26-2025	No	None	None
SMPLR-112774	7-2-2025	No	None	None
SMPLR-112988	7-8-2025	No	None	None
SMPLR-113085	7-14-2025	No	7-13-2025	0.14/0.14
SMPLR-113179	7-18-2025	No	None	None
SMPLR-113259	7-21-2025	No	None	None
SMPLR-113288	7-22-2025	No	7-21-2025	0.14/0.17
SMPLR-113308	7-24-2025	No	7-23-2025	0.14/0.15
SMPLR-113395	7-29-2025	No	7-28-2025	0.17/0.18
SMPLR-113465	7-31-2025	Yes	7-30-2025	0.32/0.41
SMPLR-113513	8-25-2025	No	8-23-2025 8-24-2025	0.09/0.55 0.14/0.38
SMPLR-114013	8-26-2025	Yes	8-25-2025	0.54/1.07
SMPLR-114064	9-2-2025	No	8-26-2025 8-31-2025	0.06/0.13 0.08/0.1

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

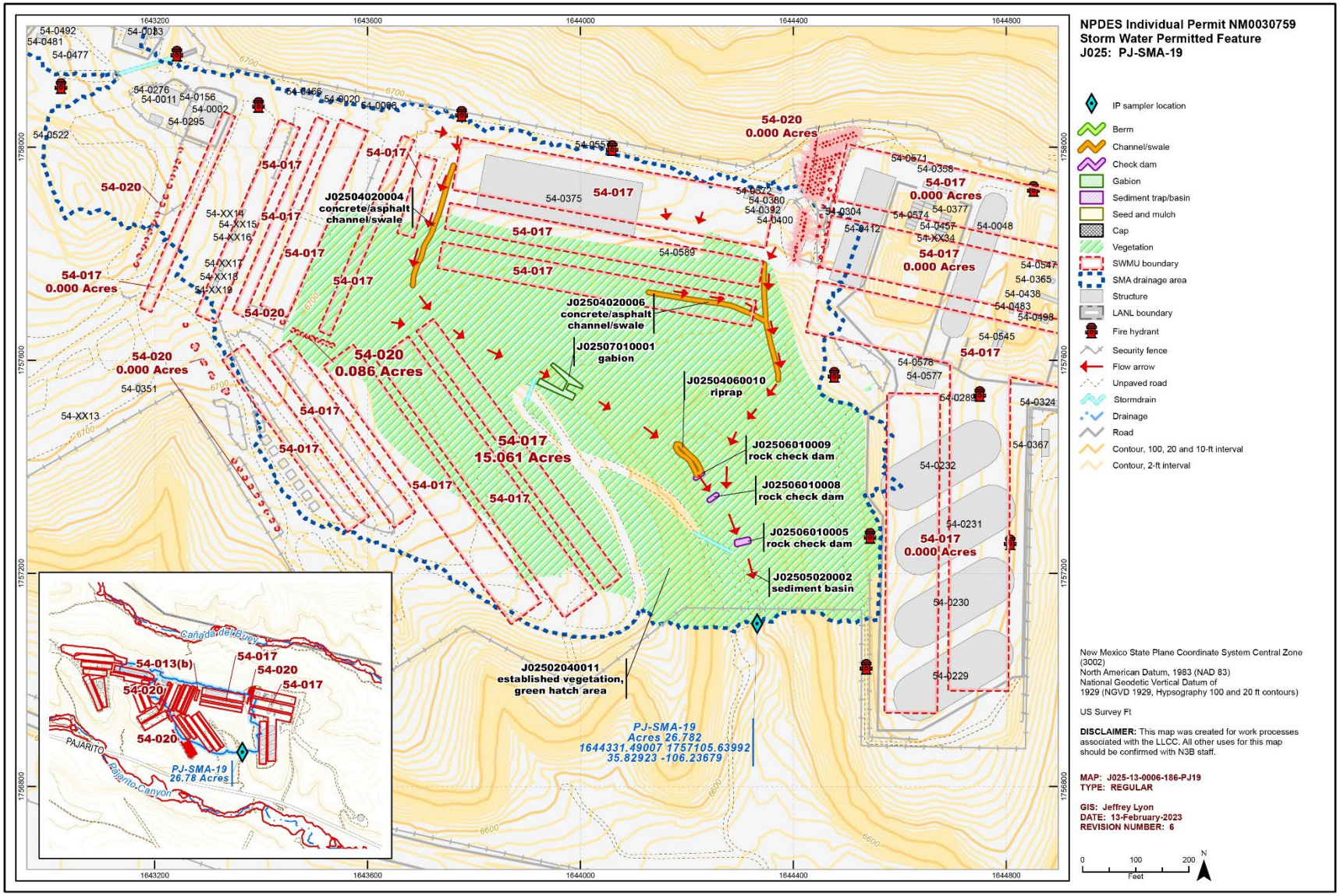

Figure 163-1 PJ-SMA-19 location map

164.0 PJ-SMA-20: SWMU 54-017

One historical industrial activity area, Site 54-017, is associated with PJ-SMA-20 (permitted feature J027). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

164.1 Site Descriptions

54-017 (7/18/2019)

SWMU 54-017 consists of inactive disposal Pits 1 through 8, 10, 12, 13, 16 through 22, and 24 located in Area G at TA-54. Pits 1 through 8, 10, 12, 13, 16 through 22, and 24 were operational between 1959 and 1980 and received low-level radioactive, mixed LLW, and non-retrievable TRU waste in the form of wing tanks, dry boxes, building debris, sludge drums, lab waste, contaminated soil, D&D waste, filter plenums, and uranium. Pits 1 through 8, 10, 12, 13, 16 through 22, and 24 are located in the eastern portion of Area G, with volumes ranging from 1371 to 56,759 yd^3. When filled, the pits were covered with 3.3 ft of consolidated crushed tuff and 4 in. of topsoil and reseeded with native grasses. SWMU 54-017 is part of MDA G, which consists of the subsurface disposal units within Area G that are subject to the Consent Order.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 164-1.

Table 164-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
54-017	Inactive disposal pits at MDA G	Metals, asbestos, PCBs, fission products (strontium-90), plutonium, and uranium

164.2 Active Control Measures

All active control measures in use at PJ-SMA-20 are listed in Table 164-2. Their locations are shown on the project map (Figure 164-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Enhanced controls were certified on December 9, 2025, and submitted to EPA on December 10, 2025, as part of corrective action, as described in "NPDES Permit No. NM0030759 - Certification of Installation of Enhanced Control Measures for 2M-SMA-1.8 PJ-SMA-20, DP-SMA-0.4, and 2M-SMA-1.9" (N3B 2025, 704035). Photographs of the enhanced controls are available at https://ext.em-la.doe.gov/IPS/Home/ConstructionCertifications.

Table 164-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02702040007	Established vegetation	-	X	X	-	5-16-2013
J02703090001	Curbing	-	X	-	X	4-1-2009

Table 164-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02704060006	Riprap	-	X	X	-	5-25-2010
J02706010008	Rock check dam	-	-	-	X	9-30-2025
J02706010009	Rock check dam	-	-	-	X	9-30-2025
J02706010010	Rock check dam	-	-	-	X	9-30-2025
J02708030005	Concrete/asphalt cap	X	-	X	-	6-1-2009

164.3 Inspections and Maintenance

Rain gage RG-TA-54 recorded one storm rain event (0.50 in. or more occurring within 30 min) at PJ-SMA-20 during the 2025 season, requiring one post-storm inspection, summarized in Table 164-3. All other control measure inspections conducted at PJ-SMA-20 in 2025 are summarized in Table 164-4. No maintenance activities or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 164-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-113981	8-25-2025	0.54	9-3-2025	9	Yes

Table 164-4 Other Control Measure Inspections during 2025

Inspection Type	Inspection Reference	Inspection Date	Summary of Findings
Control Measure Verification	BMP-114492	10-1-2025	Control installation is satisfactory, certification documentation for installation of enhanced controls as a corrective action can be prepared.

