HYDRO SPA

Ocala Spa Manufacturing Facility

TITLE V OPERATING PERMIT APPLICATION

January 25, 2005

D.E.P
SOUTHWEST DISTRICT
JAN 26 2005
TAMPA

Prepared By:

SOUTHERN ENVIRONMENTAL SCIENCES, INC.
1204 North Wheeler Street
Plant City, Florida 33563

Department of Environmental Protection

Division of Air Resource Management

RESPONSIBLE OFFICIAL NOTIFICATION FORM

D.E.P
SOUTHWEST DISTRICT
JAN 26 2005
TAMPA

Note: A responsible official is not necessarily a designated representative under the Acid Rain Program. To become a designated representative, submit a certificate of representation to the U.S. Environmental Protection Agency (EPA) in accordance with 40 CFR Part 72.24.

Identification of Facility

1. Facility Owner/Company Name: **HYDRO SPA**	
2. Site Name: **Ocala Facility**	3. County: **Marion**
4. Title V Air Operation Permit/Project No. *(leave blank for initial Title V applications)*: **0830151-002-AV, Revision Application**	

Notification Type *(Check one or more)*

X **INITIAL:** Notification of responsible officials for an initial Title V application.
☐ **RENEWAL:** Notification of responsible officials for a renewal Title V application.
☐ **CHANGE:** Notification of change in responsible official(s).
Effective date of change in responsible official(s) **01/25/2005**

Primary Responsible Official

1. Name and Position Title of Responsible Official:
Mr. Charles Wiley – Production Supervisor

2. Responsible Official Mailing Address:
Organization/Firm: **HYDRO SPA**
Street Address: **13055 49th Street North**
City: **Clearwater** State: **FL** Zip Code: **34482**

3. Responsible Official Telephone Numbers:
Telephone: **(727) 573 - 9611** Fax: **(727) 573 - 7758**

4. Responsible Official Qualification *(Check one or more of the following options, as applicable)*:

[**X**] For a corporation, the president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision-making functions for the corporation, or a duly authorized representative of such person if the representative is responsible for the overall operation of one or more manufacturing, production, or operating facilities applying for or subject to a permit under Chapter 62-213, F.A.C.

[ ] For a partnership or sole proprietorship, a general partner or the proprietor, respectively.

[ ] For a municipality, county, state, federal, or other public agency, either a principal executive officer or ranking elected official.

[ ] The designated representative at an Acid Rain source.

5. Responsible Official Statement:

I, the undersigned, am a responsible official, as defined in Rule 62-210.200, F.A.C., of the Title V source addressed in this notification. I hereby certify, based on information and belief formed after reasonable inquiry, that the statements made in this notification are true, accurate and complete. Further, I certify that I have authority over the decisions of all other responsible officials, if any, for purposes of Title V permitting.

Charles Wiley — 1-26-05

Signature Date

Additional Responsible Official

1. Name and Position Title of Responsible Official:
   Kenneth W, Sorah, Chief Operating Officier

2. Responsible Official Mailing Address:
   Organization/Firm: **HYDRO SPA**
   Street Address: **13055 49th Street North**
   City: **Clearwater** State: **FL** Zip Code: **34482**

3. Responsible Official Telephone Numbers:
   Telephone: **(727) 573 - 9611** Fax: **(727) 573 - 7758**

4. Responsible Official Qualification *(Check one or more of the following options, as applicable)*:

[**X**] For a corporation, the president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision-making functions for the corporation, or a duly authorized representative of such person if the representative is responsible for the overall operation of one or more manufacturing, production, or operating facilities applying for or subject to a permit under Chapter 62-213, F.A.C.

[ ] For a partnership or sole proprietorship, a general partner or the proprietor, respectively.

[ ] For a municipality, county, state, federal, or other public agency, either a principal executive officer or ranking elected official.

[ ] The designated representative at an Acid Rain source.

Additional Responsible Official

1. Name and Position Title of Responsible Official:

2. Responsible Official Mailing Address:
   Organization/Firm:
   Street Address:
   City: State: Zip Code:

3. Responsible Official Telephone Numbers:
   Telephone: ( ) - Fax: ( ) -

4. Responsible Official Qualification *(Check one or more of the following options, as applicable)*:

[ ] For a corporation, the president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision-making functions for the corporation, or a duly authorized representative of such person if the representative is responsible for the overall operation of one or more manufacturing, production, or operating facilities applying for or subject to a permit under Chapter 62-213, F.A.C.

[ ] For a partnership or sole proprietorship, a general partner or the proprietor, respectively.

[ ] For a municipality, county, state, federal, or other public agency, either a principal executive officer or ranking elected official.

[ ] The designated representative at an Acid Rain source.

Department of Environmental Protection

Division of Air Resource Management

APPLICATION FOR AIR PERMIT - LONG FORM

I. APPLICATION INFORMATION

Air Construction Permit – Use this form to apply for an air construction permit for a proposed project:

- subject to prevention of significant deterioration (PSD) review, nonattainment area (NAA) new source review, or maximum achievable control technology (MACT) review; or
- where the applicant proposes to assume a restriction on the potential emissions of one or more pollutants to escape a federal program requirement such as PSD review, NAA new source review, Title V, or MACT; or
- at an existing federally enforceable state air operation permit (FESOP) or Title V permitted facility.

Air Operation Permit – Use this form to apply for:

- an initial federally enforceable state air operation permit (FESOP); or
- an initial/revised/renewal Title V air operation permit.

Air Construction Permit & Revised/Renewal Title V Air Operation Permit (Concurrent Processing Option) – Use this form to apply for both an air construction permit and a revised or renewal Title V air operation permit incorporating the proposed project.

To ensure accuracy, please see form instructions.

Identification of Facility

1. Facility Owner/Company Name: **HYDRO SPA**	
2. Site Name: **OCALA FACILITY**	
3. Facility Identification Number: **0830151**	
4. Facility Location: Street Address or Other Locator: **5401 44th Avenue, NW** City: **Ocala** County: **Marion** Zip Code: **34482**	
5. Relocatable Facility? ☐ Yes ☒ No	6. Existing Title V Permitted Facility? ☐ Yes ☒ No

Application Contact

1. Application Contact Name: **Mr. Charles Wiley, Production Supervisor**
2. Application Contact Mailing Address... Organization/Firm: **HYDRO SPA** Street Address: **13055 49th Street North** City: **Clearwater** State: **FL** Zip Code: **33762**
3. Application Contact Telephone Numbers... Telephone: **(727) 573 - 9611** ext. Fax: **(727) 573 - 7758**
4. Application Contact Email Address:

Application Processing Information (DEP Use)

1. Date of Receipt of Application:	
2. Project Number(s):	0830151-002-AV
3. PSD Number (if applicable):	
4. Siting Number (if applicable):	

APPLICATION INFORMATION

Purpose of Application

This application for air permit is submitted to obtain: (Check one)

Air Construction Permit

☐ Air construction permit.

Air Operation Permit

☒ Initial Title V air operation permit.
☐ Title V air operation permit revision.
☐ Title V air operation permit renewal.
☐ Initial federally enforceable state air operation permit (FESOP) where professional engineer (PE) certification is required.
☐ Initial federally enforceable state air operation permit (FESOP) where professional engineer (PE) certification is not required.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit (Concurrent Processing)

☐ Air construction permit and Title V permit revision, incorporating the proposed project.
☐ Air construction permit and Title V permit renewal, incorporating the proposed project.

Note: By checking one of the above two boxes, you, the applicant, are requesting concurrent processing pursuant to Rule 62-213.405, F.A.C. In such case, you must also check the following box:

☐ I hereby request that the department waive the processing time requirements of the air construction permit to accommodate the processing time frames of the Title V air operation permit.

Application Comment

The application is for the initial Title V Operating Permit for a new facility subject to the requirements of 40 CFR Part 63, Subpart WWWW. The air construction permit caps hazardous air pollutant emissions through a federally enforceable permit condition to levels less than 100 tons per year. The facility has been classified as synthetic minor source under the PSD program, a major source (HAP Emissions) under the Title V Program and a new major source under the Hazardous Air Pollutant Program.

APPLICATION INFORMATION

Scope of Application

Emissions Unit ID Number	Description of Emissions Unit	Air Permit Type	Air Permit Proc. Fee
001	Reinforced Plastic Composites Production Facility and Associated Activities	TV	NA

Application Processing Fee

Check one: ☐ Attached - Amount:_____ ☒ Not Applicable

APPLICATION INFORMATION

Owner/Authorized Representative Statement

Complete if applying for an air construction permit or an initial FESOP.

1. Owner/Authorized Representative Name :
   Charles Wiley, Production Supervisor
2. Owner/Authorized Representative Mailing Address...
   Organization/Firm: **HYDRO SPA**
   Street Address: **13055 49TH Street, North**
   City: **Clearwater** State: **Florida** Zip Code: **33762**
3. Owner/Authorized Representative Telephone Numbers...
   Telephone: (**727**) **573 - 9611** ext. Fax: (**727**) **573 - 7758**
4. Owner/Authorized Representative Email Address:
5. Owner/Authorized Representative Statement:

   I, the undersigned, am the owner or authorized representative of the facility addressed in this air permit application. I hereby certify, based on information and belief formed after reasonable inquiry, that the statements made in this application are true, accurate and complete and that, to the best of my knowledge, any estimates of emissions reported in this application are based upon reasonable techniques for calculating emissions. The air pollutant emissions units and air pollution control equipment described in this application will be operated and maintained so as to comply with all applicable standards for control of air pollutant emissions found in the statutes of the State of Florida and rules of the Department of Environmental Protection and revisions thereof and all other requirements identified in this application to which the facility is subject. I understand that a permit, if granted by the department, cannot be transferred without authorization from the department, and I will promptly notify the department upon sale or legal transfer of the facility or any permitted emissions unit.

Charles Wiley — Signature

1-26-05 — Date

APPLICATION INFORMATION

Professional Engineer Certification

1. Professional Engineer Name: **Darrel James Graziani**
   Registration Number: **44685**
2. Professional Engineer Mailing Address...
   Organization/Firm: **Southern Environmental Sciences, Inc.**
   Street Address: **1204 North Wheeler Street**
   City: **Plant City** State: **Florida** Zip Code: **33563**
3. Professional Engineer Telephone Numbers...
   Telephone: **(813) 752 - 5014** ext.**226** Fax: **(813) 752 - 2475**
4. Professional Engineer Email Address: **dgraziani@sesfla.com**
5. Professional Engineer Statement:

I, the undersigned, hereby certify, except as particularly noted herein, that:*

(1) To the best of my knowledge, there is reasonable assurance that the air pollutant emissions unit(s) and the air pollution control equipment described in this application for air permit, when properly operated and maintained, will comply with all applicable standards for control of air pollutant emissions found in the Florida Statutes and rules of the Department of Environmental Protection; and

(2) To the best of my knowledge, any emission estimates reported or relied on in this application are true, accurate, and complete and are either based upon reasonable techniques available for calculating emissions or, for emission estimates of hazardous air pollutants not regulated for an emissions unit addressed in this application, based solely upon the materials, information and calculations submitted with this application.

