

Emission Sources - Maximum Allowable Emission Rates  
Permit Number 32770

This table lists the maximum allowable emission rates and all sources of air contaminants on the applicant's property covered by this permit. The emission rates shown are those derived from information submitted as part of the application for permit and are the maximum rates allowed for these facilities, sources, and related activities. Any proposed increase in emission rates may require an application for a modification of the facilities covered by this permit.

Air Contaminants Data

| Emission Point No. (1) | Source Name (2)             | Air Contaminant Name (3)       | Emission Rates |         |
|------------------------|-----------------------------|--------------------------------|----------------|---------|
|                        |                             |                                | lbs/hour       | TPY (4) |
| FV612F2001             | Process Heater              | VOC                            | 0.08           | 0.02    |
|                        |                             | NO <sub>x</sub>                | 0.90           | 0.27    |
|                        |                             | CO                             | 1.37           | 0.41    |
|                        |                             | PM                             | 0.11           | 0.03    |
|                        |                             | PM <sub>10</sub>               | 0.11           | 0.03    |
|                        |                             | PM <sub>2.5</sub>              | 0.11           | 0.03    |
|                        |                             | SO <sub>2</sub>                | 0.01           | <0.01   |
| FV612F3001             | Process Heater              | VOC                            | 0.08           | 0.02    |
|                        |                             | NO <sub>x</sub>                | 0.90           | 0.27    |
|                        |                             | CO                             | 1.37           | 0.41    |
|                        |                             | PM                             | 0.11           | 0.03    |
|                        |                             | PM <sub>10</sub>               | 0.11           | 0.03    |
|                        |                             | PM <sub>2.5</sub>              | 0.11           | 0.03    |
|                        |                             | SO <sub>2</sub>                | 0.01           | <0.01   |
| FUG                    | Aniline Plant Fugitives (5) | VOC                            | 0.57           | 2.48    |
|                        |                             | H <sub>2</sub> SO <sub>4</sub> | 0.03           | 0.12    |
|                        |                             | Nitric Acid                    | <0.01          | <0.01   |
|                        |                             | NH <sub>3</sub>                | 0.02           | 0.10    |
|                        |                             | Cl <sub>2</sub>                | <0.10          | 0.01    |
|                        |                             | NO <sub>x</sub>                | 0.08           | 0.36    |
| FT612T2002             | Aniline WIP/MNB Tank        | VOC                            | 4.96           | 0.16    |
| FT6122003A             | Aniline Product Tank        | VOC                            | 2.11           | --      |
| FT6122003B             | Aniline Product Tank        | VOC                            | 2.11           | --      |
| FT6122003A,            | Aniline Tanks Group         | VOC                            | --             | 0.66    |