164.4 Stormwater Monitoring

164.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on July 29, 2011. Analytical results from this sample yielded a TAL exceedance for copper (8.1 µg/L) and the complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following certification of no exposure, a corrective-action investigation stormwater sample was collected on May 22, 2014. Analytical results from this sample are presented in "NPDES Permit No. NM003759 – Submittal of Analytical Results for Site 54-017 in Site Monitoring Area PJ-SMA-20" (LANL 2014, 260188).

Confirmation-monitoring samples were collected on June 4, July 22, and September 11, 2023. Analytical results from the June sample yielded a TAL exceedance for copper (8.56 µg/L), while the July and September samples yielded no TAL exceedances. The complete analytical results are presented in the "2023 Update to the Site Discharge Pollution Prevention Plan, Overview" (N3B 2024, 703196) and were

included in the SSD in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282).

164.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at PJ-SMA-20 from April 24 through June 3, 2025, resulting in a monitoring season of 36 days. Six inspections performed during the monitoring period are summarized in Table 164-5. Rain gage RG-TA-54 recorded seven rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

Confirmation-monitoring samples were collected on May 4 and 26, 2025. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are presented in Appendix B of the Overview and in the "2025 Sampling Implementation Plan, NPDES Permit No. NM000759" (N3B 2026, 704269), which has been updated with the inclusion of these samples into the SSD.

The sampling equipment was deactivated for the remainder of the monitoring season at the next inspection after confirmation that the May and June samples met the SAP requirements. Certification of enhanced controls was completed after the end of the 2025 monitoring season, and confirmation monitoring will begin in 2026.

Table 164-5 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111544	5-6-2025	Yes	5-4-2025 5-5-2025	0.26/0.85 0.17/0.63
SMPLR-111703	5-7-2025	No	5-6-2025	0.22/0.59
SMPLR-111768	5-9-2025	No	None	None
SMPLR-111841	5-13-2025	No	5-9-2025	0.23/0.24
SMPLR-111880	5-28-2025	Yes	5-25-2025 5-26-2025	0.07/0.13 0.46/0.52
SMPLR-112088	6-3-2025	No	6-2-2025	0.08/0.13

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

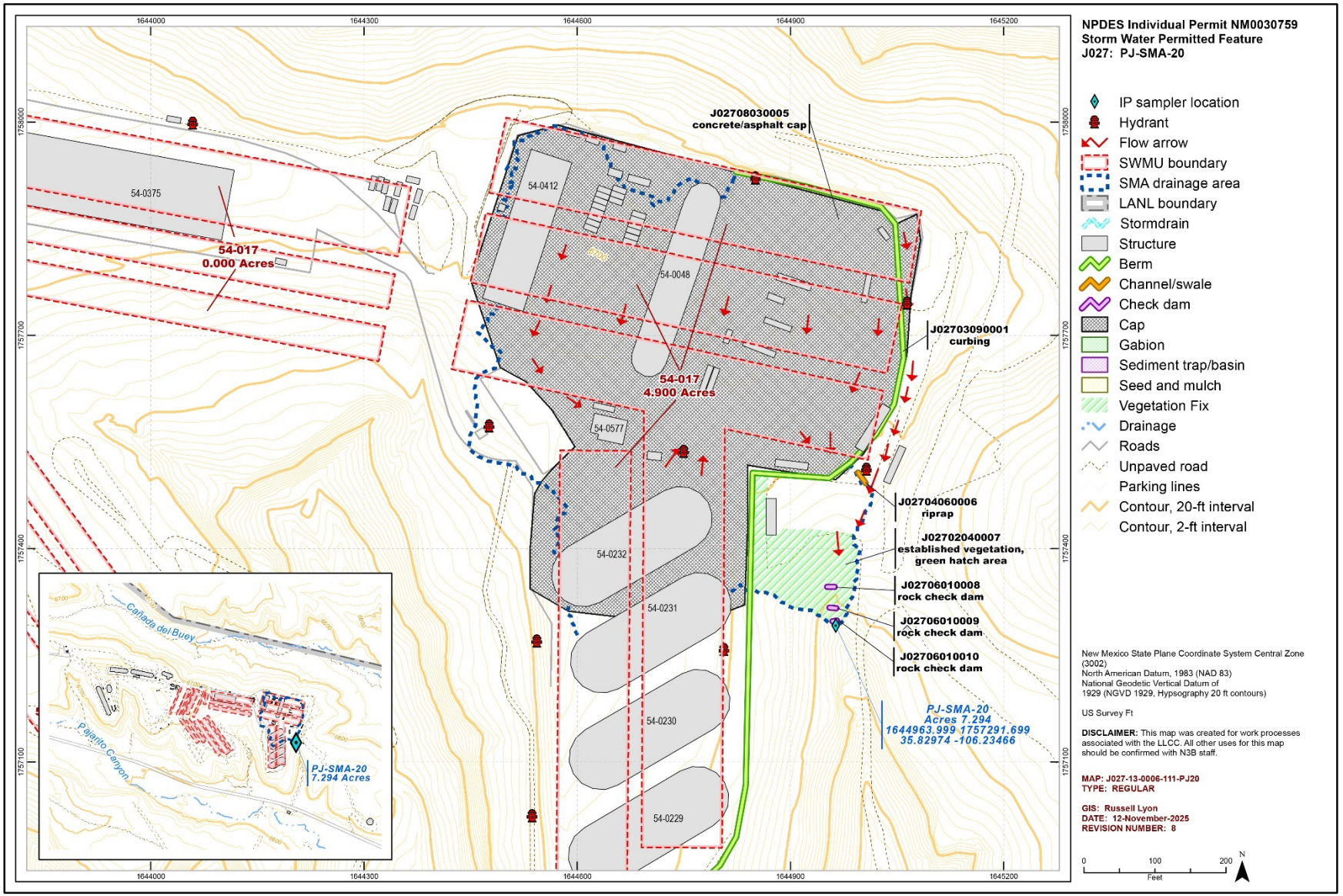

Figure 164-1 PJ-SMA-20 location map

165.0 STRM-SMA-1.05: AOC 08-009(f)

One historical industrial activity area, Site 08-009(f), is associated with STRM-SMA-1.05 (permitted feature J028). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

165.1 Site Descriptions

08-009(f) (N3B 2025, 703889)

AOC 08-009(f) consists of a former outfall at TA-08 located approximately 40 ft southeast of building 08-22 and its associated drains and drainline. Fluorescent penetrants (mixtures of dyes and surfactants) were used in building 08-22 to detect cracks in parts being prepared for installation into weapons assemblies. Historically, fluorescent penetrants, developers, and emulsifiers were discharged to the outfall through drains located within building 08-22. The valves to the sinks that discharged to the AOC 08-009(f) drains were disconnected in 1992, and the drains were rerouted to the building 08-22 sanitary sewer system. After 1992, secondary containers were used to collect the chemicals for disposal offsite (LANL 1993, 020949).

The 1990 SWMU Report (LANL 1990, 007511) originally identified SWMU 08-009(d) as the drainlines and outfall for the building 08-22 fluorescent penetrant experiments; however, SWMU 08-009(d) was confirmed to be associated with formerly permitted outfall EPA 06A074, a photo-processing outfall. During development of the 1993 RCRA RFI work plan (LANL 1993, 020949), the building drainlines and outfall for the fluorescent penetrant experiments performed in building 08-22 were designated AOC 08-009(f).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 165-1.