(3) If the purpose of this application is to obtain a Title V air operation permit (check here ☒, if so), I further certify that each emissions unit described in this application for air permit, when properly operated and maintained, will comply with the applicable requirements identified in this application to which the unit is subject, except those emissions units for which a compliance plan and schedule is submitted with this application.

(4) If the purpose of this application is to obtain an air construction permit (check here ☐, if so) or concurrently process and obtain an air construction permit and a Title V air operation permit revision or renewal for one or more proposed new or modified emissions units (check here ☐, if so), I further certify that the engineering features of each such emissions unit described in this application have been designed or examined by me or individuals under my direct supervision and found to be in conformity with sound engineering principles applicable to the control of emissions of the air pollutants characterized in this application.

(5) If the purpose of this application is to obtain an initial air operation permit or operation permit revision or renewal for one or more newly constructed or modified emissions units (check here ☒, if so), I further certify that, with the exception of any changes detailed as part of this application, each such emissions unit has been constructed or modified in substantial accordance with the information given in the corresponding application for air construction permit and with all provisions contained in such permit.

Signature 1-21-05
Date

(Seal)

Hydro Spa, Ocala Facility

* Attach any exception to certification statement.

II. FACILITY INFORMATION

A. GENERAL FACILITY INFORMATION

Facility Location and Type

1. Facility UTM Coordinates... Zone **17** East (km) **384.08** North (km) **3234.56**		2. Facility Latitude/Longitude... Latitude (DD/MM/SS) **29/14/9.6** Longitude (DD/MM/SS) **82/11/34.8**	
3. Governmental Facility Code: **0**	4. Facility Status Code: **O**	5. Facility Major Group SIC Code: **30**	6. Facility SIC(s): **3088**
7. Facility Comment : **The facility is located in Marion County which is designated as attainment for ozone, sulfur dioxide, carbon monoxide, and nitrogen dioxide, and unclassifiable for lead and PM-10. The facility is located more than 10 kilometers from the nearest PSD Class I area.**			

Facility Contact

1. Facility Contact Name: **Charles Wiley, Production Supervisor**
2. Facility Contact Mailing Address... Organization/Firm: **HYDRO SPA** Street Address: **13055 49th Street, North** City: **Clearwater** State: **Florida** Zip Code: **33762**
3. Facility Contact Telephone Numbers: Telephone: **(727) 573 - 9611** ext. Fax: **(727) 573 - 7758**
4. Facility Contact Email Address:

Facility Primary Responsible Official

Complete if an "application responsible official" is identified in Section I. that is not the facility "primary responsible official."

1. Facility Primary Responsible Official Name:
2. Facility Primary Responsible Official Mailing Address... Organization/Firm: Street Address: City: State: Zip Code:
3. Facility Primary Responsible Official Telephone Numbers... Telephone: ( ) - ext. Fax: ( ) -
4. Facility Primary Responsible Official Email Address:

FACILITY INFORMATION

Facility Regulatory Classifications

Check all that would apply *following* completion of all projects and implementation of all other changes proposed in this application for air permit. Refer to instructions to distinguish between a "major source" and a "synthetic minor source."

1. ☐ Small Business Stationary Source	☐ Unknown
2. ☐ Synthetic Non-Title V Source	
3. ☒ Title V Source	
4. ☐ Major Source of Air Pollutants, Other than Hazardous Air Pollutants (HAPs)	
5. ☒ Synthetic Minor Source of Air Pollutants, Other than HAPs	
6. ☒ Major Source of Hazardous Air Pollutants (HAPs)	
7. ☐ Synthetic Minor Source of HAPs	
8. ☐ One or More Emissions Units Subject to NSPS (40 CFR Part 60)	
9. ☐ One or More Emissions Units Subject to Emission Guidelines (40 CFR Part 60)	
10. ☒ One or More Emissions Units Subject to NESHAP (40 CFR Part 61 or Part 63)	
11. ☐ Title V Source Solely by EPA Designation (40 CFR 70.3(a)(5))	
12. Facility Regulatory Classifications Comment:	

Synthetic minor source under the Preconstruction Review Program based on potential VOC emissions of less than 250 tons per year. (Rule 62-212.400, F. A. C. – PSD Program)

Major source under Section 112 of the federal Clean Air Act (Hazardous Air Pollutant (HAP) program) based on potential emissions of more than 10 tons of any individual HAP and 25 tons of total HAPS.

Major source under Title V (Chapter 62-213, F.A.C.) based on the HAP designation and potential emissions of VOC greater than 100 tons.

New Facility under 40 CFR Part 63, Subpart WWWW, limited to less than 100 tons per year of HAP emissions.

FACILITY INFORMATION

List of Pollutants Emitted by Facility

1. Pollutant Emitted	2. Pollutant Classification	3. Emissions Cap [Y or N]?
HAPS	A- HAP/Title V	Y
H163	A – HAP/Title V	N
VOC	A – Title V SM - PSD	Y

B. EMISSIONS CAPS

Facility-Wide or Multi-Unit Emissions Caps

1. Pollutant Subject to Emissions Cap	2. Facility Wide Cap [Y or N]? (all units)	3. Emissions Unit ID No.s Under Cap (if not all units)	4. Hourly Cap (lb/hr)	5. Annual Cap (ton/yr)	6. Basis for Emissions Cap
VOC	Y	001	NA	245	ESCPSD
HAP	Y	001	NA	98	ESCMACT

7. Facility-Wide or Multi-Unit Emissions Cap Comment:

The MACT Standard (40 CFR Part 63, Subpart WWWW) establishes total HAP emission limits for various operations. For new sources that cap annual emissions below 100 tons per year these standards include work practices and HAP content restrictions on resins.

For VOCs the facility is regulated through a cap and subject to the requirements of Rule 62-296.320, F.A.C. Since the facility is a new source under the PSD regulations, BACT would be triggered if VOC emissions exceed 250 TPY. As such, a facility wide cap on VOC emissions was established to avoid PSD and subsequent BACT that would require add-on controls not required by the MACT Standard.

C. FACILITY ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Facility Plot Plan: (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: ARAA-01 ☐ Previously Submitted, Date:_____
2. Process Flow Diagram(s): (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: ARAA-02 ☐ Previously Submitted, Date:_____
3. Precautions to Prevent Emissions of Unconfined Particulate Matter: (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: ARAA-03 ☐ Previously Submitted, Date:_____

Additional Requirements for Air Construction Permit Applications

1. Area Map Showing Facility Location:
   ☐ Attached, Document ID:_____ ☐ Not Applicable (existing permitted facility)
2. Description of Proposed Construction or Modification:
   ☐ Attached, Document ID:_____
3. Rule Applicability Analysis:
   ☐ Attached, Document ID:_____
4. List of Exempt Emissions Units (Rule 62-210.300(3)(a) or (b)1., F.A.C.):
   ☐ Attached, Document ID:_____ ☐ Not Applicable (no exempt units at facility)
5. Fugitive Emissions Identification (Rule 62-212.400(2), F.A.C.):
   ☐ Attached, Document ID: _____ ☐ Not Applicable
6. Preconstruction Air Quality Monitoring and Analysis (Rule 62-212.400(5)(f), F.A.C.):
   ☐ Attached, Document ID:_____ ☐ Not Applicable
7. Ambient Impact Analysis (Rule 62-212.400(5)(d), F.A.C.):
   ☐ Attached, Document ID:_____ ☐ Not Applicable
8. Air Quality Impact since 1977 (Rule 62-212.400(5)(h)5., F.A.C.):
   ☐ Attached, Document ID:_____ ☐ Not Applicable
9. Additional Impact Analyses (Rules 62-212.400(5)(e)1. and 62-212.500(4)(e), F.A.C.):
   ☐ Attached, Document ID:_____ ☐ Not Applicable
10. Alternative Analysis Requirement (Rule 62-212.500(4)(g), F.A.C.):
    ☐ Attached, Document ID:_____ ☐ Not Applicable

FACILITY INFORMATION

Additional Requirements for FESOP Applications

1. List of Exempt Emissions Units (Rule 62-210.300(3)(a) or (b)1., F.A.C.):
   ☐ Attached, Document ID: ☐ Not Applicable (no exempt units at facility)

Additional Requirements for Title V Air Operation Permit Applications

1. List of Insignificant Activities (Required for initial/renewal applications only):
   ☒ Attached, Document ID: **ARTV-01** ☐ Not Applicable (revision application)
2. Identification of Applicable Requirements (Required for initial/renewal applications, and for revision applications if this information would be changed as a result of the revision being sought):
   ☒ Attached, Document ID: **ARTV-02**
   ☐ Not Applicable (revision application with no change in applicable requirements)
3. Compliance Report and Plan (Required for all initial/revision/renewal applications):
   ☒ Attached, Document ID: **ARTV-03**
   Note: A compliance plan must be submitted for each emissions unit that is not in compliance with all applicable requirements at the time of application and/or at any time during application processing. The department must be notified of any changes in compliance status during application processing.
4. List of Equipment/Activities Regulated under Title VI (If applicable, required for initial/renewal applications only):
   ☐ Attached, Document ID:_____
   ☐ Equipment/Activities On site but Not Required to be Individually Listed
   ☒ Not Applicable
5. Verification of Risk Management Plan Submission to EPA (If applicable, required for initial/renewal applications only) :
   ☐ Attached, Document ID:_____ ☒ Not Applicable
6. Requested Changes to Current Title V Air Operation Permit:
   ☐ Attached, Document ID:_____ ☒ Not Applicable

Additional Requirements Comment

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

EMISSIONS UNIT INFORMATION
Section [1] of [1]

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

☒ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

☐ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

☒ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

☐ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:

Reinforced Plastic Composites Production Facility and Associated Activities.

3. Emissions Unit Identification Number: **001**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A		**03/11/2003**	**30**	☐ Yes ☒ No

9. Package Unit:
Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:

This facility is a new source under the PSD regulations and the MACT Standard (40 CFR Part 63, Subpart WWWW)

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

Low HAP Content Resins as Specified in Table 3 of 40 CFR Part 63, Subpart WWWW

Work Practices including use of non-HAP solvent cleaners; mechanical, non-atomized applicators; and manual applications as specified in Tables 3 and 4 of Subpart WWWW

The building ventilation system is used to disperse emissions into the atmosphere to avoid and/or minimize odor impacts off site.

2. Control Device or Method Code(s): **102**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate: **2,470 tons-resin/year**	
2. Maximum Production Rate:	
3. Maximum Heat Input Rate: million Btu/hr	
4. Maximum Incineration Rate: pounds/hr tons/day	
5. Requested Maximum Operating Schedule:	
hours/day	days/week
weeks/year	**8,760** hours/year
6. Operating Capacity/Schedule Comment:	

The annual throughput rate is based on allowable emissions of 87 lb-HAP/ton-resin and the requested emissions cap of 98 tons per year of HAPs. The maximum resin usage can vary based on HAP content of the resin and HAP emissions from associated activities. Compliance with the emission caps will be demonstrated through the record keeping and reporting system in accordance with 40 CFR Part 63, Subpart WWWW.

