

APPENDIX I.C - Storm Water Discharges Associated with Industrial Activity from Chemical and Allied Products Manufacturing and Refining Facilities

A. Coverage of This Section.

1. Discharges Covered Under This Section. The requirements listed under this Part shall apply to storm water discharges from the following activities:

Table I.C.1 – Sector C: Chemical and Allied Products Manufacturing and Refining

SIC Code	Activity Represented
2812 – 2879	Industrial Inorganic Chemicals
2821 – 2824	Plastics Materials and Synthetic Resins, Synthetic Rubber, Cellulosic and Other Manmade Fibers Except Glass
2833 – 2836	Medicinal Chemicals and Botanical Products; Pharmaceutical Preparations; in vitro and in vivo Diagnostic Substances; and Biological Products, Except Diagnostic Substances
2841 – 2844	Soaps, Detergents, and Cleaning Preparations; Perfumes, Cosmetics, and Other Toilet Preparations
2851	Paints, Varnishes, Lacquers, Enamels, and Allied Products
2861 – 2869	Industrial Organic Chemicals
2873 – 2879	Agricultural Chemicals
2891 – 2899	Miscellaneous Chemical Products
2911	Petroleum Refining
3952 (limited to inks and paints listed)	Inks and Paints, Including China Painting Enamels, India Ink, Drawing Ink, Platinum Paints for Burnt Wood or Leather Work, Paints for China Painting, Artist’s Paints and Artist’s Watercolors

2. Sector Specific Limitations on Coverage. There are no additional limitations on coverage other than those listed in *Part I.C.*
3. Sector Specific Prohibition of Non-Stormwater Discharges. In addition to those non-storm water discharges prohibited under *Part I.D.2*, this permit does not authorize the discharge of:
 - a. Inks, paints, or substances (hazardous, nonhazardous, etc.) resulting from an onsite spill, including materials collected in drip pans;
 - b. Wash water from material handling and processing areas. This includes areas where containers, equipment, industrial machinery, and any significant materials are exposed to storm water; and
 - c. Wash water from drum, tank, or container rinsing and cleaning. The operators of such discharges must obtain coverage under a separate *UPDES* wastewater discharge permit.

B. Sector Specific Control Measures and Effluent Limits.

There are no additional control measures and effluent limits beyond those in *Part III* of this permit.

C. Sector Specific Inspection Requirements.

There are no additional inspection requirements beyond those in *Part IV.A* of this permit.

D. Sector Specific Plan Requirements.

There are no additional Plan requirements beyond those in *Part VII.D* of this permit.

E. Monitoring Requirements.

1. Analytical Benchmark Monitoring. The following analytical benchmark monitoring parameters shall apply specifically to sector C facilities. Parameters found in this Part apply to both primary industrial activities and any co-located industrial activities. The facility may be subject to the requirements of more than one of the following:

Table I.C.2 – Analytical Benchmark Monitoring Parameters for Industrial Inorganic Chemicals (SIC 2812 – 2819)

Parameter	Benchmark Monitoring Concentration
Total Recoverable Aluminum	1.1 mg/L
Nitrate plus Nitrite Nitrogen	0.68 mg/L

Table I.C.3 – Analytical Benchmark Monitoring Parameters for Plastics, Synthetics, and Resins (SIC 2821 – 2824)

Parameter	Benchmark Monitoring Concentration
Total Recoverable Zinc (freshwater)	Hardness Dependent ¹
Total Recoverable Zinc (saltwater) ²	0.090 mg/L

¹. The freshwater analytical benchmark monitoring values of some metals are dependent on water hardness. For these parameters, permittees must determine the hardness of the receiving water to identify the applicable 'hardness range' for determining the analytical benchmark monitoring value applicable to the facility. Hardness dependent analytical benchmark monitoring shall follow the table below:

Freshwater Hardness Range	Zinc (mg/L)
0.00 – 24.99 mg/L	0.037
25 – 24.99 mg/L	0.052
50 – 74.99 mg/L	0.080
75 – 99.99 mg/L	0.107
100 – 124.99 mg/L	0.132
125 – 149.99 mg/L	0.157
150 – 174.99 mg/L	0.181
175 – 199.99 mg/L	0.204
200 – 224.99 mg/L	0.227
225 – 249.99 mg/L	0.249
250+ mg/L	0.260

If hardness cannot be determined (groundwater or inaccessible waterbodies), use the most conservative values (0-24.99 mg/L range).