Table 165-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
08-009(f)	Outfall associated with building 08-22	Fluoranthene (SVOC)

165.2 Control Measures

All active control measures in use at STRM-SMA-1.05 are listed in Table 165-2. Their locations are shown on the project map (Figure 165-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 165-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02802040009	Established vegetation	-	X	X	-	5-8-2013
J02804060006	Riprap	-	X	X	-	10-27-2009
J02806010004	Rock check dam	X	-	-	X	6-1-2009

Table 165-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02806010005	Rock check dam	X	-	-	X	6-1-2009
J02806010007	Rock check dam	X	-	-	X	7-25-2012
J02808030008	Concrete/asphalt cap	-	-	X	-	3-26-2013

165.3 Inspections and Maintenance

Rain gage RG240 recorded four storm rain events (0.50 in. or more occurring within 30 min) at STRM-SMA-1.05 during the 2025 season, requiring four post-storm inspections, summarized in Table 165-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 165-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112156	5-31-2025	0.91	6-11-2025	11	Yes
BMP-113329	7-22-2025	0.97	7-31-2025	9	Yes
BMP-114285	9-5-2025	0.53	9-15-2025	10	Yes
BMP-114880	10-15-2025	0.72	10-17-2025	2	Yes

165.4 Stormwater Monitoring

165.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, two baseline stormwater samples were collected on August 5 and August 26, 2011. Analytical results from these samples yielded TAL exceedances for copper (5.7 µg/L and 6.9 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures at STRM-SMA-1.05, corrective-action stormwater samples were collected on July 12 and August 1, 2013. Analytical results from these samples yielded TAL exceedances for copper (9.92 µg/L and 10.8 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

Confirmation-monitoring samples were collected on August 25, September 13, and September 14, 2023. Analytical results from these samples yielded no TAL exceedances. The complete analytical results are in the "2023 Update to the Site Discharge Pollution Prevention Plan, Overview" (N3B 2024, 703196) and were included in the SSD in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282).

165.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was not conducted at STRM-SMA-1.05 in 2025. The SMA is in corrective action, as discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922).

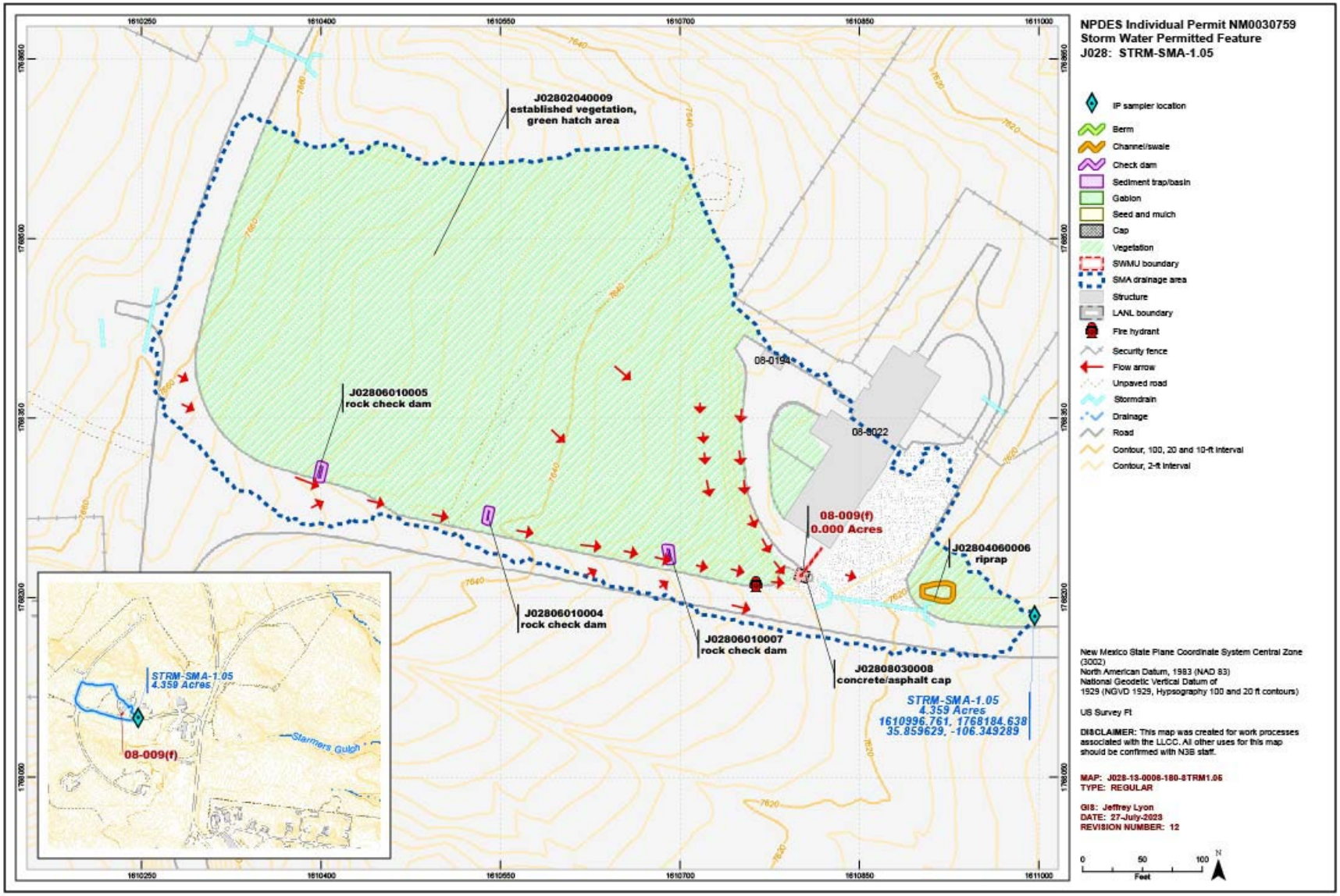

Figure 165-1 STRM-SMA-1.05 location map

166.0 STRM-SMA-1.5: SWMU 08-009(d)

One historical industrial activity area, Site 08-009(d), is associated with STRM-SMA-1.5 (permitted feature J029). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

166.1 Site Descriptions

08-009(d) (N3B 2025, 703889)

SWMU 08-009(d) consists of a drainline and formerly permitted outfall (EPA 06A074) that served drains in the photo-processing and x-ray rooms in the X-Ray building 08-22 (structure 08-22) at TA-08. Building 08-22 was constructed in 1950 and housed x-ray machines used to radiograph various items. The drains in the photo-processing and x-ray rooms in the building received photo-processing and photo-development solutions that contained silver salts, chromium, pentachlorophenol, and other chemicals used during the radiography process. The floor drains flowed into 4-in.-diameter outlet drainline that extends from the west side of the building to the outfall located approximately 300 ft northeast of building 08-22. The outfall discharged to Starmer Gulch, a tributary of Upper Pajarito Canyon. The floor drains in building 08-22 were plugged between 1995 and 1997. The outfall was removed from the NPDES permit effective September 19, 1997 (EPA 1997, 109528).

The 1990 SWMU Report (LANL 1990, 007511), originally identified SWMU 08-009(d) as the drainlines and outfall for the building 08-22 fluorescent penetrant experiments; however, SWMU 08-009(d) was confirmed to be associated with formerly permitted outfall EPA 06A074, a photo-processing outfall. During development of the 1993 RCRA RFI work plan (LANL 1993, 020949), the building drainlines and outfall for the fluorescent penetrant experiments performed in building 08-22 were designated AOC 08-009(f)).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 166-1.

Table 166-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
08-009(d)	Drains and outfall	Chromium, silver, and SVOCs

166.2 Control Measures

All active control measures in use at STRM-SMA-1.5 are listed in Table 166-2. Their locations are shown on the project map (Figure 166-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 166-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J02902040018	Established vegetation	-	X	X	-	5-8-2013
J02903010009	Earthen berm	X	-	-	X	8-31-2011
J02903010011	Earthen berm	X	-	-	X	8-31-2011
J02903010013	Earthen berm	X	-	-	X	4-17-2013
J02903010021	Earthen berm	-	X	-	X	5-12-2021
J02903120015	Rock berm	-	X	-	X	4-17-2013
J02904010019	Earthen channel/swale	X	-	X	-	7-27-2015
J02904060016	Riprap	-	X	X	-	4-17-2013
J02904060020	Riprap	X	-	X	-	7-27-2015
J02908030017	Concrete/asphalt cap	-	X	X	-	4-17-2013

166.3 Inspections and Maintenance

Rain gage RG240 recorded four storm rain events (0.50 in. or more occurring within 30 min) at STRM-SMA-1.5 during the 2025 season, requiring four post-storm inspections, summarized in Table 166-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 166-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112157	5-31-2025	0.91	6-11-2025	11	Yes
BMP-113330	7-22-2025	0.97	7-31-2025	9	Yes
BMP-114286	9-5-2025	0.53	9-15-2025	10	Yes
BMP-114881	10-15-2025	0.72	10-17-2025	2	Yes

166.4 Stormwater Monitoring

166.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on July 11, 2012. Analytical results from this sample yielded TAL exceedances for cadmium (1.26 µg/L), cyanide (0.02 mg/L), gross-alpha activity (1270 pCi/L), mercury (1.17 µg/L), radium-226 and radium-228 activity (38.5 pCi/L), and silver (0.58 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2012, NPDES Permit No. NM0030759" (LANL 2013, 237680).

