

Facility Name: **GATX-Waycross**
City: Waycross
County: Ware
AIRS #: 04-13-299-00015

Application #: TV-16914 and TV-17173
Date Application Received: September 7, 2006 and December 20, 2006
Permit No: 4741-299-0015-V-02-0

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Introduction

This narrative is being provided to assist the reader in understanding the content of the attached draft Part 70 operating permit. Complex issues and unusual items are explained herein simpler terms and/or greater detail than is sometimes possible in the actual permit. This permit is being issued pursuant to: (1) Georgia Air Quality Act, O.C.G.A § 12-9-1, et seq. and (2) Georgia Rules for Air Quality Control, Chapter 391-3-1, and (3) Title V of the Clean Air Act. Section 391-3-1-.03(10) of the Georgia Rules for Air Quality Control incorporates requirements of Part 70 of Title 40 of the Code of Federal Regulations promulgated pursuant to the Federal Clean Air Act. The primary purpose of this permit is to consolidate and identify existing state and federal air requirements applicable to GATX-Waycross and to provide practical methods for determining compliance with these requirements. The following narrative is designed to accompany the draft permit and is presented in the same general order as the permit. It initially describes the facility receiving the permit, the applicable requirements and their significance, and the methods for determining compliance with those applicable requirements. This narrative is intended as an adjunct for the reviewer and to provide information only. It has no legal standing. Any revisions made to the permit in response to comments received during the public participation and EPA review process will be described in an addendum to this narrative.

I. Facility Description

A. Facility Identification

1. Facility Name: GATX-Waycross

2. Parent/Holding Company Name

General American Transportation Corporation

3. Previous and/or Other Name(s)

The facility is also known as GATX and GATC.

4. Facility Location

The facility is located at 2610 Industrial Boulevard, in Waycross, (Ware County), Georgia.

5. Attainment, Non-attainment Area Location, or Contributing Area

The facility is located in Ware County, outside of the non-attainment area.

B. Site Determination

There are no other facilities which could possibly be contiguous or adjacent and under common control.

C. Existing Permits

Table 1 below lists all current Title V permits, all amendments, 502(b)(10) changes, and off-permit changes, issued to the facility, based on a comparative review of form A.6, Current Permits, of the Title V application and the "Permit" file(s) on the facility found in the Air Branch office.

Table 1: List of Current Permits, Amendments, and Off-Permit Changes

Permit Number and/or Off-Permit Change	Date of Issuance/Effectiveness	Purpose of Issuance
4741-299-0015-V-01-0	July 14, 2003	Initial Title V Permit

D. Process Description

1. SIC Codes(s)

SIC code: 4741

2. Description of Product(s)

The facility cleans and refurbishes leased railcars.

3. Overall Facility Process Description

The facility consists of several independent processes: railcar cleaning operations, interior lining operations, and exterior coating operations.

4. Overall Process Flow Diagram

The facility provided a process flow diagram in their Title V permit application.

E. Regulatory Status

1. PSD/NSR

The facility is a potential major source for PSD review, but has taken a VOC limit of 249 tons per year in order to remain a minor source and avoid PSD review.

2. Title V Major Source Status by Pollutant

Table 2: Title V Major Source Status

Pollutant	Is the Pollutant Emitted?	If emitted, what is the facility's Title V status for the pollutant?		
		Major Source Status	Major Source Requesting SM Status	Non-Major Source Status
PM	✓			✓
PM ₁₀	✓			✓
SO ₂	✓			✓
VOC	✓	✓		
NO _x	✓			✓
CO	✓			✓
TRS	✓			✓
H ₂ S	✓			✓
Individual HAP	✓	✓		
Total HAPs	✓	✓		

3. MACT Standards

The facility is subject to 40 CFR Part 63, Subpart M – “*National Emission Standards for Hazardous Air Pollutants: Surface Coating of Miscellaneous Metal Parts and Products.*”

Application 16194 was submitted in response to EPD’s request for GATX to declare which MMMM compliance option it intends to use.

4. Program Applicability (AIRS Program Codes)

Program Code	Applicable (y/n)
Program Code 6 - PSD	No
Program Code 8 – Part 61 NESHAP	No
Program Code 9 - NSPS	No
Program Code M – Part 63 NESHAP	Yes
Program Code V – Title V	Yes

Regulatory Analysis

II. Facility Wide Requirements

A. Emission and Operating Caps:

The facility is limited to 249 tons per year of volatile organic compound (VOC) emissions.