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **EU001**	2. Emission Point Type Code: **3**	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **Building Exhaust Stacks Used for Building Ventilation and Resin/Foam/Stain Applications (Segments)**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code: **V**	6. Stack Height: **20-25** feet	7. Exit Diameter: **(1)** feet
8. Exit Temperature: **Ambient** °F	9. Actual Volumetric Flow Rate: **(1)** acfm	10. Water Vapor: **Ambient** %
11. Maximum Dry Standard Flow Rate: dscfm	12. Nonstack Emission Point Height: **6** feet	
13. Emission Point UTM Coordinates... Zone: **17** East (km): **17** North (km): **17**	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) **19/14/9.6** Longitude (DD/MM/SS) **82/11/34.8**	

15. Emission Point Comment:

Vent #	Diameter	Flow
1	24 in.	10,084 ACFM
2	30 in.	13,630 ACFM
3	24 in.	10,084 ACFM
4	24 in.	10,084 ACFM
5	30 in.	13,630 ACFM
6	30 in.	13,630 ACFM

Based on Design Data

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 6

1. Segment Description (Process/Fuel Type): **Open Molding**		
2. Source Classification Code (SCC): **3-08-007-24**	3. SCC Units: **Tons**	
4. Maximum Hourly Rate: **0**	5. Maximum Annual Rate: **2,470**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Non-CR/HS & Tooling Resins (Table 3, Subpart WWWW) Both Mechanical Non-Atomized and Manual Applications** The annual rate reported is not a cap. Tooling Resins are a small portion of the total resin usage.		

Segment Description and Rate: Segment 2 of 6

1. Segment Description (Process/Fuel Type): **Resin Activator**		
2. Source Classification Code (SCC): **3-08-007-24**	3. SCC Units: **Tons**	
4. Maximum Hourly Rate:	5. Maximum Annual Rate: **49**	6. Estimated Annual Activity Factor: **1.5-2.0%**
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **The resin activator is used at a rate of 1.5 to 2.0 pounds per 100 pounds of resin.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION (CONTINUED)

Segment Description and Rate: Segment 3 of 6

1. Segment Description (Process/Fuel Type): **Resin Storage/Mixing**		
2. Source Classification Code (SCC): **3-08-007-20**	3. SCC Units: **Gallons**	
4. Maximum Hourly Rate: **0**	5. Maximum Annual Rate:	6. Estimated Annual Activity Factor: **8,000 gal**
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Bulk Storage/Mixing (Table 4, Subpart WWWW) Bulk Storage and Day Mixing Tanks for the resin**		

Segment Description and Rate: Segment 4 of 6

1. Segment Description (Process/Fuel Type): **Spray Foam Application**		
2. Source Classification Code (SCC): **3-08-007-20**	3. SCC Units: **Tons**	
4. Maximum Hourly Rate:	5. Maximum Annual Rate: **250**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Trace amounts of HAP emissions (MDI) are associated with this activity and as such they must be accounted for within the allowable HAP emissions and the VOC cap.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION (CONTINUED)

Segment Description and Rate: Segment 5 of 6

1. Segment Description (Process/Fuel Type): **Cleaning Operations**		
2. Source Classification Code (SCC): **3-08-007-03**	3. SCC Units: **Tons**	
4. Maximum Hourly Rate:	5. Maximum Annual Rate: **20**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Non-HAP, VOC-Containing Solvents (e.g., Isopropanol, ect...) (Table 4, Subpart WWWW)**		

Segment Description and Rate: Segment 6 of 6

1. Segment Description (Process/Fuel Type): **Miscellaneous Materials**		
2. Source Classification Code (SCC): **3-08-007-99**	3. SCC Units: **Tons**	
4. Maximum Hourly Rate:	5. Maximum Annual Rate: **10**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **VOC & HAP Containing Materials such as but not limited to Water Based Stains, PVC Pipe Primers/Glues, ect... This is a catch all segment for miscellaneous materials.**		

EMISSIONS UNIT INFORMATION
Section [1] of [2]

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
HAPS	102		EL
H163			NS
VOC			EL

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **HAPS**	2. Total Percent Efficiency of Control: **MACT Floor**
3. Potential Emissions: lb/hour **98** tons/year	4. Synthetically Limited? ☒ Yes ☐ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **NA** Reference: **Mass Balance Calculation**	7. Emissions Method Code: **2**
8. Calculation of Emissions: **See Document ID No. EU001-07**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment: **POTENTIAL EMISSION = ALLOWABLE EMISSIONS** **Based on Open Molding non-CR/HS Resin**	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **VOC**	2. Total Percent Efficiency of Control: **NA**
3. Potential Emissions: lb/hour **245** tons/year	4. Synthetically Limited? ☒ Yes ☐ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **NA** Reference: **Mass Balance Calculation**	7. Emissions Method Code: **2**
8. Calculation of Emissions: **See Document ID No. EU001-07**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment: **POTENTIAL EMISSION = ALLOWABLE EMISSIONS** **Based on facility wide solvent/chemical usages**	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **H163**	2. Total Percent Efficiency of Control: **NA**
3. Potential Emissions: lb/hour **96.5** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **78.2 lb/ton of resin** Reference: **40 CFR Part 63, Subpart WWWW**	7. Emissions Method Code: **2**
8. Calculation of Emissions: **See Document ID No. EU001-07**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 3

1. Basis for Allowable Emissions Code: **RULE**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **87 lb/ton**	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance: **Recordkeeping System Per 40 CFR Part 63, Subpart WWWW**	
6. Allowable Emissions Comment (Description of Operating Method): **40 CFR Part 63, Subpart WWWW, Table 3 for Open Molding Operations – non-CR/HS .**	

Allowable Emissions Allowable Emissions 2 of 3

1. Basis for Allowable Emissions Code: **RULE**	2. Future Effective Date of Allowable Emissions: **April 21, 2006**
3. Allowable Emissions and Units: **254 lb/ton**	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance: **Recordkeeping System Per 40 CFR Part 63, Subpart WWWW**	
6. Allowable Emissions Comment (Description of Operating Method): **40 CFR Part 63, Subpart WWWW, Table 3 for Open Molding Operations – Tooling. (Small Portion of Resin Use)**	

Allowable Emissions Allowable Emissions 3 of 3

1. Basis for Allowable Emissions Code: **ESCPSD**	2. Future Effective Date of Allowable Emissions: **Upon Permit Issuance**
3. Allowable Emissions and Units: **245 tons per year**	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance: **Recordkeeping System Per 40 CFR Part 63, Subpart WWWW**	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 1

1. Visible Emissions Subtype: **VE20**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **20** % Exceptional Conditions: **100%(1)** Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 9**	
5. Visible Emissions Comment: **General opacity standard (Rule 62-296.320, F.A.C.) applicable facility wide.** Note : 1 - The exceptional condition reflects the Excess Emissions Rule of 62-210.700(1), F.A.C.	

Visible Emissions Limitation: Visible Emissions Limitation _____ of _____

1. Visible Emissions Subtype:	2. Basis for Allowable Opacity: ☐ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance:	
5. Visible Emissions Comment:	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement: ☐ Rule ☐ Other	
4. Monitor Information... Manufacturer: Model Number: Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement: ☐ Rule ☐ Other	
4. Monitor Information... Manufacturer: Model Number: Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

H. CONTINUOUS MONITOR INFORMATION (CONTINUED)

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **ARAA-02** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☒ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☒ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   _____
   ☐ To be Submitted, Date (if known):_____
   Test Date(s)/Pollutant(s) Tested: _____
   _____
   ☒ Not Applicable

   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☒ Attached, Document ID: **EU001-07** ☐ Not Applicable

EMISSIONS UNIT INFORMATION
Section [1] of [1]

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☐ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ At tached, Document ID: _____ ☐ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☐ Not Applicable

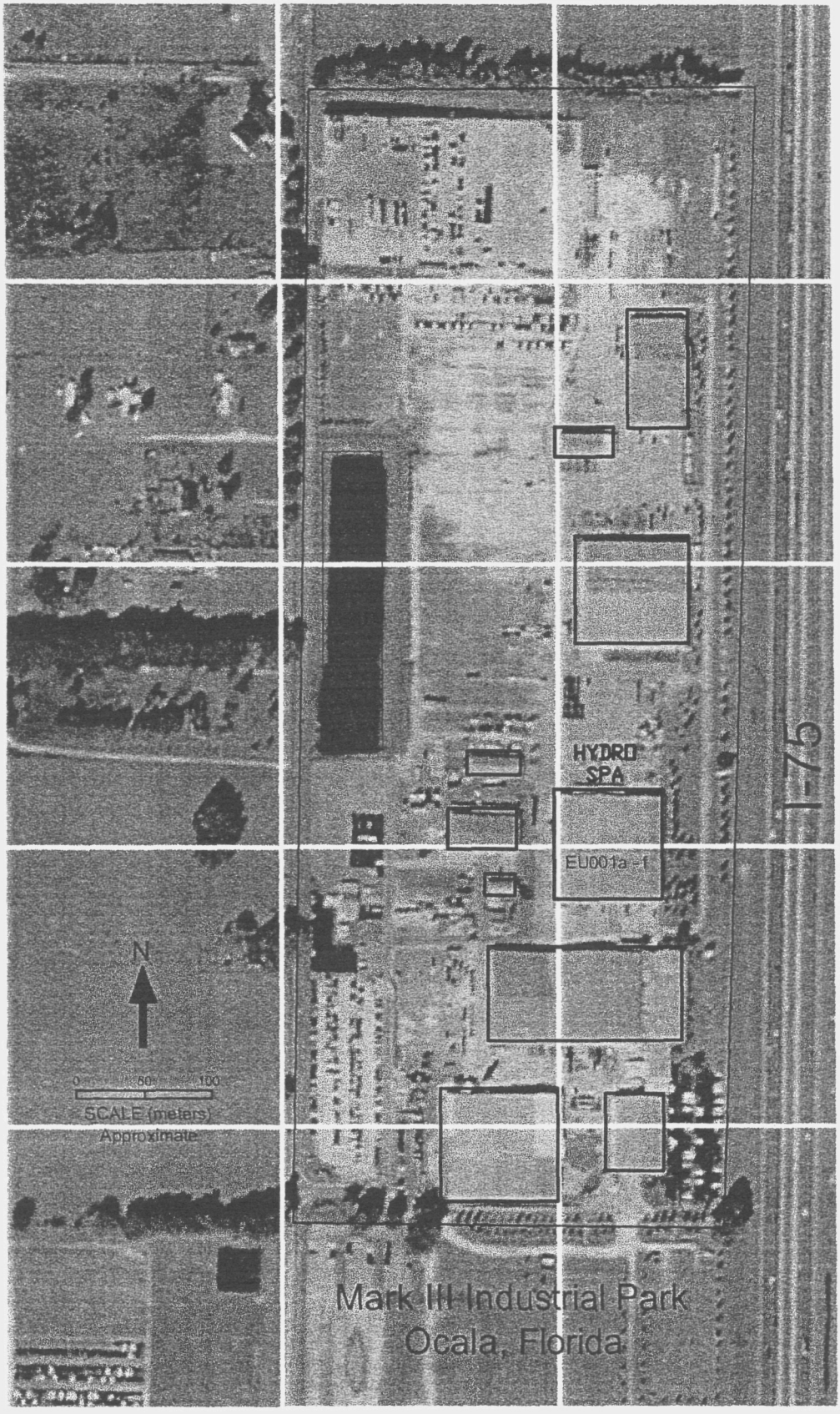
Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **ARTV-02**
2. Compliance Assurance Monitoring
   ☐ Attached, Document ID: _____ ☒ Not Applicable
3. Alternative Methods of Operation
   ☒ Attached, Document ID: **EU001-13** ☐ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID:_____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID:_____
      ☐ Previously Submitted, Date:_____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID:_____
      ☐ Previously Submitted, Date:_____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID:_____
      ☐ Previously Submitted, Date:_____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID:_____
      ☐ Previously Submitted, Date:_____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID:_____
      ☐ Previously Submitted, Date:_____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID:_____
      ☐ Previously Submitted, Date:_____
   ☒ Not Applicable