Following the 2013 installation of enhanced control measures at STRM-SMA-1.5, a corrective-action stormwater sample was collected on September 13, 2013. Analytical results from this sample yielded TAL exceedances for gross-alpha activity (16.1 pCi/L) and silver (4.02 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2013, NPDES Permit No. NM0030759" (LANL 2014, 254067).

Following the 2015 installation of enhanced control measures at STRM-SMA-1.5, a corrective-action stormwater sample was collected on September 3, 2018. Analytical results from this sample yielded TAL exceedances for gross-alpha activity (81.3 pCi/L) and silver (1.21 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2018, NPDES Permit No. NM0030759" (N3B 2019, 700320).

166.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at STRM-SMA-1.5 from April 14 through October 28, 2025, resulting in a monitoring season of 197 days. Eleven inspections performed during the monitoring period are summarized in Table 166-4. Rain gage RG240 recorded 42 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Table 166-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111424	5-29-2025	No	5-2-2025 5-4-2025 5-5-2025 5-6-2025 5-7-2025 5-25-2025 5-26-2025	0.04/0.1 0.16/1.2 0.1/0.36 0.17/0.95 0.1/0.25 0.13/0.17 0.16/0.24
SMPLR-112134	6-4-2025	No	5-31-2025 6-2-2025 6-3-2025	0.91/1.24 0.19/0.25 0.12/0.37
SMPLR-112262	6-26-2025	No	6-9-2025 6-11-2025 6-24-2025	0.07/0.15 0.12/0.12 0.4/0.74
SMPLR-112805	7-2-2025	No	6-27-2025 6-30-2025	0.23/0.3 0.48/0.54
SMPLR-113002	7-10-2025	No	7-7-2025 7-8-2025	0.47/0.5 0.11/0.11
SMPLR-113155	7-22-2025	No	7-17-2025 7-18-2025 7-21-2025	0.07/0.13 0.1/0.12 0.46/1.06
SMPLR-113318	7-24-2025	No	7-22-2025 7-23-2025	0.97/1.1 0.06/0.1

Table 166-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113400	9-3-2025	No	7-30-2025 7-31-2025 8-19-2025 8-23-2025 8-24-2025 8-25-2025 8-26-2025 8-31-2025	0.12/0.13 0.31/0.49 0.17/0.17 0.13/0.77 0.24/0.6 0.08/0.4 0.1/0.22 0.31/0.59
SMPLR-114236	9-10-2025	No	9-5-2025 9-6-2025	0.53/0.88 0.19/0.39
SMPLR-114391	10-17-2025	No	9-10-2025 9-13-2025 9-27-2025 9-28-2025 10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.13/0.18 0.2/0.26 0.29/0.52 0.13/0.15 0.06/0.12 0.1/0.14 0.08/0.23 0.11/0.67 0.72/0.99
SMPLR-114921	10-28-2025	No	10-24-2025	0.09/0.13

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

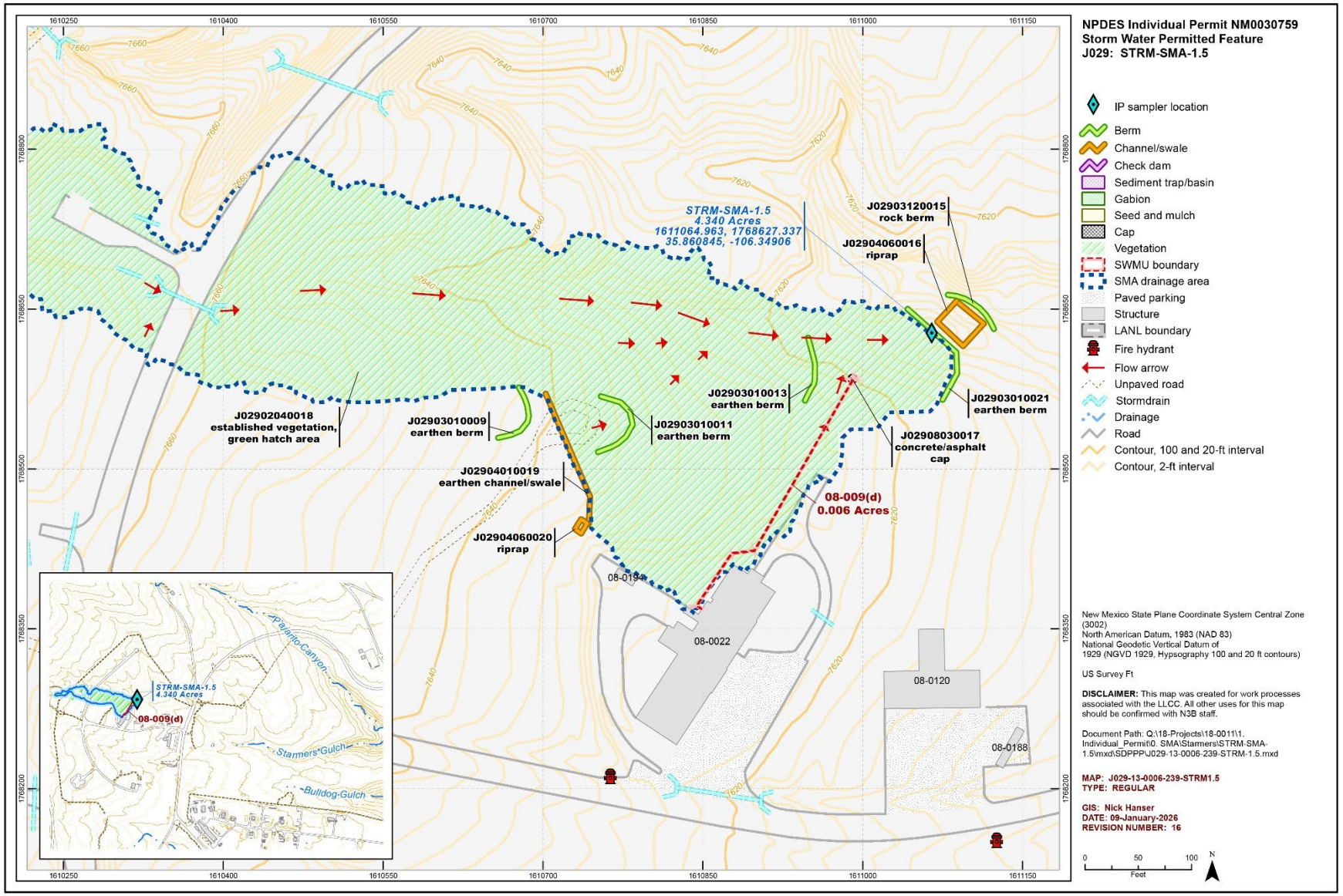

Figure 166-1 STRM-SMA-1.5 location map

167.0 STRM-SMA-4.2: SWMU 09-008(b)

One historical industrial activity area, Site 09-008(b), is associated with STRM-SMA-4.2 (permitted feature J030). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

167.1 Site Descriptions

09-008(b) (N3B 2025, 703890)

SWMU 09-008(b) consists of the decommissioned oxidation pond (structure 09-212) located approximately 200 ft east of Anchor Ranch Road, next to the western boundary of TA-09. Although associated with TA-09, SWMU 09-008(b) is located within the physical boundary of TA-08. Installed in 1969, the pond measures 15 ft wide × 65 ft long × 6 ft deep, is lined with a layer of clay covered with emulsified asphalt, and is surrounded by an 8-ft-high chain-link fence. An overflow pipe, located at the southeast corner of the pond, discharged to an outfall in a drainage channel that flows into Starmer Canyon. The pond treated sanitary waste received from the SWMU 09-005(d) septic system, which received discharges from former buildings 08-20, 08-21 and 08-24, where the strontium-90 spill occurred in 1954 [SWMU 08-004(d)], and existing buildings 08-22 and 08-23 (LANL 1993, 020949, pp. 5–61). The pond was decommissioned in 1988.