² Saltwater benchmark values apply to stormwater discharges into saline waters where indicated.

Table I.C.4 – Analytical Benchmark Monitoring Parameters for Soaps, Detergents, Cosmetics, and Perfumes (SIC 2841 – 2844)

Parameter	Benchmark Monitoring Concentration
Nitrate plus Nitrite Nitrogen	0.68 mg/L
Total Recoverable Zinc (freshwater)	Hardness Dependent ¹
Total Recoverable Zinc (saltwater) ²	0.090 mg/L

¹ The freshwater analytical benchmark monitoring values of some metals are dependent on water hardness. For these parameters, permittees must determine the hardness of the receiving water to identify the applicable 'hardness range' for determining the analytical benchmark monitoring value applicable to the facility. Hardness dependent analytical benchmark monitoring shall follow the table below:

Freshwater Hardness Range	Zinc (mg/L)
0.00 – 24.99 mg/L	0.037
25 – 24.99 mg/L	0.052
50 – 74.99 mg/L	0.080
75 – 99.99 mg/L	0.107
100 – 124.99 mg/L	0.132
125 – 149.99 mg/L	0.157
150 – 174.99 mg/L	0.181
175 – 199.99 mg/L	0.204
200 – 224.99 mg/L	0.227
225 – 249.99 mg/L	0.249
250+ mg/L	0.260

If hardness cannot be determined (groundwater or inaccessible waterbodies), use the most conservative values (0-24.99 mg/L range).

² Saltwater benchmark values apply to stormwater discharges into saline waters where indicated.

Table I.C.5 – Analytical Benchmark Monitoring Parameters for Agricultural Chemicals (SIC 2873 – 2879)

Parameter	Benchmark Monitoring Concentration
Nitrate plus Nitrite Nitrogen	0.68 mg/L
Total Recoverable Lead (freshwater)	Hardness Dependent ¹
Total Recoverable Lead (saltwater) ²	0.210 mg/L

Total Recoverable Zinc (freshwater)	Hardness Dependent ¹
Total Recoverable Zinc (saltwater) ²	0.090 mg/L
Total Phosphorus	2.0 mg/L

¹. The freshwater analytical benchmark monitoring values of some metals are dependent on water hardness. For these parameters, permittees must determine the hardness of the receiving water to identify the applicable ‘hardness range’ for determining the analytical benchmark monitoring value applicable to the facility. Hardness dependent analytical benchmark monitoring shall follow the table below:

Freshwater Hardness Range	Lead (mg/L)	Zinc (mg/L)
0.00 – 24.99 mg/L	0.014	0.037
25 – 24.99 mg/L	0.024	0.052
50 – 74.99 mg/L	0.045	0.080
75 – 99.99 mg/L	0.069	0.107
100 – 124.99 mg/L	0.095	0.132
125 – 149.99 mg/L	0.123	0.157
150 – 174.99 mg/L	0.152	0.181
175 – 199.99 mg/L	0.182	0.204
200 – 224.99 mg/L	0.213	0.227
225 – 249.99 mg/L	0.246	0.249
250+ mg/L	0.262	0.260

If hardness cannot be determined (groundwater or inaccessible waterbodies), use the most conservative values (0-24.99 mg/L range).

². Saltwater benchmark values apply to stormwater discharges into saline waters where indicated.

2. **Numeric Effluent Limitation Monitoring.** Numeric effluent limitation monitoring shall be required for sector C facilities conducting certain industrial activities. The concentration of pollutants in stormwater discharges, independent of comingling, as discussed in *Part V.C.2*, shall not exceed the following effluent limitations at any time during the duration of permit coverage.

Table I.C.6 – Numeric Effluent Limitation Monitoring Parameters

Industrial Activity	Parameter	Effluent Limitation
Runoff from phosphate fertilizer manufacturing facilities (SIC 2874) that comes into contact with any raw materials, finished product, by-products or waste products	Total Phosphorus (as P)	105 mg/L, daily maximum
		35 mg/L, 30-day average ¹
	Fluoride	75 mg/L, daily maximum
		25 mg/L, 30-day average ¹

¹. For averaging purposes, you may use a value of zero for any individual sample parameter which is determined to be less than the method detection limit. For sample values that fall between the method detection limit and the quantitation limit (i.e., a confirmed detection but below the level that can be reliably quantified), use a value halfway between zero and the quantitation limit.