B. Applicable Rules and Regulations

The addition of permit conditions containing applicable emission requirements under 40 CFR Part 63, Subpart Mmmm – “*National Emission Standards for Hazardous Air Pollutants: Surface Coating of Miscellaneous Metal Parts and Products.*” The addition will not cause any changes in the method of operation at this facility or in the emissions of regulated air pollutants.

C. Compliance Status

No noncompliance issues currently exist.

D. Operational Flexibility

The facility did not indicate that the process or equipment is involved in an alternate operating scenario.

E. Permit Conditions

Condition 2.1.1 limits the facility to 249 tons of VOC per year in order for the facility to remain a minor source under PSD regulations.

III. Regulated Equipment Requirements

A. Brief Process Description

Railcar Cleaning Operations (Equipment Group 0002): Liquid residual amounts of commodities in the railcars are removed for sale or disposal off-site. The cars are then sent to the cleaning station where residual vapors are removed by one of four systems depending on the type of vapors.

The first system (ID No. 0016) purges organic and inorganic commodity tank cars. A spray cleaning head is inserted into the sealed dome opening and a heated wash solution is sprayed into the tank car. The wash solution is then removed by a vacuum pump system through a receiver/separator tank. Any vapors exhausted from the cleaning system are directed to a venturi scrubber and then through a carbon adsorber.

The second cleaning system (ID No. 0017) operates by directing any flammable pressurized gas to a flare.

The third cleaning method (ID No. 0018) directs pressurized inorganic corrosive gases to a scrubber.

The fourth system (ID No. 0019) operates by directing flammable liquids and vapors to an internal combustion engine.

Railcar Coating Operations (Equipment Group 0001):

Prior to painting, any small parts needing maintenance are grit-blasted and then painted in a designated area of the finishing building (ID No. 0020). This car maintenance work is performed before the railcars are sent to the Interior Lining and Exterior Coating (ID Nos. 0013 and 0009, respectively) operations.

If a railcar needs maintenance on its interior lining, the interior lining is removed by grit blasting (ID No. 22) the inside of the railcar. After the old lining is removed a new lining is manually applied at one of four stations (ID No. 0013). Following the application of the interior lining materials, the fresh air duct is removed and a duct from one of two heated air headers is dropped into the tank car opening to facilitate final curing of the lining.

When a railcar's exterior needs to be repainted, the outside surface of the railcar is prepared by removing the existing paint with manual grit blasting (ID No. 21). The rail cars are coated in an 85-foot long paint spray booth (ID No. 0009) and then sent through an infrared oven (ID No. 0010 – reported and listed under fuel burning equipment) to dry and cure the paint.

B. Equipment List for the Process

Emission Units		Specific Limitations/Requirements		Air Pollution Control Devices	
ID No.	Description	Applicable Requirements/Standards	Corresponding Permit Conditions	ID No.	Description
0009	Exterior Painting	40 CFR Part 63, Subpart MMMM, 391-3-1-.02(2)(b), 391-3-1-.02(2)(e)	2.1.1, 3.3.1, 3.3.2, 3.4.1, 3.4.2, 3.5.1, 6.2.1 thru 6.2.4, 6.2.6 thru 6.2.17	C9	Fabric Filters
0013	Interior Painting/Lining	40 CFR Part 63, Subpart MMMM, 391-3-1-.02(2)(b), 391-3-1-.02(2)(e)	2.1.1, 3.3.1, 3.3.2, 3.4.1, 3.4.2, 3.5.1, 6.2.1 thru 6.2.4, 6.2.6 thru 6.2.17	C13	Fabric Filters
0016	Tankcar Cleaning	Toxic Guideline	2.1.1, 3.2.1, 3.2.2, 3.5.2, 3.5.3, 5.2.1, 5.2.2, 6.2.2, 6.2.3	C16a/ C16b	Venturi Scrubber /Carbon Adsorber
0017	Pressurized Flammable Gas Purge System	Toxic Guideline	2.1.1, 3.2.1, 3.5.4, 3.5.5, 3.5.6, 3.5.7, 5.2.3, 5.2.4, 6.2.2, 6.2.3	C17	Flare
0018	Pressurized Corrosive Inorganic Gas Purge System	Toxic Guideline	2.1.1, 3.2.1, 3.2.2, 3.5.8, 3.5.9, 5.2.5, 6.2.2, 6.2.3	C18	Sparge Tank / Packed Scrubber
0019	Flammable Commodities Purge System	Toxic Guideline	2.1.1, 3.2.1, 3.5.9, 5.2.6, 6.2.2, 6.2.3	C19	Purge Engine
0020	Small Parts Painting and Touchup	40 CFR Part 63, Subpart MMMM, 391-3-1-.02(2)(b), 391-3-1-.02(2)(e)	2.1.1, 3.3.1, 3.3.2, 3.4.1, 3.4.2, 3.5.1, 6.2.1 thru 6.2.4, 6.2.6 thru 6.2.17	C20	Fabric Filter
0021	Exterior Blasting	391-3-1-.02(2)(b), 391-3-1-.02(2)(e)	3.4.1, 3.4.2, 3.5.10, 5.2.7	C21	Baghouse
0022	Interior Blasting	391-3-1-.02(2)(b), 391-3-1-.02(2)(e)	3.4.1, 3.4.2, 3.5.10, 5.2.7	C22	Baghouse