Emission Sources - Maximum Allowable Emission Rates

|                           |                                      |                                |       |       |
|---------------------------|--------------------------------------|--------------------------------|-------|-------|
| FT6122003B                |                                      |                                |       |       |
| FT6122004                 | Weak Effluent Tank                   | VOC                            | <0.01 | <0.01 |
| FT6122007A                | Water Stripper Product Tank          | VOC                            | <0.01 | --    |
| FT6122007B                | Water Stripper Product Tank          | VOC                            | <0.01 | --    |
| FT6122007A,<br>FT6122007B | Wastewater Tanks Group               | VOC                            | --    | <0.01 |
| FS612C2007                | Water Stripper Feed Tank             | VOC                            | <0.01 | <0.01 |
|                           |                                      | NH <sub>3</sub>                | 0.10  | 0.05  |
| FT612T2102                | Crude Nitrobenzene Tank              | VOC                            | 0.16  | 0.70  |
| FT612T2103                | Nitrobenzene Tank                    | VOC                            | 0.71  | 0.28  |
| FT612T2104                | Sulfuric Acid Tank                   | H <sub>2</sub> SO <sub>4</sub> | <0.01 | <0.01 |
| FT612T2106                | Purified Nitrobenzene Tank           | VOC                            | 0.76  | 0.32  |
| FC612C2001                | Cooling Tower                        | VOC                            | 0.84  | 3.68  |
|                           |                                      | PM                             | 0.25  | 1.09  |
|                           |                                      | PM <sub>10</sub>               | 0.16  | 0.68  |
|                           |                                      | PM <sub>2.5</sub>              | <0.01 | <0.01 |
| FL612L2006                | Loading Emissions                    | VOC                            | 0.34  | 0.01  |
| FL612L2105                | Loading Emissions                    | VOC                            | <0.01 | <0.01 |
| FL612L2110                | Loading Emissions                    | VOC                            | 0.01  | <0.01 |
| MSS Emissions             |                                      |                                |       |       |
| ANI-MSSATM<br>ANI-TKTR    | MSS Tank Truck Loading/Unloading     | Aniline                        | 0.01  | 0.01  |
|                           |                                      | Benzene                        | 0.05  | 0.01  |
|                           |                                      | Nitrobenzene                   | 0.01  | 0.01  |
|                           |                                      | Toluene                        | 0.02  | 0.01  |
|                           |                                      | Total VOC                      | 0.09  | 0.04  |
| ANI-MSSATM<br>ANI-FLT     | Floating Roof Storage Tank Emissions | Aliphatics                     | 0.11  | 0.01  |
|                           |                                      | Benzene                        | 1.05  | 0.01  |
|                           |                                      | Dinitrobenzene                 | 0.01  | 0.01  |
|                           |                                      | Dinitrophenol                  | 0.01  | 0.01  |

Emission Sources - Maximum Allowable Emission Rates

|                          |                                    |                   |      |      |
|--------------------------|------------------------------------|-------------------|------|------|
|                          |                                    | Mononitrophenol   | 0.01 | 0.01 |
|                          |                                    | Nitrobenzene      | 0.06 | 0.01 |
|                          |                                    | Picric Acid       | 0.01 | 0.01 |
|                          |                                    | Total VOC         | 1.27 | 0.07 |
| ANI-MSSATM<br>ANI-INT    | Instrumentation                    | Total VOC         | 0.02 | 0.01 |
| ANI-MSSATM<br>ANI-SOL    | Solids Handling                    | PM <sub>2.5</sub> | 0.06 | 0.06 |
|                          |                                    | PM <sub>10</sub>  | 0.42 | 0.38 |
|                          |                                    | PM                | 0.88 | 0.80 |
| ANI-MSSATM<br>ANI-VACTR  | Vacuum Trucks                      | Aniline           | 0.01 | 0.01 |
|                          |                                    | Benzene           | 0.99 | 0.01 |
|                          |                                    | Nitrobenzene      | 0.01 | 0.01 |
|                          |                                    | Toluene           | 0.16 | 0.01 |
|                          |                                    | Residue           | 0.01 | 0.01 |
|                          |                                    | Total VOC         | 1.18 | 0.05 |
| ANI-MSSATM<br>ANI-UNCONT | Uncontrolled<br>Equipment Clearing | 4-Aminodiphenyl   | 0.01 | 0.01 |
|                          |                                    | Aliphatics        | 0.05 | 0.01 |
|                          |                                    | Aniline           | 0.52 | 0.11 |
|                          |                                    | Benzene           | 1.43 | 0.02 |
|                          |                                    | Cyclohexanone     | 0.01 | 0.01 |
|                          |                                    | Cyclohexylamine   | 0.03 | 0.01 |
|                          |                                    | Cyclohexanol      | 0.01 | 0.01 |
|                          |                                    | Dinitrobenzene    | 0.01 | 0.01 |
|                          |                                    | Dinitrophenol     | 0.01 | 0.01 |
|                          |                                    | Diphenylamine     | 0.01 | 0.01 |
|                          |                                    | m-diaminobenzene  | 0.01 | 0.01 |
|                          |                                    | Mononitrophenol   | 0.01 | 0.01 |
|                          |                                    | Nitrobenzene      | 2.66 | 0.05 |
|                          |                                    | o-Aminophenol     | 0.01 | 0.01 |
|                          |                                    | Oxalic Acid       | 0.01 | 0.01 |