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 167-1.

Table 167-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
09-008(b)	Oxidation pond	Metals, organic chemicals, and strontium-90

167.2 Control Measures

All active control measures in use at STRM-SMA-4.2 are listed in Table 167-2. Their locations are shown on the project map (Figure 167-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Table 167-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J03002040006	Established vegetation	-	X	X	-	4-23-2013
J03003010004	Earthen berm	-	X	-	X	8-7-2012
J03003030015	Log berm	-	X	X	-	5-22-2024
J03003200013	Compost log	-	X	X	-	5-22-2024
J03003200014	Compost log	-	X	X	-	5-22-2024
J03004010002	Earthen channel/swale	X	-	X	-	6-1-2009

Table 167-2 Active Control Measures (continued)

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J03005070007	Plunge pool	-	X	X	X	11-6-2019
J03005070008	Plunge pool	-	X	X	X	11-6-2019
J03005070009	Plunge pool	-	X	X	X	11-6-2019
J03006010010	Rock check dam	-	X	-	X	11-6-2019
J03006010011	Rock check dam	-	X	-	X	11-6-2019
J03006010012	Rock check dam	-	X	-	X	11-6-2019

167.3 Inspections and Maintenance

Rain gage RG240 recorded four storm rain events (0.50 in. or more occurring within 30 min) at STRM-SMA-4.2 during the 2025 season, requiring four post-storm inspections, summarized in Table 167-3. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 167-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112158	5-31-2025	0.91	6-10-2025	10	Yes
BMP-113331	7-22-2025	0.97	7-30-2025	8	Yes
BMP-114287	9-5-2025	0.53	9-16-2025	11	Yes
BMP-114882	10-15-2025	0.72	10-20-2025	5	Yes

167.4 Stormwater Monitoring

167.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, baseline stormwater samples were collected on August 21 and September 9, 2011. Analytical results from these samples yielded a TAL exceedance for aluminum (2330 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the 2012 installation of enhanced controls at STRM-SMA-4.2, corrective-action stormwater samples were collected on July 29 and September 27, 2017. Analytical results from these samples yielded TAL exceedances for aluminum (2190 µg/L and 1980 µg/L), copper (8.81 µg/L and 5.26 µg/L), and silver (0.519 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2017, NPDES Permit No. NM0030759" (LANL 2018, 602910).

Following the 2020 installation of enhanced controls at STRM-SMA-4.2, a corrective-action stormwater sample was collected on July 27, 2021. Analytical results from this sample yielded TAL exceedances for copper (4.57 µg/L) and silver (0.568 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2021, NPDES Permit No. NM0030759" (N3B 2022, 701895).

A corrective-action confirmation-monitoring sample was collected on July 4, 2022. Analytical results from this sample yielded TAL exceedances for aluminum (779 µg/L) and copper (4.67 µg/L). The complete results are presented in the "2022 Update to the Site Discharge Pollution Prevention Plan – Overview, NPDES Permit No. NM0030759" (N3B 2023, 702681), and in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282), which have been updated with the inclusion of this sample into the SSD.

A partial-volume confirmation-monitoring sample was collected on August 25, 2023. Analytical results from this sample yielded a TAL exceedance for total PCBs (0.0391 µg/L). The complete analytical results are presented in the "2023 Update to the Site Discharge Pollution Prevention Plan, Overview" (N3B 2024, 703196) and were included in the SSD in the "2023 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2024, 703282).

167.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at STRM-SMA-4.2 from March 27 through November 6, 2025, resulting in a monitoring season of 224 days. Seventeen inspections performed during the monitoring period are summarized in Table 167-4. Rain gage RG240 recorded 42 rain events exceeding 0.1 in. in 24 hr while the sampling equipment was active.

A confirmation-monitoring sample was collected on July 22, 2025. Analytical results from this sample yielded a TAL exceedance for total PCBs (0.0163 µg/L). The complete analytical results are presented in Appendix B of the Overview and in the "2025 Sampling Implementation Plan, NPDES Permit No. NM000759" (N3B 2026, 704269), which has been updated with the inclusion of these samples into the SSD.

Table 167-4 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111174	4-29-2025	No	None	None
SMPLR-111588	5-7-2025	No	5-2-2025 5-4-2025 5-5-2025 5-6-2025	0.04/0.1 0.16/1.2 0.1/0.36 0.17/0.95
SMPLR-111785	5-27-2025	No	5-7-2025 5-25-2025 5-26-2025	0.1/0.25 0.13/0.17 0.16/0.24
SMPLR-112085	6-3-2025	No	5-31-2025 6-2-2025	0.91/1.24 0.19/0.25
SMPLR-112234	6-25-2025	No	6-3-2025 6-9-2025 6-11-2025 6-24-2025	0.12/0.37 0.07/0.15 0.12/0.12 0.4/0.74
SMPLR-112741	6-30-2025	No	6-27-2025	0.23/0.3
SMPLR-112878	7-1-2025	No	6-30-2025	0.48/0.54
SMPLR-112943	7-8-2025	No	7-7-2025	0.47/0.5

Table 167-4 Sampler Inspections during 2025 (continued)

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-113103	7-23-2025	Yes	7-8-2025 7-17-2025 7-18-2025 7-21-2025 7-22-2025	0.11/0.11 0.07/0.13 0.1/0.12 0.46/1.06 0.97/1.1
SMPLR-113372	8-5-2025	No	7-23-2025 7-30-2025 7-31-2025	0.06/0.1 0.12/0.13 0.31/0.49
SMPLR-113604	8-25-2025	No	8-19-2025 8-23-2025 8-24-2025	0.17/0.17 0.13/0.77 0.24/0.6
SMPLR-114027	9-2-2025	No	8-25-2025 8-26-2025 8-31-2025	0.08/0.4 0.1/0.22 0.31/0.59
SMPLR-114217	9-9-2025	No	9-5-2025 9-6-2025	0.53/0.88 0.19/0.39
SMPLR-114354	9-16-2025	No	9-10-2025 9-13-2025	0.13/0.18 0.2/0.26
SMPLR-114469	9-30-2025	No	9-27-2025 9-28-2025	0.29/0.52 0.13/0.15
SMPLR-114663	10-20-2025	No	10-8-2025 10-9-2025 10-11-2025 10-13-2025 10-15-2025	0.06/0.12 0.1/0.14 0.08/0.23 0.11/0.67 0.72/0.99
SMPLR-114946	11-6-2025	No	10-24-2025	0.09/0.13