C. Equipment & Rule Applicability

Emission and Operating Caps

No changes were made since the initial permit. See narrative for permit 4741-299-0015-V-01-0.

Applicable Rules and Regulations –

Other than the promulgation of MMMM, no changes were made since the initial permit. See narrative for permit 4741-299-0015-V-01-0.

40 CFR Part 63, Subpart MMMM limits the organic HAP emissions from the surface coating of miscellaneous metal parts and products based on the types of the coatings being used. This MACT standard requires the Permittee to use at least one of the three compliance options listed below:

- (1) Compliant materials option.
- (2) Emission rate without add-on control option which requires each 12-month average organic HAP emission rate based on all the coatings, thinners, additives and/or cleaning materials used for a coating operation to be less than or equal to the applicable emission limit. And

(3) Use of add-on control option.

Subpart MMMM MACT standard allows the Permittee to use certain combination of the above options to comply with the HAP emission limit. Both the compliant material and the emission rate without add-on control options also allow alternative/additional compliance approaches including predominant activity emission limit and facility-specific emission limit. The Permittee has notified the Division that the facility will comply with the applicable Subpart MMMM standard for HAP emissions with Compliant Materials Option and/or Emission Rate Without Add-on Control Option. Therefore, in this permit all the emission limitation, operating, testing, monitoring, record keeping and/or reporting conditions relevant to the MACT standard are tailored for the facility's compliance approach. Because the facility only use general use coatings, there is no need to include alternative compliance approaches for facility's coating operations/activities.

D. Compliance Status

No noncompliance issues are known.

E. Operational Flexibility

The facility did not indicate that the process or equipment is involved in an alternate operating scenario.

F. Permit Conditions

A toxic impact assessment was performed on the railcar cleaning operations in October 1996 which included an expansion of the railcar cleaning operations. A Screen 3 model was run and based on 24 hours of emissions for all commodities except those listed in Condition No. 3.2.1 which were modeled on 1 hour of operation per day as requested by the facility since the time to clean one railcar of these commodities is 1 hour. Vinyl chloride emissions were modeled for 50 hours per week. By limiting railcar-cleaning operations to no material exceeded the acceptable ambient concentrations. Conditions 3.2.1 and 3.2.2 incorporates these limits.

Condition 3.3.1 is added to establish the applicable HAP emission limits of Subpart MMMM for the existing metal parts surface coating operations at this facility. All the existing miscellaneous metal parts surface coating operations at this facility shall comply with the applicable emission limit on and after January 2, 2007. This condition also defines the existing affected sources subject to Subpart MMMM at this facility. As informed by the Permittee, this facility uses "general use" coatings for the affected sources.

Condition 3.3.2 is added to allow the Permittee to have the two options for compliance with the applicable emission limit(s) in Condition 3.3.1, as allowed by Subpart MMMM. Note that the emission rate without add-on controls option is based on the 12-month roll averaging of the HAP emissions from an affected source(s) in the interest.

