

TABLE 11-2
2002-2014 Hazardous Metals Storm Water Monitoring Results

Sample Location	Date	Arsenic (As) mg/L	Barium (Ba) mg/L	Cadmium (Cd) mg/L	Chromium (Cr) mg/L	Copper (Cu) mg/L	Lead (Pb) mg/L	Manganese (Mn) mg/L	Mercury (Hg) mg/L	Nickel (Ni) mg/L	Selenium (Se) mg/L	Silver (Ag) mg/L	Zinc (Zn) mg/L
Outfall-1	8/9/2002	<0.006	0.019	<0.001	<0.001	0.009	<0.003	0.008	<0.0002	<0.003	<0.004	<0.002	0.009
	12/12/2003	<0.05	<0.004	<0.004	<0.007	<0.006	<0.1	<0.002	<0.0002	<0.02	<0.08	<0.008	<0.02
	11/1/2004	<0.04	0.0404	<0.01	<0.01	0.0164	<0.04	0.0632	<0.0002	<0.05	<0.1	<0.01	0.163
	10/31/2005	<0.05	0.047	<0.004	<0.007	0.014	<0.1	<0.002	<0.0002	<0.004	<0.08	0.105	0.245
	10/10/2006	<0.01	<0.01	<0.01	<0.01	0.015	<0.01	0.024	<0.0002	<0.01	<0.01	<0.01	0.063
	12/17/2007	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	<0.01	<0.01	0.011
	11/20/2009	<0.01	0.014	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	0.014	<0.01	0.026
	11/15/2011	<0.005	0.053	0.002	0.011	0.023	0.01	0.065	<0.0002	0.003	0.002	<0.001	0.254
	9/20/2013	<0.005	0.004	<0.001	<0.005	0.001	<0.005	0.003	<0.0002	<0.001	<0.005	0.001	0.011
	12/14/2014	<0.005	0.016	<0.001	0.002	0.007	<0.005	0.019	<0.0002	0.001	<0.005	<0.001	0.086
Outfall-2	8/9/2002	<0.006	0.013	<0.001	<0.001	0.007	<0.003	<0.003	<0.0002	<0.003	<0.004	<0.002	<0.006
	12/12/2003	<0.05	<0.004	<0.004	0.011	<0.006	<0.01	<0.002	<0.0002	<0.02	<0.08	<0.008	0.03
	11/1/2004	<0.04	<0.01	<0.01	<0.01	<0.01	<0.04	<0.01	<0.0002	<0.05	<0.1	<0.01	<0.04
	10/31/2005	<0.05	<0.004	<0.004	<0.007	<0.006	<0.1	<0.002	<0.0002	<0.004	<0.08	<0.106	<0.02
	10/10/2006	<0.01	0.01	<0.01	<0.01	0.016	<0.01	<0.01	<0.0002	<0.01	<0.01	<0.01	0.019
	12/17/2007	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	<0.01	<0.01	0.041
	11/20/2009	<0.01	0.016	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	0.013	<0.01	0.011
	11/15/2011	<0.005	0.027	0.001	0.004	0.014	0.004	0.023	<0.0002	0.002	0.005	<0.001	0.194
	9/20/2013	<0.005	0.011	<0.001	<0.005	0.004	<0.005	0.01	<0.0002	<0.001	<0.005	<0.001	0.071
	12/17/2014	<0.005	0.03	<0.001	0.004	0.009	<0.005	0.028	<0.0002	0.002	<0.005	<0.001	0.219
Outfall-8	8/9/2002	<0.006	0.056	<0.001	<0.001	0.008	<0.003	0.044	<0.0002	<0.003	<0.004	<0.002	<0.006
	2/4/2004	<0.05	0.05	<0.004	<0.007	0.01	0.2	0.012	<0.0002	<0.004	<0.08	0.018	<0.02
Outfall-12 ¹	11/1/2004	<0.04	0.0581	<0.01	0.0142	<0.01	<0.04	0.245	<0.0002	<0.05	<0.1	<0.01	0.0652
	3/29/2006	<0.05	0.06	0.04	<0.007	<0.006	<0.1	<0.02	<0.0002	0.03	<0.08	<0.008	<0.02
	10/25/2006	<0.01	0.018	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	0.011	<0.01	<0.01
Outfall-13	8/9/2002	<0.006	0.017	<0.001	<0.001	<0.006	<0.003	0.024	<0.0002	<0.003	<0.004	<0.002	<0.006
	12/12/2003	<0.05	0.085	<0.004	<0.007	<0.006	<0.1	0.031	<0.0002	<0.02	<0.08	<0.008	<0.02
	11/15/2004	<0.05	<0.004	<0.004	<0.007	<0.006	<0.1	0.002	<0.0002	<0.004	<0.08	<0.008	<0.02
	11/1/2004	<0.04	0.0105	<0.01	<0.01	<0.01	<0.04	<0.01	<0.0002	<0.05	<0.1	<0.01	<0.04
	10/31/2005	<0.05	<0.004	<0.004	<0.007	<0.006	<0.1	<0.002	<0.0002	<0.004	<0.08	0.109	<0.02
	10/10/2006	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	<0.01	<0.01	0.023
	12/17/2007	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	<0.01	<0.01	0.034
	11/20/2009 ²	<0.01	0.022	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	0.013	<0.01	0.033