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

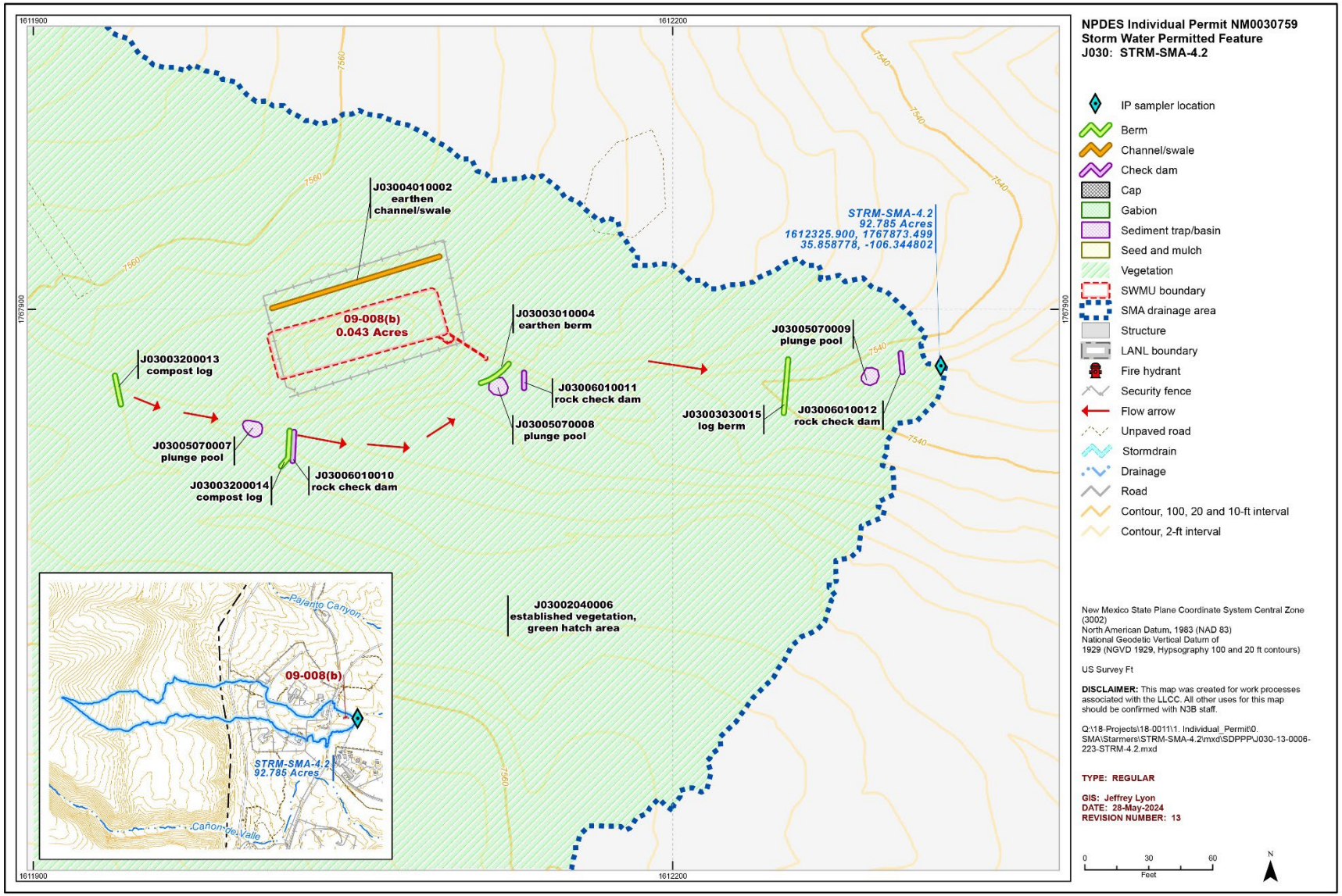

Figure 167-1 STRM-SMA-4.2 location map

168.0 STRM-SMA-5.05: SWMU 09-013

One historical industrial activity area, Site 09-013, is associated with STRM-SMA-5.05 (permitted feature J031). Summaries of all inspection, monitoring, and maintenance actions conducted in 2025 are provided below. Refer to the "2025 Sampling Implementation Plan, NPDES Permit No. NM0030759" (N3B 2026, 704269) for more information on Consent Order investigation activities, the SSD, and planned stormwater monitoring at the SMA for future monitoring seasons.

168.1 Site Descriptions

09-013 (N3B 2025, 703890)

SWMU 09-013 is MDA M, which consists of two former surface disposal areas at TA-09; the main area and a smaller satellite area. The main area occupied approximately 3.2 acres and is located approximately 2800 ft southwest of building 22-120. The 15 ft wide × 260 ft long satellite area is located approximately 750 ft northwest of the main disposal area. MDA M was created during the demolition of the Old Anchor Ranch East and West sites. Structures were flash burned to remove any HE residue and deposited over the MDA surface. Debris from the construction of current TA-08 and TA-09 facilities in 1949−1965 and other sites in 1960−1965 was also deposited at MDA M. Materials present at the MDA included metal debris, wood debris, laboratory appliances and fixtures, and metal and glass containers. The main disposal area was surrounded by an earthen berm that eroded through by surface-water runoff (LANL 1993, 020949, pp. 2–19, 5–73). MDA M has been inactive since 1965. All debris and contaminated soil were removed from MDA M during an EC conducted in 1995−1996 (LANL 1996, 062053).

Known or Potential Use of POCs

POCs known to be managed or potentially used at the Site are listed in Table 168-1.

Table 168-1 POCs Known or Suspected to Have Been Used Historically at the Site

Site	Potential POC Source	Potential POCs
09-013	MDA M	Metals, asbestos, PCBs, SVOCs, HE, and uranium

168.2 Control Measures

All active control measures in use at STRM-SMA-5.05 are listed in Table 168-2. Their locations are shown on the project map (Figure 168-1), located at the end of this SMA update. Future map updates will be posted on the IP website: https://ext.em-la.doe.gov/ips/Home/SiteMonitoringAreaMaps.

Earthen berm J03103010014 was certified to have the capacity to retain a volume of stormwater runoff from the SMA that is equivalent to a 3-yr, 24-hr storm event and submitted to EPA on June 3, 2025, as part of corrective action, as described in "NPDES Permit No. NM0030759 - Certification of 3-Year, 24-Hour Retention for PJ-SMA-1.05, S-SMA-3.51, and STRM-SMA-5.05" (N3B 2025, 703837). Photographs of the retention controls are available at https://ext.em-la.doe.gov/IPS/Home/ConstructionCertifications.

Table 168-2 Active Control Measures

Control ID	Control Name	Purpose of Control				Install Date
		Run-On	Runoff	Erosion	Sediment	
J03102040013	Established vegetation	-	X	X	-	4-23-2013
J03103010009	Earthen berm	X	-	-	X	10-21-2011
J03103010012	Earthen berm	X	-	-	X	7-27-2012
J03103010014	Earthen berm	-	X	-	X	10-24-2017
J03103020004	Base course berm	-	X	-	X	8-1-1996

168.3 Inspections and Maintenance

Rain gage RG240 recorded four storm rain events (0.50 in. or more occurring within 30 min) at STRM-SMA-5.05 during the 2025 season, requiring four post-storm inspections, summarized in Table 168-3. All other control measure inspections conducted at the SMA are summarized in Table 168-4. No other control measure inspections, maintenance activities, or facility modifications affecting discharge were conducted at the SMA in 2025.

Table 168-3 Post-Storm Inspections during 2025

Inspection Reference	Storm Date	30-min Maximum Intensity (in.)	Inspection Date	Days to Inspection	Inspected within 15 days?
BMP-112159	5-31-2025	0.91	6-10-2025	10	Yes
BMP-113332	7-22-2025	0.97	8-5-2025	14	Yes
BMP-114288	9-5-2025	0.53	9-16-2025	11	Yes
BMP-114883	10-15-2025	0.72	10-21-2025	6	Yes

168.4 Stormwater Monitoring

168.4.1 Previous Stormwater Monitoring Results

Following the installation of baseline control measures, a baseline stormwater sample was collected on August 21, 2011. Analytical results from this sample yielded TAL exceedances for aluminum (1170 µg/L), gross-alpha activity (24.5 pCi/L), and total PCBs (0.00669 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2011, NPDES Permit No. NM0030759" (LANL 2012, 211408).

Following the installation of enhanced control measures at STRM-SMA-5.05, a corrective-action stormwater sample was collected on August 2, 2015. Analytical results from this sample yielded a TAL exceedance for total PCBs (0.00226 µg/L). The complete analytical results are presented in "Stormwater Individual Permit Annual Report, Reporting Period: January 1–December 31, 2015, NPDES Permit No. NM0030759" (LANL 2016, 601240).