EMISSIONS UNIT INFORMATION
Section [1] of [1]

Additional Requirements Comment

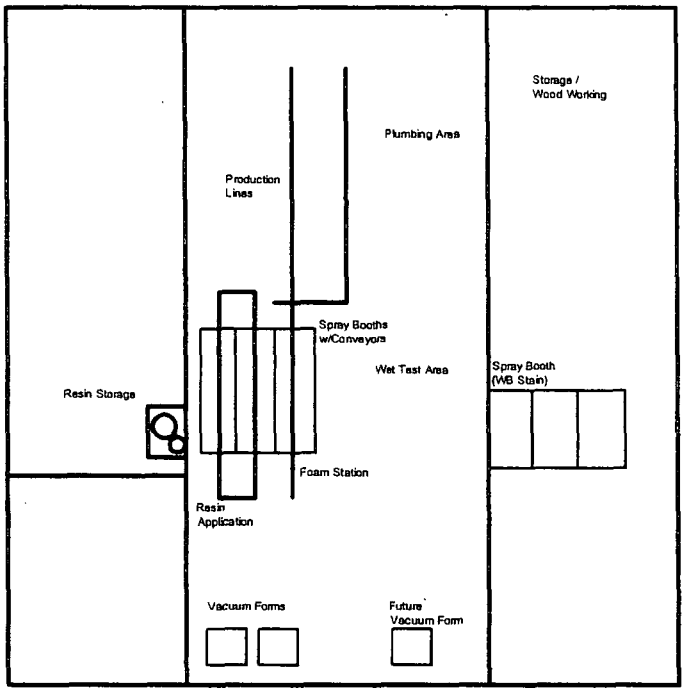
DOCUMENT ID: ARAA-01
FACILITY PLOT PLAN



HYDRO SPA - OCALA FACILITY
5401 44th Ave., NW
Ocala, Florida, 24482

SOUTHERN ENVIRONMENTAL SCIENCES, INC.
PLANT CITY, FLORIDA 33563
Phone - (813) 752-5014

HYDRO SPA



N

0 25 50

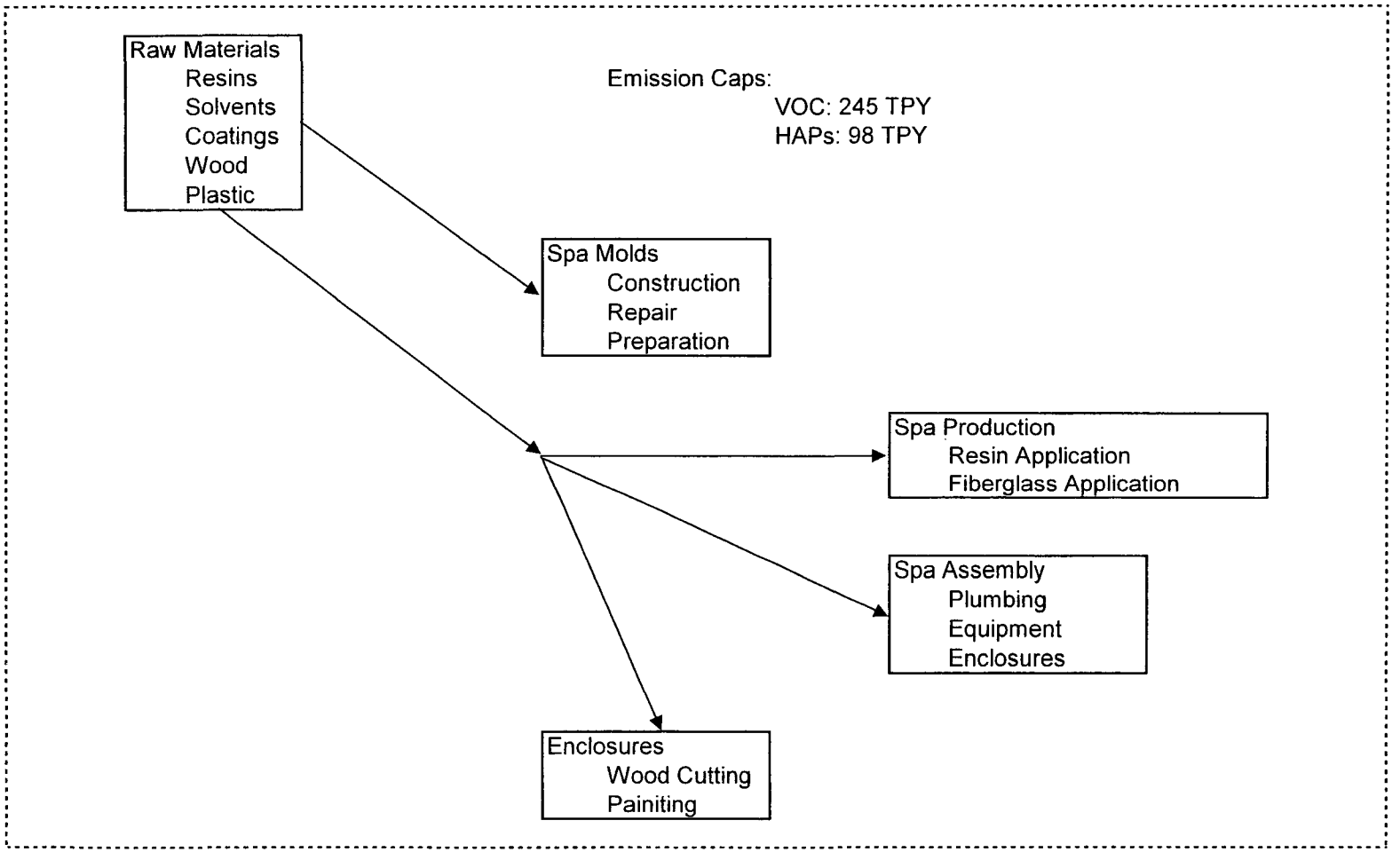
SCALE (meters)
Approximate

HYDRO SPA - OCALA FACILITY
5401 44th Ave., NW
Ocala, Florida, 24482

SOUTHERN ENVIRONMENTAL SCIENCES, INC.
PLANT CITY, FLORIDA 33563
Phone - (813) 752-5014

DOCUMENT ID: ARAA-02
PROCESS FLOW DIAGRAM

HYDRO SPA
SIMPLIFIED PROCESS FLOW DIAGRAM



DOCUMENT ID: ARAA-03
PRECAUTIONS TO PREVENT EMISSIONS OF UNCONFINED PARTICULATE MATTER

Document ID: ARAA-03
Precautions to Prevent Emissions of Unconfined Particulate Matter

Unconfined particulate matter emissions from the Hydro Ocala facility are expected to be minor since the manufacturing operations will be contained within the building. Potential emissions associated with the operation and maintenance of the facility include the following activities:

- Solid Waste Materials; and
- Roads & Parking Areas.

Reasonable precautions to prevent and/or control unconfined particulate matter emissions include the following:

- Solid Waste Materials: Proper disposal of wastes (e.g. saw dust, pipe cutting...) in a dumpster or similar container.
- Roads & Parking Areas: Clean-up of any spilled materials, the application of water, and the removal of accumulated materials on the paved areas.

DOCUMENT ID: ARTV-01
LIST OF INSIGNIFICANT ACTIVITIES

Document ID: ARTV-01
List of Exempt and/or Insignificant Activities

The following activities are either exempt or insignificant based on the Rules 62-210 or 62-213, F.A.C.:

Activity	Exempt or Insignificant	
Internal Combustion Engines associated with on-site activities including truck, cars, motorcycles, and forklifts.	√	√
Vacuum Pumps associated with the Mold Setting Activities	√	√
Space Heating Activities	√	√
Laboratory Equipment used for chemical and/or physical analyses	√	√
Fire and Safety Equipment	√	√
Surface Coating Activities using coatings containing 5.0 percent or less VOCs, by volume, except that such emissions shall be calculated in to the facility-wide emissions for purposes of the VOC emissions cap.	√	√
Non-HAP and Non-VOC Solvent Storage and Cleaning Activities	√	√
HAP and VOC Solvent Storage activities in containers of less than 55 gallons. (Excludes Bulk Storage)	√	√
Janitorial and Office Supplies and Materials containing small amounts of either HAPs or VOCs	√	√
Miscellaneous Material Usages of less than 100 pounds per year.	√	√

DOCUMENT ID: ARTV-02
IDENTIFICATION OF APPLICABLE REQUIREMENTS

Document ID: ARTV-02
Identification of Applicable Requirements

The Ocala facility produces spa pools through an open molding process using styrene-containing resins. The source activities have been classified as "Reinforced Plastic Composites Production" and as a new source under the MACT Standard (40 CFR Part 63, Subpart WWWW). Under the current construction permit emissions are capped as follows:

- Volatile Organic Compounds (VOC): 245 tons/year
- Hazardous Air Pollutant Emissions: 98 tons/year

The facility is located more than 10 kilometers from the nearest PSD Class I Area, in an area designated either unclassifiable or attainment for the criteria air pollutants.

The facility is classified as follows:

- Synthetic Minor Source under the PSD Program (PTE < 250 TPY for PSD Pollutants).
- Major Source under the HAP Program (PTE >10 TPY – Individual HAP & >25 TPY – Total HAP).
- Major Source under the Title V Program.

The specific emission limiting regulations, permitting requirements and reporting requirements are discussed below.

Emission Limiting Standards

Based on the emissions caps and the area's attainment status for the pollutant ozone, VOC emissions have been capped below the major source threshold (250 tons per year) for PSD applicability and thus not subject to any case-by-case BACT determination or specific emission limiting standards.

As a major source of HAP emissions, with a promulgated MACT Standard, the source was not subject to a case-by-case MACT determination under 40 CFR Part 63.

As an new major source of HAP emissions, the source is subject to the emission limiting standards and work practice requirements contained in Tables 3 and 4 of the promulgated MACT Standard.

The facility is not subject to the major source RACT requirements of Rule 62-296.570, F.A.C. since the facility is not located in one of the designated counties.

The facility is not subject to the PM RACT requirements of Rule 62-296.700, F.A.C. since the facility's particulate matter emissions are associated with unconfined emissions and located more than 5 kilometers outside the Hillsborough County Maintenance Area.

