

MS4 Stormwater Permit

MS4 Permit Description

- MS4 stands for Municipal Separate Storm Sewer System
- MS4 Permit applies to centralized storm drainage systems within the Albuquerque Urbanized Area
- Other Permittees include Kirtland Air Force Base (KAFB), University of New Mexico, NM Department of Transportation, City of Albuquerque, Bernalillo County, Albuquerque Metropolitan Area Flood Control Authority
- Permit issued December, 2014; the permit term is 5 years. A new MS4 Permit will be issued in 2019
- Permit requires 7 control measure programs, water quality monitoring of all MS4 inflows and outflows, and annual reporting

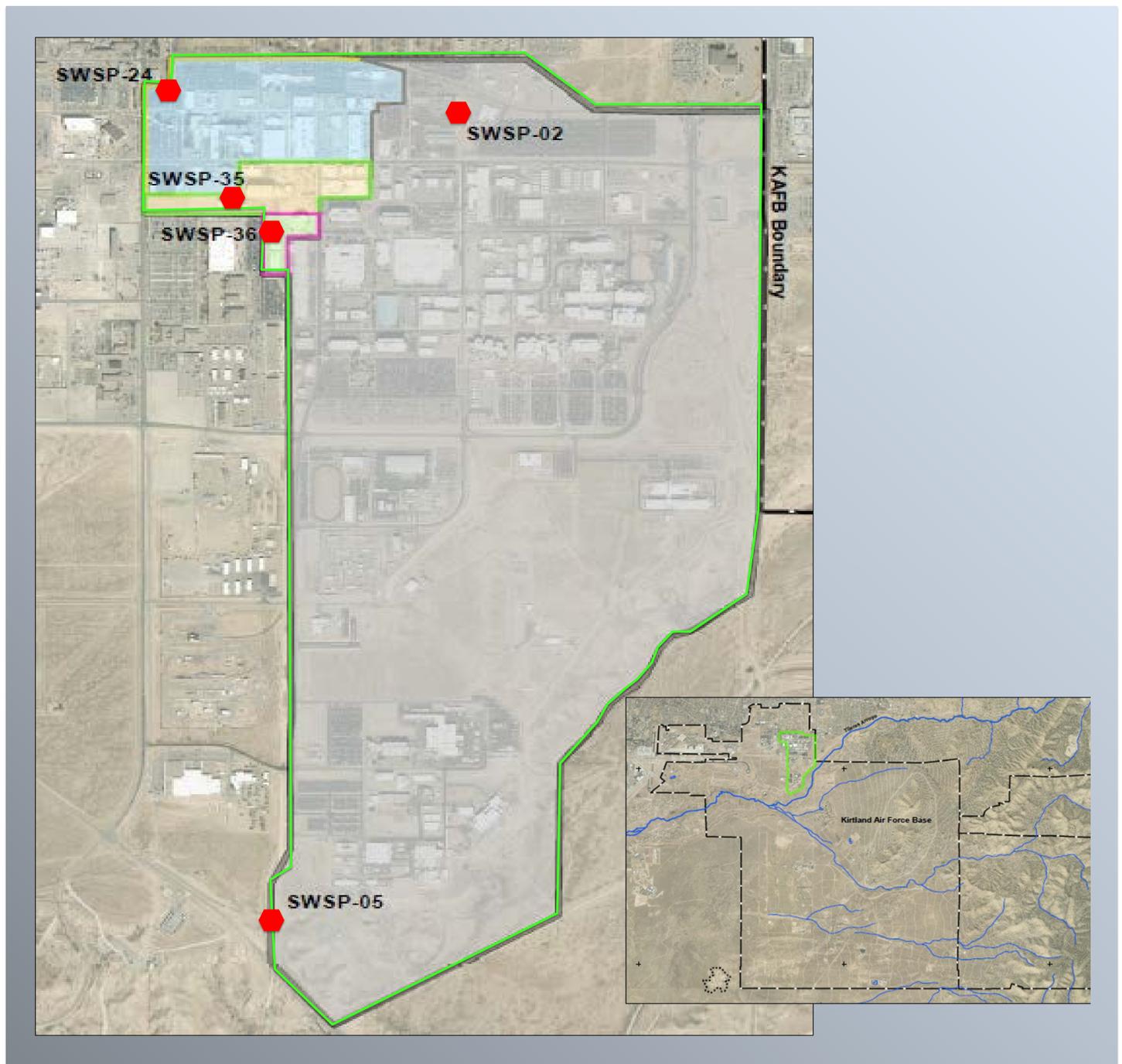
SNL/NM MS4 Description

- SNL/NM MS4 includes TA-I, TA-II, and TA-IV. Total area = 742 acres
- 90% of MS4 drains south to Tijeras Arroyo
- 10% of MS4 drains west to KAFB, then north to KAFB detention basins
- 5 water quality monitoring locations (1 inflow, 4 outflows)



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Control Measure Programs

The seven control measure programs are designed to prevent pollutants from entering the storm drain system and/or being discharged from the MS4.

Construction Site Runoff Control

- Compliance with Construction General Permit
- Stormwater Pollution Prevention Plans
- Conducted ~50 inspections in 2017 within the MS4

Post-Construction Site Runoff Control

- Compliance with Energy Independence Security Act (EISA) Section 438
- Maintain pre-development hydrology
- Reduce and slow runoff using Green Infrastructure/Low Impact Development (GI/LID) practices and stormwater Best Management Practices (BMPs)

Pollution Prevention and Good Housekeeping

- Chemical inventory and tracking program
- Waste Management and Recycling Program
- Pest Management Plan and Gardener's Manual
- Sediment Control Plan

Illicit Discharge Detection and Elimination

- Corporate policies, procedures, and training
- Regular screening and monitoring of MS4
- Coordination with Facilities Management and Operations to prevent Illicit Discharges