Conditions 3.4.1 through 3.5.10 are carried over from the initial permit.

Condition No. 3.4.1 incorporates the standards of Georgia Rule (b) into the permit.

Condition No. 3.4.2 incorporates the standards of Georgia Rule (e) into the permit.

Condition No. 3.5.1 requires that the facility change the filters (ID No. C9, C13, and C20) associated with the painting operations (ID Nos. 0009, 0013, and 0020) on a monthly basis.

Condition Nos. 3.5.2 through 3.5.9 relate to the equipment specific requirements necessary to comply with the toxic guideline. Specifically,

Condition No. 3.5.2 requires that the tankcar cleaning system's (ID No. 0016) scrubber and carbon adsorber (ID Nos. C16a and C16b, respectively) achieve an overall emission reduction efficiency of at least 98 percent.

Condition No. 3.5.3 requires that the tankcar cleaning system (ID No. 0016) achieves an overall emission reduction efficiency of at least 98 percent for chlorofluorocarbons (CFC) vented to the system.

Condition No. 3.5.4 requires that the flare (ID No. C17) to the organic commodity pressurized tank car gas purge system (ID No. 0017) provides an overall emission reduction efficiency of at least 99 percent.

A toxic impact assessment was performed when the facility submitted an application for the original equipment at the facility (June of 1993). In order to assure that no material exceeded maximum allowable concentrations, Condition No. 3.5.5 requires that all tank cars containing methyl bromide are flared for at least a 3-hour period, and Condition No. 3.5.6 requires that no more than 2,125 pounds of methyl bromide be flared during any 2-consecutive hour period.

Condition No. 3.5.7 requires that the flare (ID No. C17) to the organic commodity pressurized tank car gas purge system (ID No. 0017) achieves an overall emission reduction efficiency of at least 99.5 percent when flaring ammonia.

Condition No. 3.5.8 requires that the scrubber (ID No. C18) of the corrosive inorganic gas purge system (ID No. 0018) achieves an overall emissions reduction efficiency of at least 99.8 percent.

Condition No. 3.5.9 requires that the Purge Engine (ID No. C19) of the Flammable Commodities Purge System (ID No. 0019) achieves an overall emission reduction efficiency of at least 99 percent.

Condition No. 3.5.10 requires that the baghouse filters for the exterior and interior blasting operations (ID Nos. 21 and 22) are change when the static pressure drop across the filter system falls outside the range of 4 to 6 inches of water. This condition assures compliance with Georgia Rules (b) and (e).

IV. Testing Requirements (with Associated Record Keeping and Reporting)**A. General Testing Requirements**

The permit includes a requirement that the Permittee conduct performance testing on any specified emission unit when directed by the Division. Additionally, a written notification of any performance test(s) is required 30 days (or sixty (60) days for tests required by 40 CFR Part 63) prior to the date of the test(s) and a test plan is required to be submitted with the test notification. Test methods and procedures for determining compliance with applicable emission limitations are listed and test results are required to be submitted to the Division within 60 days of completion of the testing.

Three test methods and their alternatives for the determination of the volume fraction of coating solids, the coating density, and the mass ratio of HAP in regulated materials as specified in Subpart MMMM have been added to Condition 4.1.3.

B. Specific Testing Requirements**1. Individual Equipment**

None applicable.

2. Equipment Groups (all subject to the same test requirements):

None applicable.

V. Monitoring Requirements**A. General Monitoring Requirements**

Condition 5.1.1 requires that all continuous monitoring systems required by the Division be operated continuously except during monitoring system breakdowns and repairs. Monitoring system response during quality assurance activities is required to be measured and recorded. Maintenance or repair is required to be conducted in an expeditious manner.

B. Specific Monitoring Requirements**1. Individual Equipment:**

No changes were made since the initial permit. See narrative for permit 4741-299-0015-V-01-0.

2. Equipment Groups (all subject to the same monitoring requirements):

None applicable.

C. Compliance Assurance Monitoring (CAM)

Not Applicable

VI. Record Keeping and Reporting Requirements

A. General Record Keeping and Reporting Requirements

The Permit contains general requirements for the maintenance of all records for a period of five years following the date of entry and requires the prompt reporting of all information related to deviations from the applicable requirements. Records, including identification of any excess emissions, exceedances, or excursions from the applicable monitoring triggers, the cause of such occurrence, and the corrective action taken, are required to be kept by the Permittee and reporting is required on a semiannual basis.