The facility is subject to the General Pollutant Emission Limiting Standards of Rule 62-296.320, F.A.C. that specifies additional work practices to reduce emissions of VOC and organic solvents.

The facility is not subject to any federal NSPS standards.

Permitting Requirements

Based on the PTE associated with the applicable emission limiting standards and the emission caps, the facility is required to obtain a Title V operating permit under Chapters 62-210 and 62-213, F.A.C.

List of Applicable Regulations

Based on the applicable regulations and permitting requirements, the following is a list of applicable requirements:
List of Applicable Regulations

Rule 62-4.020, F.A.C	Rule 62-4.030, F.A.C.
Rule 62-4.040(1), F.A.C.	Rule 62-4.050(1), (2), (3), (4)(a)1., (4)(v),F.A.C.
Rule 62-4.050(5) – (8), F.A.C.	Rule 62-4.055(1) – (5), F.A.C.
Rule 62-4.070, F.A.C.	Rule 62-4.090, F.A.C.
Rule 62-4.100, F.A.C.	Rule 62-4.120(1) & (5), F.A.C.
Rule 62-4.130, F.A.C.	Rule 62-4.150, F.A.C.
Rule 62-4.160, F.A.C.	Rule 62-4.210, F.A.C.
Rule 62-4.220, F.A.C.	Rule 62-204.200, F.A.C.
Rule 62-204.800(2), F.A.C.	
Rule 62-204.800(9)(a), (b)8., (c), (d), & (e), F.A.C.	Rule 62-204.800(10)(a), (b)58., (c), (d) & (e), F.A.C.
Rule 62-204.800(13), F.A.C.	Rule 62-204.800(14), F.A.C.
Rule 62-204.800(22)(e), F.A.C.	Rule 62-210.200, F.A.C.
Rule 62-210.300(1), (2), (2)(a), F.A.C.	Rule 62-210.300(3)(a), (a)5, 9, 11, 12, 15, 20, 21, 22, 23, 24, 30. 31, 32, 33 F.A.C.
Rule 62-210.300(3)(b)1., F.A.C.	Rule 62-210.350(1), (3), F.A.C.
Rule 62-210.360(1), F.A.C.	Rule 62-210.370(3)(a) & (c), F.A.C.
Rule 62-210.550, F.A.C.	Rule 62-210.650, F.A.C.
Rule 62-210.700, F.A.C., except (2) & (3)	Rule 62-210.900(1), (5) & (7), F.A.C.
Rule 62-212.300, F.A.C.	Rule 62-212.400(2)(d)1., F.A.C.
Rule 62-213.205(1) & (4), F.A.C.	Rule 62-213.400, F.A.C.
Rule 62-213.410, F.A.C.	Rule 62-213.412, F.A.C., except (3)
Rule 62-213.413(1), (2) & (3) F.A.C.	Rule 62-213.420, F.A.C.
Rule 62-213.430(3), (4) & (6), F.A.C.	Rule 62-213.440, F.A.C.
Rule 62-213.460, F.A.C.	Rule 62-213.900(1) & (7), F.A.C.
Rule 62-296.320(1), (2), (3), (4)(b) & (4)(c), F.A.C.	Rule 62-297.310, F.A.C
Rule 62-297.401(9), F.A.C.	Rule 62-256.200, F.A.C.
Rule 62-256.300, F.A.C.	Rule 61-256.600, F.A.C
Rule 62-256.700(3), (4) & (5), F.A.C.	Rule 62-257.200, F.A.C.
Rule 62-257.301, F.A.C.	Rule 62-257.400, F.A.C.
Rule 62-257.900, F.A.C.	40 CFR 52.21
40 CFR 52.27	40 CFR Part 61, Subpart M

List of Applicable Regulations

40 CFR Part 63.1	40 CFR Part 63.2
40 CFR Part 63.3	40 CFR Part 63.4
40 CFR Part 63.5, except (d)(2)	40 CFR Part 63.6, except (e)(3), (f)(1), (h), (i), (j)
40 CFR Part 63.9, except (b)(4), (b)(5), (c), (d), (e), (f), (g)	40 CFR Part 63.10, except (b)(2), (c), (d)(3) – (5), (e)
40 CFR Part 63.12	40 CFR Part 63.13
40 CFR Part 63.14	40 CFR Part 63.15
40 CFR Part 63.5785(a)	40 CFR Part 63.5790(a), (b), (c)
40 CFR Part 63.5795(a) & (b)	40 CFR Part 63.5796
40 CFR Part 63.5797	40 CFR Part 63.5798
40 CFR Part 63.5799(a), (b) &(b)(1)	40 CFR Part 63.5800
40 CFR Part 63.5805(c), (e), (f), & (g)	40 CFR Part 63.5810
40 CFR Part 63.5835(a) & (c)	40 CFR Part 63.5840
40 CFR Part 63.5860(a)	40 CFR Part 63.5895(c), (d)
40 CFR Part 63.5900(a)(2), (a)(3), (a)(4)	40 CFR Part 63.5900(b), (c)
40 CFR Part 63.5905	40 CFR Part 63.5910, except (b)(6), (e), (f), (g),(h)
40 CFR Part 63.5915(a), (c), (d),	40 CFR Part 63.5920
40 CFR Part 63.5925	40 CFR Part 63.5935
40 CFR Part 63, Subpart WWWW – Table 1	40 CFR Part 63, Subpart WWWW – Table 2
40 CFR Part 63, Subpart WWWW – Table 3	40 CFR Part 63, Subpart WWWW – Table 4
40 CFR Part 63, Subpart WWWW – Table 5	40 CFR Part 63, Subpart WWWW – Table 6
40 CFR Part 63, Subpart WWWW – Table 7	40 CFR Part 63, Subpart WWWW – Table 8
40 CFR Part 63, Subpart WWWW – Table 9	40 CFR Part 63, Subpart WWWW – Table 13
40 CFR Part 63, Subpart WWWW – Table 14	40 CFR Part 63, Subpart WWWW – Table 15
40 CFR Part 63, Subpart WWWW – Appendix A	

DOCUMENT ID: ARTV-03
COMPLIANCE REPORT AND PLAN

COMPLIANCE REPORT & PLAN

INTRODUCTION

The Title V operating permit program defines a major source within Rule 62-210.200. F.A.C. Under this definition, the Ocala facility is classified as a major source based on potential emissions of 10 tons per year or more of styrene, 25 tons per year or more of total hazardous air pollutants (HAPs) and more than 100 tons per year of volatile organic compounds. Emissions are generated during the use of resins associated with the production of the spa pools and other miscellaneous activities. As a major source, the Ocala facility is required to have a Title V Operating Permit and to renew the permit every five (5) years. The current air construction permit is scheduled to expire on December 30, 2005 and submittal of the Title V permit application is due at least 180 prior to expiration.

Hydro Spa requested Southern Environmental Sciences, Inc. (SES) to develop the Title V application for the facility. As part of the application development process, SES reviewed the emissions inventory and completed a regulatory compliance assessment of the facility. SES's assessment focused on the following areas:

- Air Construction Permit and
- Federal and State Regulations.

The requirement to develop a Compliance Report is contained within Rule 62-210.900(1), F.A.C. as part of the instructions for completing the application form. In accordance with the instructions, the Compliance Report must address the compliance status of each emissions unit with respect to each applicable requirement and provide a description of the activities taken to achieve compliance. The Compliance Report forms the basis of the Compliance Certification, which must be signed by the Responsible Official. The signed Compliance Certification certifies the truth, accuracy, and completeness of the Compliance Report and the renewal application.

Based on the available information, the facility was found to be in compliance with the permitting requirements, the monitoring and reporting requirements, and the emission limiting in the current air construction permit.

SOURCE DESCRIPTION

The Ocala facility is engaged in the manufacture of spa pools and other miscellaneous activities. The operations include the preparation and repair of molds, the application of resins and fiberglass to the molds, product assembly, touch-up, equipment clean-up, and fugitive emissions from the building. The facility is located at 5401 44th Avenue, NW, Ocala, Marion County, Florida. The facility is located more than 10 kilometers from the nearest PSD Class I Area, in an area designated ether unclassifiable or attainment for the criteria air pollutants.

The facility is considered a new source under the federal and State preconstruction review regulations (40 CFR 52.21, Chapters 62-210.300, 62-212.300, and 62-212.400, F.A.C.). The facility is also classified as a major source under the Title III or hazardous air pollutant program (Title III of the 1990 CAAA) and as such a major source under the Title V operating permit program (40 CFR Part 70 and Chapters 62-210.200 and 62-213, F.A.C.

The facility contains a single regulated emissions units described as:

- EU001 Reinforced Plastic Composites Production Facility and Associated Activities

In addition to the regulated emissions units, the facility includes insignificant and/or exempt emissions units and/or activities as listed in the permit application.

REGULATORY APPLICABILITY AND COMPLIANCE

The application contains the comprehensive list of air pollution regulations applicable to the facility. For purposes of the assessment, SES examined the existing regulations as of December 7, 2004 for purposes of assessing applicability and compliance. In addition, applicability and compliance were assessed against the following:

- Current Air Construction Permit and
- New Federal and State Regulations

The compliance assessment included contact with the Florida Department of Environmental Protection Inspector, a site visit on December 9, 2004, and the review and evaluation of the permit requirements, emission limitations, and other requirements as noted below.

PERMITS

Chapter 403.061(14) of the Florida Statues (FS) provides the FDEP with the authority to establish a permit system for the operation, construction or expansion of any air pollution source. Permits issued under this authorization are subject to the processing requirements of the Administrative Procedures Act, Chapter 120, F.S. The FDEP's permitting program begins in Chapter 62-4, F.A.C., which establishes the general requirements of the program including a prohibition on the construction, modification, or operation of a stationary installation without the appropriate and valid permits. Chapters 62-210, 62-212, 62-213 and 62-214, F.A.C. establish specific requirements of the FDEP's permitting programs.

Within Rule 62-210.300, F.A.C., the FDEP has established a requirement for all emissions units to obtain air pollution permits unless specifically exempted under 62-210.300(3) or exempted under the provisions of Chapter 62-4.040, F.A.C. The FDEP's specific permitting requirements for air pollution sources include the following:

- Rule 62-210.300(1) - Requires air construction permits for new or modified emissions units;
- Rule 62-210.300(2) - Requires air operation permits for all emissions units; and
- Rule 62-210.300(3) – Categorical and generic emission unit exemptions.

The requirement for construction or modification permits includes major source permitting under the Prevention of Significant Deterioration (PSD) and New Sources Review for Nonattainment Areas (NSR-NAA) as specified in Rule 62-212, F.A.C. The requirement for operation permits includes major source permitting under Title V as specified in Rule 62-213, F.A.C. The Acid Rain permit requirements are contained within Rule 62-214, F.A.C.