168.4.2 Stormwater Monitoring during 2025

Stormwater monitoring was conducted at STRM-SMA-5.05 from April 16 through May 29, 2025, resulting in a monitoring season of 43 days. Two inspections performed during the monitoring period are summarized in Table 168-4. Rain gage RG240 recorded seven rain events exceeding 0.1 in. in 24 hr

while the sampling equipment was active. No new confirmation-monitoring samples were collected in 2025, and no sampling operability issues were encountered.

Certification of retention of volume of stormwater from a 3-yr 24-hr storm at RG240 was submitted to EPA in June 2025 (N3B 2025, 703837) and was also discussed in the July 2025 submittal of the response to EPA's comments on the SIP, dated April 29, 2025 (N3B 2025, 703881; EPA 2025, 703814), and "2024 Annual Sampling Implementation Plan, NPDES Permit No. NM0030759, Revision 1" (N3B 2025, 703881; EPA 703922). Stormwater monitoring is not required at S-SMA-3.51 per Permit Part I.D.1.c.

Table 168-5 Sampler Inspections during 2025

Inspection Reference	Inspection Date	Sample Retrieved?	Date(s) of Rain Events Exceeding 0.1 in. in 24 hr since Previous Inspection	Rainfall Intensity[a]/ Total[b] (in.)
SMPLR-111455	5-27-2025	No	5-2-2025 5-4-2025 5-5-2025 5-6-2025 5-7-2025 5-25-2025 5-26-2025	0.04/0.1 0.16/1.2 0.1/0.36 0.17/0.95 0.1/0.25 0.13/0.17 0.16/0.24
SMPLR-112093	5-29-2025	No	None	None

[a] Intensity = Maximum amount of precipitation in any 30-min interval.

[b] Total = Total amount of precipitation in 24 hr.

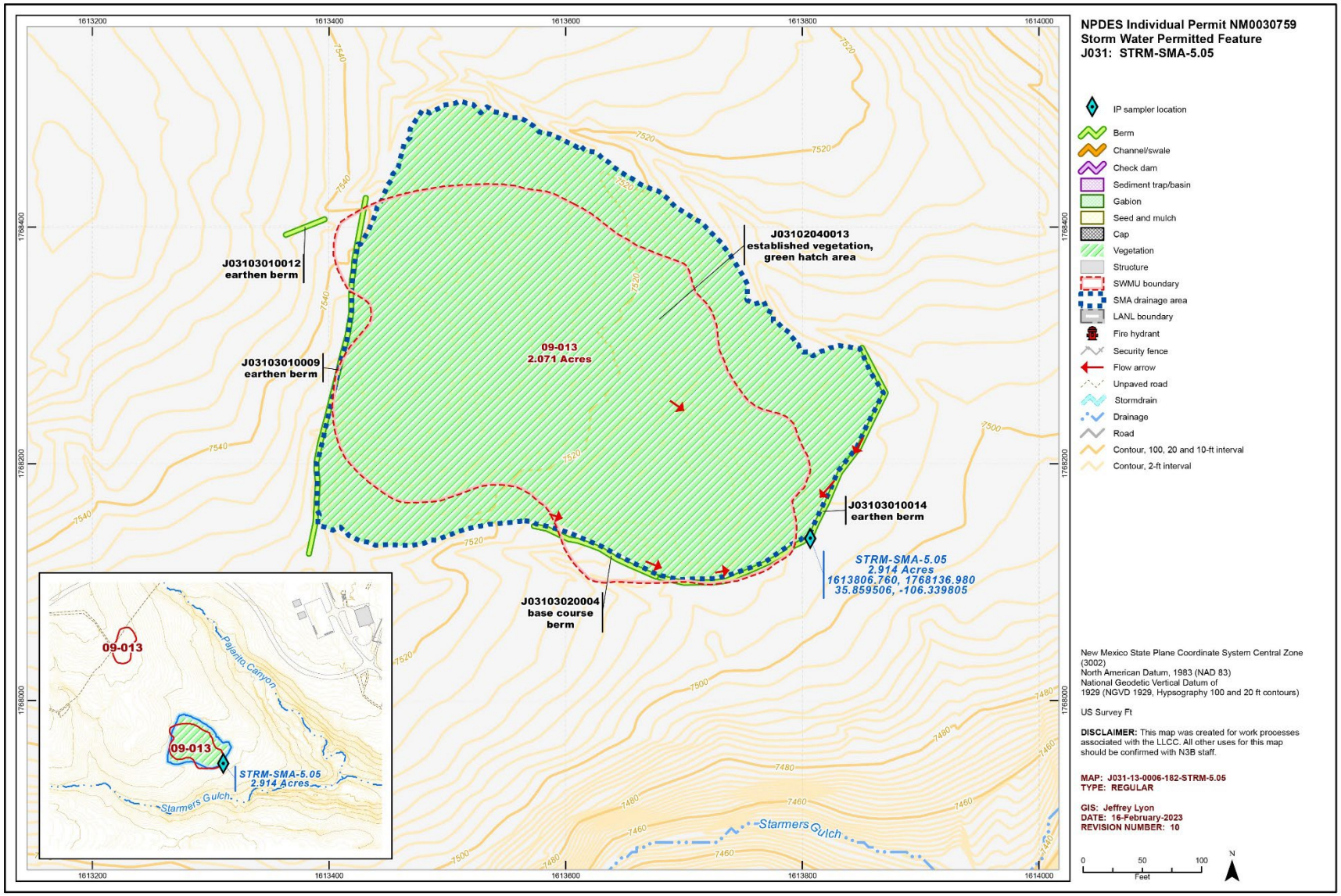

Figure 168-1 STRM-SMA-5.05 location map

Attachment 1
Amendments

Amendment Number	Effective Date	SMA Number or Section Number	Description of Changes	Type of Change*	Reference
V.3 2753	5-15-2025	2M-SMA-1.44	Retire Control - Damaged and/or Replaced-Control ID: E00403140016- coir log	T	CCN-111629
V.3 2754	5-15-2025	2M-SMA-1.44	Retire Control - Damaged and/or Replaced-Control ID: E00403140028- coir log	T	CCN-111629
V.3 2755	5-15-2025	2M-SMA-1.44	Retire Control - Life Cycle Ended - Control ID: E00403060019 - straw wattle	T	CCN-111629
V.3 2756	5-15-2025	2M-SMA-1.44	Retire Control - Life Cycle Ended - Control ID: E00403060020 - straw wattle	T	CCN-111629
V.3 2757	5-15-2025	2M-SMA-1.44	Retire Control - Life Cycle Ended - Control ID: E00403060021 - straw wattle	T	CCN-111629
V.3 2758	5-15-2025	2M-SMA-1.44	Retire Control - Life Cycle Ended - Control ID: E00403060023 - straw wattle	T	CCN-111629
V.3 2759	5-15-2025	2M-SMA-1.44	Retire Control - Life Cycle Ended - Control ID: E00403060024 - straw wattle	T	CCN-111629
V.3 2760	5-15-2025	2M-SMA-1.44	Retire Control - Life Cycle Ended - Control ID: E00403060027 - straw wattle	T	CCN-111629
V.3 2761	5-15-2025	2M-SMA-1.44	Map Revision (20)	T	CCN-111629
V.3 2762	5-19-2025	Global	Miscellaneous Edit - Activated classification ID for "coir roll" in classification module and added classification ID to all applicable procedure templates in Maintenance Connection database and in SDE.	T	CCN-111876
V.3 2763	5-29-2025	PJ-SMA-1.05	Miscellaneous Edit - Update status of earthen berm J00103010022 to be a certified total retention control.	T	CCN-111008
V.3 2764	6-3-2025	STRM-SMA-5.05	Miscellaneous Edit - Update status of earthen berm J03103010014 to be a certified total retention control.	T	CCN-111009
V.3 2765	7-9-2025	PJ-SMA-5.1	Site Boundary Change 22-010(b)	T	CCN-111949
V.3 2766	7-9-2025	PJ-SMA-5.1	Minor Sampler Adjustment, Updated location with coordinates in Map Revision 17 (amendment V.3 2768)	T	CCN-112281
V.3 2767	7-9-2025	PJ-SMA-5.1	SMA Boundary Modification, Updated Area in Map Revision 17 (amendment V.3 2768)	T	CCN-112281
V.3 2768	7-9-2025	PJ-SMA-5.1	Map Revision (17)	T	CCN-111949
V.3 2769	7-18-2025	PJ-SMA-11.1	New Control - Corrective Action Control ID: J01403210024 - coir roll	T	CCN-113205
V.3 2770	7-18-2025	PJ-SMA-11.1	New Control - Corrective Action Control ID: J01403210025 - coir roll	T	CCN-113205
V.3 2771	7-18-2025	PJ-SMA-11.1	Map Revision (19)	T	CCN-113205