	11/20/2009 ³	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	0.016	<0.01	0.014
	11/15/2011	<0.005	0.009	<0.001	0.002	0.007	0.006	0.012	<0.0002	0.001	0.004	<0.001	0.053
9/20/2013	<0.005	0.003	<0.001	<0.005	0.001	<0.005	0.003	<0.0002	0.001	<0.005	<0.001	0.016	
12/17/2014	<0.005	0.009	<0.001	0.001	0.009	<0.005	0.009	<0.0002	0.001	<0.005	<0.001	0.07	
Outfall-16	8/9/2002	<0.006	0.052	<0.001	0.01	<0.006	0.006	0.155	<0.0002	0.006	<0.004	<0.002	0.032
	12/12/2003	<0.05	0.107	<0.004	0.019	<0.006	0.1	<0.002	<0.0002	<0.02	<0.08	<0.008	0.02
	11/1/2004	<0.04	0.0269	<0.01	<0.01	<0.01	<0.04	0.11	<0.0002	<0.05	<0.1	<0.01	0.0554
	10/31/2005	<0.05	<0.04	<0.004	<0.007	<0.006	<0.1	<0.002	<0.0002	<0.004	<0.08	0.104	<0.02
	10/10/2006	<0.01	0.03	<0.01	<0.01	0.013	<0.01	0.013	<0.0002	<0.01	<0.01	<0.01	<0.01
	12/17/2007	<0.01	0.016	<0.01	<0.01	<0.01	<0.01	0.06	<0.0002	<0.01	<0.01	<0.01	0.044
	11/20/2009 ⁴	<0.01	0.014	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	0.017	<0.01	<0.01
	11/20/2009 ⁵	<0.01	0.024	<0.01	0.031	<0.01	<0.01	0.012	<0.0002	<0.01	0.018	<0.01	0.018
	11/15/2011	<0.005	0.018	<0.001	0.003	0.018	0.003	0.038	<0.0002	0.002	0.001	<0.001	0.062
	9/20/2013	<0.005	0.011	<0.001	<0.005	0.004	<0.005	0.016	<0.0002	0.001	<0.005	<0.001	0.017
12/17/2014	<0.005	0.021	<0.001	0.003	0.01	<0.005	0.029	<0.0002	0.001	<0.005	<0.001	0.076	
Outfall-21	8/9/2002	<0.006	0.013	<0.001	<0.001	0.007	<0.003	<0.003	<0.0002	<0.003	<0.004	<0.002	<0.006
	12/12/2003	<0.05	0.008	<0.004	<0.007	<0.006	<0.1	<0.002	<0.0002	<0.02	<0.08	<0.008	<0.02
	11/1/2004	<0.04	0.0282	<0.01	<0.01	<0.01	<0.04	0.0102	<0.0002	<0.05	<0.100	<0.01	<0.04
	10/31/2005	<0.05	<0.004	<0.004	<0.007	<0.006	<0.1	<0.002	<0.0002	<0.004	<0.08	0.106	<0.02
	10/10/2006	<0.01	0.033	<0.01	<0.01	0.015	<0.01	<0.01	<0.0002	<0.01	<0.01	<0.01	0.015
	12/17/2007	<0.01	0.013	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	<0.01	<0.01	<0.01
	11/20/2009	<0.01	0.025	<0.01	<0.01	<0.01	<0.01	<0.01	<0.0002	<0.01	0.013	<0.01	<0.01
	11/15/2011	<0.005	0.042	<0.001	0.006	0.034	0.005	0.036	<0.0002	0.003	0.006	<0.001	0.112
	9/20/2013	<0.005	0.046	<0.001	<0.005	0.007	<0.005	0.011	<0.0002	0.001	<0.005	0.001	0.015
	12/17/2014	<0.005	0.036	<0.001	0.005	0.022	0.005	0.035	<0.0002	0.003	<0.005	<0.001	0.139
Outfall-24 ⁶	11/20/2009	<0.01	0.043	<0.01	0.01	<0.01	<0.01	0.111	<0.0002	<0.01	0.017	<0.01	0.033

mg/L = milligrams per liter

¹The DOA replaced Outfall-8 with Outfall-12 for the 2004 TPDES permit cycle. Outfall-12 collects run-off from the west runway just as

²Sample collected up-gradient of DP-13 from WQP-A filter basin.

³Sample collected up-gradient of DP-13 from WQP-C filter basin.

TABLE 11-2

2002-2014 Hazardous Metals Storm Water Monitoring Results

⁴Sample collected up-gradient of Outfall-16 from north fork filter basin.

⁵Sample collected up-gradient of Outfall-16 from south fork filter basin.

⁶The DOA replaced Outfall-12 with Outfall-24 for the 2009 permit cycle. The substitution was made to improve sample collection from this industrial area.

The DOA elected to utilize the hazardous metals waiver option as described in Part III Section D. of the TPDES General Permit No. TXR050000 for the 2008, 2010 and 2012 numeric effluent monitoring periods. The signed waivers are maintained in the main SWP3 file system.