EMISSION LIMITATIONS

Chapter 403.061(7) of the Florida Statues (FS) provides the FDEP with the authority to establish rules and regulations establishing emission limitations. The FDEP's emission limiting standards include both the general and specific requirements of Chapter 62-296, F.A.C. and the federal requirements adopted within Rule 62-204.800, F.A.C. In addition, Chapter 62-212, F.A.C., establishes Best Available Control Technology (BACT) and Lowest Achievable Emission Rate (LAER) requirements for new or modified major sources.

Within Chapter 62-296, F.A.C., the FDEP has adopted regulations that limit emissions and establish performance standards for a variety of emissions units. In addition, the FDEP has established emission limitation in the current operating permits. The regulations reviewed included the following:

- Rule 62-296.320, F.A.C. - General Pollutant Emission Limiting Standards
- Rule 62-296.401-17, F.A.C - Specific Emission Limiting and Performance Standards
- Rule 62-296.500, F.A.C. - Reasonably Available Control Technology (RACT) for Volatile Organic Compounds (VOC) and Nitrogen Oxides (NOx) Emitting Facilities

- Rule 62-296.570, F.A.C. - Reasonably Available Control Technology (RACT) for major VOC and NOx Emitting Facilities
- Rule 62-296.600, F.A.C. - Reasonably Available Control Technology (RACT) for Lead
- Rule 62-296.700, F.A.C. - Reasonably Available Control Technology (RACT) for Particulate Matter
- Rule 62-204.800(7), F.A.C. - New Source Performance Standards (NSPS)
- Rule 62-204.800(8), F.A.C. - National Emission Standards for Hazardous Air Pollutants (NESHAP) - Part 61
- Rule 62-204.800(9), F.A.C. - National Emission Standards for Hazardous Air Pollutants for Source Categories - Part 63

OTHER REQUIREMENTS

In addition to the requirements for permits and the emission limitations and performance standards presented above, compliance was also assessed versus the other federal and state requirements. These other requirements include any testing, recordkeeping, reporting, and/or notification requirements and can be specified either by regulation or contained within a specific condition of an air pollution permit.

The regulations and permits reviewed included the following:

Regulations

- Chapter 62-4, F.A.C. - Permits
- Chapter 62-102, F.A.C. - Rules of Administrative Procedures - Rulemaking
- Chapter 62-103, F.A.C. - Rules of Administrative Procedures - Final Agency Action (Non-Rulemaking) and Appeal
- Chapter 62-150, F.A.C. - Hazardous Substance Release Notification
- Chapter 62-210, F.A.C. - Stationary Sources - General Requirements
- Chapter 62-212, F.A.C. - Stationary Sources - Preconstruction Review
- Chapter 62-213, F.A.C. - Operation Permits for Major Sources of Air Pollution
- Chapter 62-214, F.A.C. – Requirements for Sources Subject to the Federal Acid Rain Program
- Chapter 62-252, F.A.C. - Gasoline Vapor Control
- Chapter 62-256, F.A.C. - Open Burning and Frost Protection Fires
- Chapter 62-257, F.A.C. - Asbestos Removal
- Chapter 62-296, F.A.C. - Stationary Sources - Emission Standards
- Chapter 62-297, F.A.C. - Stationary Sources - Emissions Monitoring
- Chapter 120, F.S. - Administrative Procedures Act
- Chapter 403, F.S. - Environmental Control

Permit(s)

- 0830151-001-AC

The review examined the applicable regulations including procedural requirements and rights established under the regulations. The compliance assessment focused on specific requirements within the regulations that could be evaluated and a compliance status reported. These requirements included renewing permits, annual testing schedules, recordkeeping, and reporting requirements.

OBSERVATIONS AND FINDINGS

SES assessed compliance based on the emissions unit inventory, the regulations, and the current air construction permit. SES's findings included the following:

Permitting Requirements: SES noted that the Ocala Facility had not exceeded the emission caps contained in the current air construction permit for the calendar year 2004. As a result, the emissions unit

is being reported as ***in compliance*** with the preconstruction review permitting requirements of the Rules 62-4, 62-210.300 and 62-212.300, F.A.C. SES did note that the facility is required to obtain a Title V Operating Permit and that the purpose of the assessment was part of the Title V permit application process.

Emission Limitations: The air construction established the following emission caps:

- Volatile Organic Compounds (VOC): 245 tons per year (12-Month Rolling Total)
- Total Hazardous Air Pollutants (THAPs): 98 tons per year (12-Month Rolling Total)

The FDEP capped emissions based on the federally enforceable air construction permit. Based on the monthly reports, SES has found that the facility is in compliance with the emission limitations contained in the permit.

Other Requirements: Other requirements include raw material usage caps, monitoring, reporting and recordkeeping as specified in the air construction permit. The compliance evaluation was based on review of the available information. As noted above the facility was found to be in of compliance in December 2004with the construction permit requirements.

SES also noted that the enforcement action initiated in 2003 as a result of construction and operation of the facility without an air construction permit was resolved in early 2004. SES also evaluated applicability of the following regulations for purposes of renewing the Title V Operating Permit. These included the following:

- ***Compliance Assurance Monitoring (CAM) Plan Requirements*** – Based on review of the regulations (40 CFR Part 64) SES determined that the regulation and associated requirements are not applicable to the Ocala Facility. This finding is based on the applicability of the regulation, which addresses the use of add-on air pollution control systems.

- ***MACT Standard – Reinforced Plastic Composites Production (40 CFR Part 63, Subpart WWWW)*** – Based on the final regulation, the Ocala Facility is classified as a new source and was required to be incompliance with the MACT requirements upon start-up. Based on the current resins and operating practices, the facility was found to be in compliance with the emission standards contained in Table 3 and the work practices of Table 4. As a new source with a total HAP limitation of less than 100 tons per year the facility is not subject to the add-on air pollution control requirements. Currently, the facility is using non-atomized mechanical applicators and compliant resins.

COMPLIANCE PLAN

NA

Prepared By: Darrel J. Graziani, P.E., Southern Environmental Sciences, Inc.

Prepared For: HYDRO SPA - Ocala Facility

Darrel J. Graziani 1-21-05

Signature Date

DOCUMENT ID: EU001-07
OTHER INFORMATION REQUIRED BY RULE OR STATUTE

Raw Material Usages

Polyester Resin:	2253	ton/yr
Catalyst:	45.06	ton/yr
Spray Foam	250	ton/yr
Isopropanol	20	tons per year

Emission Estimates

Volatile Organic Compounds	229.34	Tons per Year
Styrene	95.5	Tons per Year
Methyl Ethly Ketone	0.9012	Tons per Year
MDI	2.08E-03	Tons per Year
Total HAPs	96.37	Tons per Year

Emission Calculations

Polyester Resin

Styrene Content	37.5	%wt, Ref: AOC - C888-FFG-30
VOC Content	5	%wt (Non-Styrene), Ref: AOC - C888-FFG-30
Emission Factors	84.75	lb-Styrene/ton-Resin, Table 1, Subpart WWWW
	184.75	lb-VOC/ton-Resin, Mass Balance
Emission Estimates		
Styrene	95.5	Tons per Year
VOC	208.1	Tons per Year
THAP	95.5	Tons per Year

Catalyst

MEK Content:	2	%wt, Ref: Cadox M-30a & M-50A Products
MEKP Content	35	%wt, Ref: Cadox M-50A Product
Emission Factors	40	lb-MEK/ton-catalyst, Mass Balance
	14	lb-MEKP/Ton-catalsyst, Mass Balance assuming 98% Consumption
	54	lb-VOC/ton-Catalyst, Mass Balance (Sum MEK & MEKP)
Emission Estimates		
MEK	0.9012	Tons per Year
VOC	1.21662	Tons per Year
THAP	0.9012	Tons per Year

Foam

MDI Content	45	%wt, Ref: Stepan Mondur MR Light
PMDI Content	55	%wt, Ref: Stepan Mondur MR Light
Emission Factor	8.33E-06	lb/ton, Ref: MDI Emissions Estimator Sortware
Volume of Air	1000	ft^3/yr, based on 2 lb/ft^3 of foam.
Temperature	302.44444	K, Process Temperature (~85 F)
MDI Vapor Pressure	1.89E-05	mmHg, Ref: Appendix A, Table 1
MDI Mole. Weight	250.26	lb/lb-mol
Kmdi Adj. Factor	0.5325	
Emissions		
MDI	2.08E-03	Tons per Year

	Adj. Fact.		
%MDI	80 F	85 F	90 F
40	0.46	0.47	0.47
45	0.51	0.53	0.56
50	0.55	0.60	0.65

Isopropanol

VOC Content	100	%wt, Ref: Delta MSDS
Emission Factor	6.55	lb/gal
Emissions	20	tons per Year

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Material Data & Emission Factors

Title V Operating Permit - Recordkeeping & Reporting Files **ARMS No.:** 0830151

Ocala Facility **Marion County, Florida**

Polyester Resin Data:

MSDS #	Material Name	Density (lb/gal)	HAP (%wt)	HAP EFs (lb/ton) - App. Type Reference - Table 1, Subpart WWWW Manual	Mechanical	Reserved	VOC EFs (lb/ton) - App. Type VOC (%wt)	(lb/gal)	Material Balance 1.a.i	1.c.v	Reserved
R1	AOC C668-FFG-20 (37.5%)	9.504	37.5	108.70	84.75		5	NA	208.7	184.75	
R2	AOC C668-FFH-20 (35.4%)	9.504	35.4	96.69	78.16		5	NA	196.688	178.156	
R3	AOC C668-FFH-20 (35.4%)	9.504	35.4	96.69	78.16		0	NA	96.688	78.156	
R4				-105.80	-33.00			NA	-105.8	-33	
R5				-105.80	-33.00			NA	-105.8	-33	
R6				-105.80	-33.00			NA	-105.8	-33	
R7				-105.80	-33.00			NA	-105.8	-33	

Catalyst Data

MSDS #	Material Name	Density (lb/gal)	MEK (%wt)	MEKP (%wt)	HAP/VOC EFs (lb/ton) - App. Type MEK	MEKP	VOC
C1	Cadox M-30a Red	8.64	2	22	40	8.8	48.8
C2	Cadox M-50a Red	8.64	2	35	40	14	54
C3					0	0	0
C4					0	0	0
C5					0	0	0

Assumes 98% of MEKP is consummed in the reaction. (See App. For Ref.)