Control of Floatables

- Waste Management and Recycling Program
- Block & Gravel inlet protection
- Street sweeping plan
- Bi-weekly inspections and maintenance of outfalls

Public Education and Outreach

- Provided stormwater training to ~250 Sandia employees and contractors in 2017
- "Stormwater - Keep It Clean" campaign
- Watershed model presentations to local students

Public Involvement and Participation

- Annual Reports, Discharge Monitoring Reports, and Updated Stormwater Management Program Plan
- 30 day public review and comment period each year
- All EPA deliverables are available to the public through the UNM Digital Repository website:
http://digitalrepository.unm.edu/snl_ms4/
- Participation in DoD/DOE public meetings



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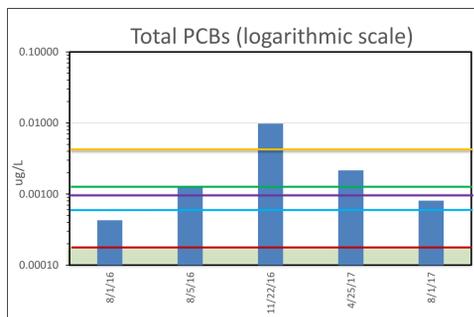
Water Quality Monitoring

Water quality monitoring is conducted to identify pollutants entering the stormdrain system in order to guide improvements to the control measure programs.

MS4 Stormwater Quality Data Collected at SWSP-05 Since Permit Inception



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Albuquerque Metro Stormwater (a)	Median = 0.00428 Range: ND-0.124
SWSP-05 Discharge	Median = 0.00127 Range: 0.000428-0.0098
Pajarito Plateau Baseline Runoff (b)	Median = 0.00097 Range: 0.00023-0.0207
Sandia Peak Snow Samples (b)	Median = 0.00059 Range: 0.00053-0.00065
MS4 Water Quality Standard	0.00017 ug/L

(a) U.S. Geological Survey, Scientific Investigations Report 2015-5006. Summary of Urban Stormwater Quality in Albuquerque, NM 2003-2012. 2015.
(b) Los Alamos National Laboratory, LA-UR-12-1081. PCBs in Precipitation and Stormwater Within the Upper Rio Grande Watershed. May, 2012.

PCB and E. Coli

Focused Pollutant Reduction Activities

- Additional Sediment Reduction BMPs
- Microbial Source Tracking & Reduction
- PCB Source Tracking & Reduction
- Atmospheric PCB Deposition Monitoring

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