B. Specific Record Keeping and Reporting Requirements

1. Plant wide:

No changes were made since the initial permit. See narrative for permit 4741-299-0015-V-01-0.

2. Individual Equipment:

No changes were made since the initial permit. See narrative for permit 4741-299-0015-V-01-0.

Condition 6.2.6 is added to establish a Subpart M MMM requirement for the Permittee to prepare and submit a notification of compliance status for the MACT standard. This notification shall include all the applicable information and data itemized by the condition and be submitted no later than 30 days following the 12-month initial compliance period that begins on January 2, 2007 and ends on February 1, 2008.

Condition 6.2.7 is added to establish a Subpart M MMM requirement for the Permittee to prepare and submit semiannual compliance reports following the notification of compliance status required in Condition 6.2.6. These reports shall include all the applicable information and data itemized by this condition and be submitted on time.

Condition 6.2.8 is added to establish a specific record keeping requirement for all the coating materials subject to the HAP emission limit(s) under Subpart M MMM. These material records are essential for the demonstration compliance with the applicable HAP emission limit(s) involved.

Condition 6.2.9 is added to establish a specific record keeping requirement for all the compliance options used by the Permittee to comply with the applicable HAP emission limit(s) under Subpart M MMM. These records are essential for the demonstration compliance with the applicable HAP emission limit(s) involved.

Condition 6.2.10 is added to establish the recording keeping and compliance determination requirements for the compliant material option specified in Condition 3.3.2. All the material data shall be obtained in accordance with Condition 6.2.8.

Condition 6.2.11 is added to establish the compliance determination requirement for the emission rate without add-on control option specified in Conditions 3.3.2. This condition contains all the equations used in the compliance determination. Note that the actual HAP emission rate determined using Equation 3 is a 12-month rolling average, and therefore shall be calculated monthly.

Conditions 6.2.12 through 6.2.17 are added to establish the record keeping requirements for all the coatings, thinners/additives, and/or cleaning materials subject to the Subpart MMMM, and for off-site disposed wastes accounting for HAP emission allowance. These records are essential for the demonstration of compliance with the applicable HAP emission limit(s) involved.

3. Equipment Groups:

None required.

VII. Specific Requirements

A. Operational Flexibility

The facility did not indicate that the process or equipment is involved in an alternate operating scenario.

B. Alternative Requirements

There are no alternative requirements indicated.

C. Insignificant Activities

All insignificant activities are listed in Attachment B of the Title V Permit.

D. Temporary Sources

The facility has not requested to operate any temporary sources.

E. Short-Term Activities

The facility did not report any short-term activities.

F. Compliance Schedule/Progress Reports

Based on all presently available information, no compliance or progress reports are necessary.

G. Emissions Trading

The facility is not involved in any emissions trading.

H. Acid Rain Requirements

The facility is not subject to any requirements in Title IV of the Clean Air Act.

I. Stratospheric Ozone Protection Requirements

The standard permit condition pursuant to 40 CFR 82 Subpart F has been included in the Title V Permit.

J. Pollution Prevention

There are no pollution prevention provisions incorporated into this Title V Permit.

K. Specific Conditions

None.

VIII. General Provisions

Generic provisions have been included in this permit to address the requirements in 40 CFR Part 70 that apply to all Title V sources, and the requirements in Chapter 391-3-1 of the Georgia Rules for Air Quality Control that apply to all stationary sources of air pollution.

Addendum to Narrative

EPD issued draft Title V Permit 4741-299-0015-V-02-0 for GATX - Waycross in Waycross, Georgia on July 20, 2007. The public notice for this permit was published in Waycross Journal Herald on August 17, 2007. The 30-day public comment period expired September 16, 2007. Comments were received from GATX - Waycross August 24, 2007. No comments were received from EPA or other parties. GATX – Waycross' comments are summarized below followed by a discussion of the comment and any changes made to the permit as a result.

Comment:

There are some minor comments and changes to the list of insignificant activities found in Attachment B.

Response:

EPD concurs with GATX's comment, and made numbering and description changes in Attachment B.