Foam Data

MSDS #	Material Name	Density (lb/gal)	MDI (%wt)	PMDI (%wt)	HAP/VOC EFs (lb/ton) MDI	VOC
F1	Stephan Mondur MR-Light	10.317	45	55	8.25E-06	8.25E-06
F2						
F3						
F4						
F5						

Ref.: MDI Estimator @85 F (See App. For Ref.)
MDI Adjustment Factor @85F
0.11994 Intercept
0.00896 Slope

Cleanup Solvents/Miscellaneous Materials

MSDS #	Material Name	Density (lb/gal)	HAP (%wt)	VOC (%wt)	HAP/VOC EFs (lb/gal) HAP	VOC
MM1	Isopropanol	6.55	0	100.00	0	6.55
MM2	Acetone	6.83	0	0.00	0	0
MM3	Eco Spa Stain	8.50	0	0.86	0	0.073
MM4	Redwood W/B Stain	8.84	0	8.26	0	0.73
MM5					0	0
MM6					0	0
MM7					0	0
MM8					0	0
MM9					0	0
MM10					0	0
MM11					0	0
MM12					0	0
MM13					0	0

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Usage Data

Title V Operating Permit - Recordkeeping & Reporting Files — ARMS No.: 0830151

Ocala Facility — Marion County, Florida

Date (MM/YYYY)	Day (1-31)	MSDS #	Materials Name	Usages One entry per line				
				Resins Application (lbs)		Catalyst (lbs)	Foam (lbs)	Misc. Mat. (Gal)
				Manual	Mechanical			
01/2004	31	C1	Cadox M-30a Red			168		
01/2004	31	C2	Cadox M-50a Red			1533		
01/2004	31	F1	Stephan Mondur MR-Light				3550	
01/2004	31	MM1	Isopropanol					84
01/2004	31	MM2	Acetone					1005
01/2004	31	MM3	Eco Spa Stain					19
01/2004	31	MM4	Redwood W/B Stain					0
02/2004	29	R2	AOC C668-FFH-20 (35.4%)		62178			
02/2004	29	C1	Cadox M-30a Red			399		
02/2004	29	C2	Cadox M-50a Red			1472		
02/2004	29	F1	Stephan Mondur MR-Light				3000	
02/2004	29	MM1	Isopropanol					85
02/2004	29	MM2	Acetone					1480
02/2004	29	MM3	Eco Spa Stain					53
02/2004	29	MM4	Redwood W/B Stain					0
03/2004	31	R2	AOC C668-FFH-20 (35.4%)		84877			
03/2004	31	C1	Cadox M-30a Red			399		
03/2004	31	C2	Cadox M-50a Red			1360		
03/2004	31	F1	Stephan Mondur MR-Light				4450	
03/2004	31	MM1	Isopropanol					111
03/2004	31	MM2	Acetone					2260
03/2004	31	MM3	Eco Spa Stain					160
03/2004	31	MM4	Redwood W/B Stain					0
04/2004	30	R2	AOC C668-FFH-20 (35.4%)		120475			
04/2004	30	C1	Cadox M-30a Red			2443		
04/2004	30	C2	Cadox M-50a Red			984		
04/2004	30	F1	Stephan Mondur MR-Light				4470	
04/2004	30	MM1	Isopropanol					112
04/2004	30	MM2	Acetone					2560
04/2004	30	MM3	Eco Spa Stain					180
04/2004	30	MM4	Redwood W/B Stain					0
05/2004	31	R2	AOC C668-FFH-20 (35.4%)		119364			
05/2004	31	C1	Cadox M-30a Red			1470		
05/2004	31	C2	Cadox M-50a Red			232		
05/2004	31	F1	Stephan Mondur MR-Light				1853	
05/2004	31	MM1	Isopropanol					165
05/2004	31	MM2	Acetone					2250
05/2004	31	MM3	Eco Spa Stain					200
05/2004	31	MM4	Redwood W/B Stain					0
06/2004	30	R2	AOC C668-FFH-20 (35.4%)	0	124343			
06/2004	30	C1	Cadox M-30a Red			2940		
06/2004	30	C2	Cadox M-50a Red			0		
06/2004	30	F1	Stephan Mondur MR-Light				4387	
06/2004	30	MM1	Isopropanol					247
06/2004	30	MM2	Acetone					2767
06/2004	30	MM3	Eco Spa Stain					215
06/2004	30	MM4	Redwood W/B Stain					0
07/2004	31	R2	AOC C668-FFH-20 (35.4%)	0	136374			
07/2004	31	C1	Cadox M-30a Red			3752		
07/2004	31	C2	Cadox M-50a Red			32		
07/2004	31	F1	Stephan Mondur MR-Light				3220	
07/2004	31	MM1	Isopropanol					223
07/2004	31	MM2	Acetone					3738
07/2004	31	MM3	Eco Spa Stain					265
07/2004	31	MM4	Redwood W/B Stain					0
08/2004	31	R2	AOC C668-FFH-20 (35.4%)	0	94209			
08/2004	31	C1	Cadox M-30a Red			2331		
08/2004	31	C2	Cadox M-50a Red			0		
08/2004	31	F1	Stephan Mondur MR-Light				4964	
08/2004	31	MM1	Isopropanol					230
08/2004	31	MM2	Acetone					2720
08/2004	31	MM3	Eco Spa Stain					128
08/2004	31	MM4	Redwood W/B Stain					0
09/2004	30	R2	AOC C668-FFH-20 (35.4%)	0	88728			
09/2004	30	C1	Cadox M-30a Red			1281		
09/2004	30	C2	Cadox M-50a Red			96		
09/2004	30	F1	Stephan Mondur MR-Light				6955	
09/2004	30	MM1	Isopropanol					255

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Usage Data

Title V Operating Permit - Recordkeeping & Reporting Files — **ARMS No.:** 0830151

Ocala Facility — **Marion County, Florida**

Date (MM/YYYY)	Day (1-31)	MSDS #	Materials Name	Usages One entry per line				
				Resins Application (lbs)		Catalyst (lbs)	Foam (lbs)	Misc. Mat. (Gal)
				Manual	Mechanical			
09/2004	30	MM2	Acetone					2324
09/2004	30	MM3	Eco Spa Stain					237
09/2004	30	MM4	Redwood W/B Stain					0
10/2004	31	R2	AOC C668-FFH-20 (35.4%)	0	120284			
10/2004	31	C1	Cadox M-30a Red			3206		
10/2004	31	C2	Cadox M-50a Red			552		
10/2004	31	F1	Stephan Mondur MR-Light				7619	
10/2004	31	MM1	Isopropanol					105
10/2004	31	MM2	Acetone					3351
10/2004	31	MM3	Eco Spa Stain					0
10/2004	31	MM4	Redwood W/B Stain					0
11/2004	30	R2	AOC C668-FFH-20 (35.4%)	0	76477			
11/2004	30	C1	Cadox M-30a Red			994		
11/2004	30	C2	Cadox M-50a Red			328		
11/2004	30	F1	Stephan Mondur MR-Light				4858	
11/2004	30	MM1	Isopropanol					215
11/2004	30	MM2	Acetone					2058
11/2004	30	MM3	Eco Spa Stain					120
11/2004	30	MM4	Redwood W/B Stain					10
12/2004	31	R2	AOC C668-FFH-20 (35.4%)	0	51486			
12/2004	31	C1	Cadox M-30a Red			1239		
12/2004	31	C2	Cadox M-50a Red			848		
12/2004	31	F1	Stephan Mondur MR-Light				2504	
12/2004	31	MM1	Isopropanol					115
12/2004	31	MM2	Acetone					787
12/2004	31	MM3	Eco Spa Stain					155
12/2004	31	MM4	Redwood W/B Stain					0

Material Usage Data

Title V Operating Permit - Recordkeeping & Reporting Files **ARMS No.:** 0830151

Ocala Facility **Marion County, Florida**

Date (MM/YYYY)	Monthly Material Usages					12-Month Rolling Usages				
	Resins Application (tons)		Catalyst (tons)	Foam (Tons)	MM/CS (Gal)	Resins Application (tons)		Catalyst (tons)	Foam (Tons)	MM/CS (Gal)
	Manual	Mechanical				Manual	Mechanical			
01/2004	0.00	26.20	0.85	1.78	1108.00	0.00	46.87	1.33	1.78	1108.00
02/2004	0.00	31.09	0.94	1.50	1618.00	0.00	77.96	2.27	3.28	2726.00
03/2004	0.00	42.44	0.88	2.23	2531.00	0.00	120.40	3.15	5.50	5257.00
04/2004	0.00	60.24	1.71	2.24	2852.00	0.00	180.64	4.86	7.74	8109.00
05/2004	0.00	59.68	0.85	0.93	2615.00	0.00	240.32	5.71	8.66	10724.00
06/2004	0.00	62.17	1.47	2.19	3229.00	0.00	302.49	7.18	10.86	13953.00
07/2004	0.00	68.19	1.89	1.61	4226.00	0.00	370.68	9.07	12.47	18179.00
08/2004	0.00	47.10	1.17	2.48	3078.00	0.00	417.78	10.24	14.95	21257.00
09/2004	0.00	44.36	0.69	3.48	2816.00	0.00	462.15	10.93	18.42	24073.00
10/2004	0.00	60.14	1.88	3.81	3456.00	0.00	522.29	12.81	22.23	27529.00
11/2004	0.00	38.24	0.66	2.43	2403.00	0.00	560.53	13.47	24.66	29932.00
12/2004	0.00	25.74	1.04	1.25	1057.00	0.00	565.60	14.03	25.92	30989.00

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Emission Calculations

Title V Operating Permit - Recordkeeping & Reporting Files — **ARMS No.:** 0830151