Emission Sources - Maximum Allowable Emission Rates

|                        |                                  |                                       |      |       |
|------------------------|----------------------------------|---------------------------------------|------|-------|
|                        |                                  | Phenol                                | 0.01 | 0.01  |
|                        |                                  | Picric Acid                           | 0.01 | 0.01  |
|                        |                                  | Schiff Base (N-Cyclohexylidenaniline) | 0.01 | 0.01  |
|                        |                                  | Total VOC                             | 4.83 | 0.33  |
|                        |                                  | Ammonia                               | 0.12 | 0.01  |
|                        |                                  | Nitrogen Dioxide                      | 0.01 | 0.01  |
| ANI-MSSCNT<br>ANI-CONT | Controlled Equipment<br>Clearing | 4-Aminodiphenyl                       | 0.01 | 0.01  |
|                        |                                  | Aliphatics                            | 0.01 | <0.01 |
|                        |                                  | Aniline                               | 0.17 | <0.01 |
|                        |                                  | Benzene                               | 0.08 | <0.01 |
|                        |                                  | Cyclohexanone                         | 0.01 | <0.01 |
|                        |                                  | Cyclohexylamine                       | 0.01 | <0.01 |
|                        |                                  | Cyclohexanol                          | 0.01 | <0.01 |
|                        |                                  | Dinitrobenzene                        | 0.01 | <0.01 |
|                        |                                  | Dinitrophenol                         | 0.01 | 0.01  |
|                        |                                  | Diphenylamine                         | 0.01 | 0.01  |
|                        |                                  | m-diaminobenzene                      | 0.01 | 0.01  |
|                        |                                  | Mononitrophenol                       | 0.01 | 0.01  |
|                        |                                  | Nitrobenzene                          | 0.10 | 0.01  |
|                        |                                  | o-Aminophenol                         | 0.01 | 0.01  |
|                        |                                  | Oxalic Acid                           | 0.01 | 0.01  |
|                        |                                  | Phenol                                | 0.01 | 0.01  |
|                        |                                  | Picric Acid                           | 0.01 | 0.01  |
|                        |                                  | Schiff Base (N-Cyclohexylidenaniline) | 0.01 | 0.01  |
|                        |                                  | Total VOC                             | 0.50 | 0.01  |
|                        |                                  | Ammonia                               | 0.01 | 0.01  |
|                        |                                  | Nitrogen Dioxide                      | 0.01 | 0.01  |

(1) Emission point identification - either specific equipment designation or emission point number from plot plan.

Emission Sources - Maximum Allowable Emission Rates

- (2) Specific point source name. For fugitive sources, use area name or fugitive source name.
- (3)
  - CO - carbon monoxide
  - NO<sub>x</sub> - total oxides of nitrogen
  - PM - total particulate matter, suspended in the atmosphere, including PM<sub>10</sub> and PM<sub>2.5</sub>, as represented
  - PM<sub>10</sub> - particulate matter (PM) equal to or less than 10 microns in diameter, including PM<sub>2.5</sub>, as represented.
  - PM<sub>2.5</sub> - particulate matter equal to or less than 2.5 microns in diameter
  - SO<sub>2</sub> - sulfur dioxide
  - VOC - volatile organic compounds as defined in Title 30 Texas Administrative Code § 101.1
  - Cl<sub>2</sub> - Chlorine
  - H<sub>2</sub>SO<sub>4</sub> - Sulfuric Acid
  - NH<sub>3</sub> - Ammonia
  - MSS - maintenance, startup and shutdown
- (4) Compliance with annual emission limits (tons per year) is based on a 12 month rolling period.
- (5) Emission rate is an estimate and compliance is demonstrated by meeting the requirements of the applicable special conditions and permit application representations.

Date: March 26, 2019