Attachment 1, Amendments (continued)

Amendment Number	Effective Date	SMA Number or Section Number	Description of Changes	Type of Change*	Reference
V.3 2772	10-16-2025	2M-SMA-1.8	Minor Sampler Adjustment, Updated location with coordinates in Map Revision 14 (amendment V.3 2781)	T	CCN-114676
V.3 2773	10-16-2025	2M-SMA-1.8	New Control - Corrective Action Control ID: E01003100017 - gravel bags	T	CCN-114676
V.3 2774	10-16-2025	2M-SMA-1.8	New Control - Corrective Action Control ID: E01003200013 - compost log	T	CCN-114676
V.3 2775	10-16-2025	2M-SMA-1.8	New Control - Corrective Action Control ID: E01003200014 - compost log	T	CCN-114676
V.3 2776	10-16-2025	2M-SMA-1.8	New Control - Corrective Action Control ID: E01003200015 - compost log	T	CCN-114676
V.3 2777	10-16-2025	2M-SMA-1.8	New Control - Corrective Action Control ID: E01003200016 - compost log	T	CCN-114676
V.3 2778	10-16-2025	2M-SMA-1.8	Retire Control - Damaged and/or Replaced-Control ID: E01003040003 - asphalt berm	T	CCN-114676
V.3 2779	10-16-2025	2M-SMA-1.8	Retire Control - Damaged and/or Replaced-Control ID: E01003100012 - gravel bags	T	CCN-114676
V.3 2780	10-16-2025	2M-SMA-1.8	Retire Control - Damaged and/or Replaced-Control ID: E01006010004 - rock check dam	T	CCN-114676
V.3 2781	10-16-2025	2M-SMA-1.8	Map Revision (14)	T	CCN-114676
V.3 2782	10-21-2025	2M-SMA-1.9	New Control - Corrective Action Control ID: E01103120007 - rock berm	T	CCN-114849
V.3 2783	10-21-2025	2M-SMA-1.9	New Control - Corrective Action Control ID: E01103120008 - rock berm	T	CCN-114849
V.3 2784	10-21-2025	2M-SMA-1.9	Retire Control - Damaged and/or Replaced-Control ID: E01103100003 - gravel bags	T	CCN-114849
V.3 2785	10-21-2025	2M-SMA-1.9	Retire Control - Damaged and/or Replaced-Control ID: E01103100006 - gravel bags	T	CCN-114849
V.3 2786	10-21-2025	2M-SMA-1.9	Map Revision (9)	T	CCN-114849
V.3 2787	10-29-2025	PJ-SMA-20	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-114847
V.3 2788	10-29-2025	PJ-SMA-20	New Control - Corrective Action Control ID: J02706010008 - rock check dam	T	CCN-114847
V.3 2789	10-29-2025	PJ-SMA-20	New Control - Corrective Action Control ID: J02706010009 - rock check dam	T	CCN-114847
V.3 2790	10-29-2025	PJ-SMA-20	New Control - Corrective Action Control ID: J02706010010 - rock check dam	T	CCN-114847
V.3 2791	10-29-2025	PJ-SMA-20	Map Revision (8)	T	CCN-114847
V.3 2792	11-4-2025	PJ-SMA-11	Miscellaneous Edit - Reclassify control -0032 from coir log to coir roll. Control ID changed from J01303140032 to J01303210032.	T	CCN-111877
V.3 2793	11-4-2025	PJ-SMA-11	Map Revision (21)	T	CCN-111877

Attachment 1, Amendments (continued)

Amendment Number	Effective Date	SMA Number or Section Number	Description of Changes	Type of Change*	Reference
V.3 2794	11-20-2025	Volume 3	Miscellaneous Edit - Ensure all controls associated with the Pajarito watershed retired under CCN-96244 (See 2022 SDPPP amendment V.3 2648) are appropriately archived in SDE. These controls are still available in active IP data layers in SDE.	E	CCN-115186
V.3 2795	12-8-2025	2M-SMA-1	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-114837
V.3 2796	12-8-2025	2M-SMA-1	Map Revision (18)	T	CCN-114837
V.3 2797	12-8-2025	2M-SMA-1.44	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115157
V.3 2798	12-8-2025	2M-SMA-1.44	Map Revision (21)	T	CCN-115157
V.3 2799	12-8-2025	2M-SMA-1.67	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115158
V.3 2800	12-8-2025	2M-SMA-1.67	Map Revision (13)	T	CCN-115158
V.3 2801	12-8-2025	2M-SMA-1.9	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-112440
V.3 2802	12-8-2025	2M-SMA-1.9	Map Revision (10)	T	CCN-112440
V.3 2803	12-8-2025	2M-SMA-2	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115049
V.3 2804	12-8-2025	2M-SMA-2	Map Revision (16)	T	CCN-115049
V.3 2805	12-9-2025	2M-SMA-2.2	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115048
V.3 2806	12-9-2025	2M-SMA-2.2	Map Revision (11)	T	CCN-115048
V.3 2807	12-9-2025	3M-SMA-0.5	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115050
V.3 2808	12-9-2025	3M-SMA-0.5	Map Revision (12)	T	CCN-115050
V.3 2809	1-6-2026	PJ-SMA-2	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115144
V.3 2810	1-6-2026	PJ-SMA-2	Map Revision (15)	T	CCN-115144
V.3 2811	1-12-2026	3M-SMA-0.6	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115051
V.3 2812	1-12-2026	3M-SMA-0.6	Map Revision (14)	T	CCN-115051
V.3 2813	1-12-2026	3M-SMA-4	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115090
V.3 2814	1-12-2026	3M-SMA-4	Map Revision (11)	T	CCN-115090
V.3 2815	1-12-2026	PJ-SMA-1.05	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115122
V.3 2816	1-12-2026	PJ-SMA-1.05	Map Revision (14)	T	CCN-115122
V.3 2817	1-12-2026	PJ-SMA-18	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115143

Attachment 1, Amendments (continued)

Amendment Number	Effective Date	SMA Number or Section Number	Description of Changes	Type of Change*	Reference
V.3 2818	1-12-2026	PJ-SMA-18	Map Revision (9)	T	CCN-115143
V.3 2819	1-12-2026	STRM-SMA-1.5	Miscellaneous Edit - Update Map labels to be consistent per amendment V.3 2821.	E	CCN-115164
V.3 2820	1-12-2026	STRM-SMA-1.5	Map Revision (16)	T	CCN-115164
V.3 2821	1-20-2026	Global	Miscellaneous Edit - Updates classification names in Maintenance Connection classification module for consistency on maps. Map labels for all classification names apart from those associated with acronyms will be lower case. Additionally, water bar will be revised to be one word; riprap should be displayed as one word; shotcrete cap label revised to shotcrete; permanent vegetation vegetative buffer strip label revised to vegetative buffer strip; gabion will be labeled in the singular; curb will be labeled as curbing.	T	CCN-115104

*T = Technical, E = Errata.

Attachment 2
Vicinity Map