Ocala Facility — **Marion County, Florida**

Date	Day			Hazardous Air Pollutant Emissions (tons)						Volatile Organic Compound Emissions (tons)				
				Resin		Catalyst		Foam	CS/MM	Resin				
(MM/YYYY)	(1-31)	MSDS #	Materials Name	Manual	Mechanical	MEK	MEKP	MDI	HAPs	Manual	Mechanical	Catalyst	Foam	CS/MM
12/2003	1	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	8.08E-01	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	2.03E+00	0.00E+00	0.00E+00	0.00E+00
12/2003	1	C2	Cadox M-50a Red	0.00E+00	0.00E+00	9.60E-03	3.36E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.30E-02	0.00E+00	0.00E+00
12/2003	1	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
01/2004	31	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	1.02E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	2.58E+00	0.00E+00	0.00E+00	0.00E+00
01/2004	31	C1	Cadox M-30a Red	0.00E+00	0.00E+00	1.68E-03	3.70E-04	0.00E+00	0.00E+00	0.00E+00	0.00E+00	2.05E-03	0.00E+00	0.00E+00
01/2004	31	C2	Cadox M-50a Red	0.00E+00	0.00E+00	1.53E-02	5.37E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	2.07E-02	0.00E+00	0.00E+00
01/2004	31	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	7.32E-09	0.00E+00	0.00E+00	0.00E+00	0.00E+00	7.32E-09	0.00E+00
01/2004	31	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	2.75E-01
01/2004	31	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
01/2004	31	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	6.94E-04
01/2004	31	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
02/2004	29	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	1.21E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.06E+00	0.00E+00	0.00E+00	0.00E+00
02/2004	29	C1	Cadox M-30a Red	0.00E+00	0.00E+00	3.99E-03	8.78E-04	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.87E-03	0.00E+00	0.00E+00
02/2004	29	C2	Cadox M-50a Red	0.00E+00	0.00E+00	1.47E-02	5.15E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.99E-02	0.00E+00	0.00E+00
02/2004	29	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	6.18E-09	0.00E+00	0.00E+00	0.00E+00	0.00E+00	6.18E-09	0.00E+00
02/2004	29	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	2.78E-01
02/2004	29	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
02/2004	29	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.94E-03
02/2004	29	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
03/2004	31	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	1.66E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.17E+00	0.00E+00	0.00E+00	0.00E+00
03/2004	31	C1	Cadox M-30a Red	0.00E+00	0.00E+00	3.99E-03	8.78E-04	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.87E-03	0.00E+00	0.00E+00
03/2004	31	C2	Cadox M-50a Red	0.00E+00	0.00E+00	1.36E-02	4.76E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.84E-02	0.00E+00	0.00E+00
03/2004	31	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	9.17E-09	0.00E+00	0.00E+00	0.00E+00	0.00E+00	9.17E-09	0.00E+00
03/2004	31	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.64E-01
03/2004	31	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
03/2004	31	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	5.85E-03
03/2004	31	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
04/2004	30	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	2.35E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	5.92E+00	0.00E+00	0.00E+00	0.00E+00
04/2004	30	C1	Cadox M-30a Red	0.00E+00	0.00E+00	2.44E-02	5.37E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	2.98E-02	0.00E+00	0.00E+00
04/2004	30	C2	Cadox M-50a Red	0.00E+00	0.00E+00	9.84E-03	3.44E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.33E-02	0.00E+00	0.00E+00
04/2004	30	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	9.22E-09	0.00E+00	0.00E+00	0.00E+00	0.00E+00	9.22E-09	0.00E+00
04/2004	30	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.67E-01
04/2004	30	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
04/2004	30	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	6.58E-03
04/2004	30	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
05/2004	31	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	2.33E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	5.87E+00	0.00E+00	0.00E+00	0.00E+00
05/2004	31	C1	Cadox M-30a Red	0.00E+00	0.00E+00	1.47E-02	3.23E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.79E-02	0.00E+00	0.00E+00
05/2004	31	C2	Cadox M-50a Red	0.00E+00	0.00E+00	2.32E-03	8.12E-04	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.13E-03	0.00E+00	0.00E+00
05/2004	31	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.82E-09	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.82E-09	0.00E+00
05/2004	31	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	5.40E-01
05/2004	31	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
05/2004	31	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	7.31E-03
05/2004	31	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
06/2004	30	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	2.43E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	6.11E+00	0.00E+00	0.00E+00	0.00E+00
06/2004	30	C1	Cadox M-30a Red	0.00E+00	0.00E+00	2.94E-02	6.47E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.59E-02	0.00E+00	0.00E+00
06/2004	30	C2	Cadox M-50a Red	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
06/2004	30	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	9.04E-09	0.00E+00	0.00E+00	0.00E+00	0.00E+00	9.04E-09	0.00E+00
06/2004	30	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	8.09E-01
06/2004	30	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
06/2004	30	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	7.86E-03

HYDRO SPA

Emission Calculations

Title V Operating Permit - Recordkeeping & Reporting Files — **ARMS No.:** 0830151

Ocala Facility — **Marion County, Florida**

Date	Day			Hazardous Air Pollutant Emissions (tons)						Volatile Organic Compound Emissions (tons)				
				Resin		Catalyst		Foam	CS/MM	Resin				
(MM/YYYY)	(1-31)	MSDS #	Materials Name	Manual	Mechanical	MEK	MEKP	MDI	HAPs	Manual	Mechanical	Catalyst	Foam	CS/MM
06/2004	30	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
07/2004	31	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	2.66E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	6.71E+00	0.00E+00	0.00E+00	0.00E+00
07/2004	31	C1	Cadox M-30a Red	0.00E+00	0.00E+00	3.75E-02	8.25E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.58E-02	0.00E+00	0.00E+00
07/2004	31	C2	Cadox M-50a Red	0.00E+00	0.00E+00	3.20E-04	1.12E-04	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.32E-04	0.00E+00	0.00E+00
07/2004	31	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	6.64E-09	0.00E+00	0.00E+00	0.00E+00	0.00E+00	6.64E-09	0.00E+00
07/2004	31	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	7.30E-01
07/2004	31	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
07/2004	31	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	9.69E-03
07/2004	31	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
08/2004	31	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	1.84E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.63E+00	0.00E+00	0.00E+00	0.00E+00
08/2004	31	C1	Cadox M-30a Red	0.00E+00	0.00E+00	2.33E-02	5.13E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	2.84E-02	0.00E+00	0.00E+00
08/2004	31	C2	Cadox M-50a Red	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
08/2004	31	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.02E-08	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.02E-08	0.00E+00
08/2004	31	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	7.53E-01
08/2004	31	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
08/2004	31	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.68E-03
08/2004	31	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
09/2004	30	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	1.73E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.36E+00	0.00E+00	0.00E+00	0.00E+00
09/2004	30	C1	Cadox M-30a Red	0.00E+00	0.00E+00	1.28E-02	2.82E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.56E-02	0.00E+00	0.00E+00
09/2004	30	C2	Cadox M-50a Red	0.00E+00	0.00E+00	9.60E-04	3.36E-04	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.30E-03	0.00E+00	0.00E+00
09/2004	30	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.43E-08	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.43E-08	0.00E+00
09/2004	30	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	8.35E-01
09/2004	30	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
09/2004	30	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	8.66E-03
09/2004	30	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
10/2004	31	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	2.35E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	5.91E+00	0.00E+00	0.00E+00	0.00E+00
10/2004	31	C1	Cadox M-30a Red	0.00E+00	0.00E+00	3.21E-02	7.05E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.91E-02	0.00E+00	0.00E+00
10/2004	31	C2	Cadox M-50a Red	0.00E+00	0.00E+00	5.52E-03	1.93E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	7.45E-03	0.00E+00	0.00E+00
10/2004	31	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.57E-08	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.57E-08	0.00E+00
10/2004	31	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.44E-01
10/2004	31	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
10/2004	31	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
10/2004	31	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
11/2004	30	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	1.49E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.76E+00	0.00E+00	0.00E+00	0.00E+00
11/2004	30	C1	Cadox M-30a Red	0.00E+00	0.00E+00	9.94E-03	2.19E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.21E-02	0.00E+00	0.00E+00
11/2004	30	C2	Cadox M-50a Red	0.00E+00	0.00E+00	3.28E-03	1.15E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.43E-03	0.00E+00	0.00E+00
11/2004	30	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.00E-08	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.00E-08	0.00E+00
11/2004	30	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	7.04E-01
11/2004	30	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
11/2004	30	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	4.39E-03
11/2004	30	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.65E-03
12/2004	31	R2	AOC C668-FFH-20 (35.4%)	0.00E+00	1.01E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	2.53E+00	0.00E+00	0.00E+00	0.00E+00
12/2004	31	C1	Cadox M-30a Red	0.00E+00	0.00E+00	1.24E-02	2.73E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.51E-02	0.00E+00	0.00E+00
12/2004	31	C2	Cadox M-50a Red	0.00E+00	0.00E+00	8.48E-03	2.97E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	1.14E-02	0.00E+00	0.00E+00
12/2004	31	F1	Stephan Mondur MR-Light	0.00E+00	0.00E+00	0.00E+00	0.00E+00	5.16E-09	0.00E+00	0.00E+00	0.00E+00	0.00E+00	5.16E-09	0.00E+00
12/2004	31	MM1	Isopropanol	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	3.77E-01
12/2004	31	MM2	Acetone	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
12/2004	31	MM3	Eco Spa Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	5.67E-03
12/2004	31	MM4	Redwood W/B Stain	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00

HYDRO SPA

HAP Emissions Data

Title V Operating Permit - Recordkeeping & Reporting Files **ARMS No.:** 0830151

Ocala Facility **Marion County, Florida**

Date (MM/YYYY)	Monthly HAP Emissions						12-Month Rolling HAP Emissions					Totals (Tons)
	Resin Emissions (tons)		Catalyst (tons)	Foam (Tons)	MM/CS (Tons)	Totals (Tons)	Resins Application (tons)		Catalyst (tons)	Foam (Tons)	MM/CS (Tons)	
	Manual	Mechanical					Manual	Mechanical				
01/2004	0.00	1.02	0.0227	7.32E-09	0.00	1.05	0.00	1.83	0.04	0.00	0.00	1.87
02/2004	0.00	1.21	0.0247	6.18E-09	0.00	1.24	0.00	3.05	0.06	0.00	0.00	3.11
03/2004	0.00	1.66	0.0232	9.17E-09	0.00	1.68	0.00	4.70	0.08	0.00	0.00	4.79
04/2004	0.00	2.35	0.0431	9.22E-09	0.00	2.40	0.00	7.06	0.13	0.00	0.00	7.19
05/2004	0.00	2.33	0.0211	3.82E-09	0.00	2.35	0.00	9.39	0.15	0.00	0.00	9.54
06/2004	0.00	2.43	0.0359	9.04E-09	0.00	2.47	0.00	11.82	0.18	0.00	0.00	12.00
07/2004	0.00	2.66	0.0462	6.64E-09	0.00	2.71	0.00	14.49	0.23	0.00	0.00	14.72
08/2004	0.00	1.84	0.0284	1.02E-08	0.00	1.87	0.00	16.33	0.26	0.00	0.00	16.58
09/2004	0.00	1.73	0.0169	1.43E-08	0.00	1.75	0.00	18.06	0.28	0.00	0.00	18.34
10/2004	0.00	2.35	0.0466	1.57E-08	0.00	2.40	0.00	20.41	0.32	0.00	0.00	20.73
11/2004	0.00	1.49	0.0166	1.00E-08	0.00	1.51	0.00	21.90	0.34	0.00	0.00	22.24
12/2004	0.00	1.01	0.0266	5.16E-09	0.00	1.03	0.00	22.10	0.35	1.07E-07	0.00	22.45

HYDRO SPA

VOC Emissions Data

Title V Operating Permit - Recordkeeping & Reporting Files **ARMS No.:** 0830151

Ocala Facility **Marion County, Florida**

Date	Monthly VOC Emissions						12-Month Rolling VOC Emissions					
	Resin Emissions (tons)		Catalyst	Foam	MM/CS	Totals	Resins Application (tons)		Catalyst	Foam	MM/CS	Totals
(MM/YYYY)	Manual	Mechanical	(tons)	(Tons)	(Tons)	(Tons)	Manual	Mechanical	(tons)	(Tons)	(Tons)	(Tons)
01/2004	0.00	2.58	0.02	0.00	0.28	2.88	0.00	4.61	0.04	0.00	0.28	4.92
02/2004	0.00	3.06	0.02	0.00	0.28	3.36	0.00	7.67	0.06	0.00	0.56	8.28
03/2004	0.00	4.17	0.02	0.00	0.37	4.57	0.00	11.84	0.08	0.00	0.93	12.85
04/2004	0.00	5.92	0.04	0.00	0.37	6.34	0.00	17.76	0.13	0.00	1.30	19.19
05/2004	0.00	5.87	0.02	0.00	0.55	6.44	0.00	23.63	0.15	0.00	1.85	25.63
06/2004	0.00	6.11	0.04	0.00	0.82	6.97	0.00	29.75	0.18	0.00	2.66	32.60
07/2004	0.00	6.71	0.05	0.00	0.74	7.49	0.00	36.45	0.23	0.00	3.40	40.09
08/2004	0.00	4.63	0.03	0.00	0.76	5.42	0.00	41.09	0.26	0.00	4.16	45.51
09/2004	0.00	4.36	0.02	0.00	0.84	5.22	0.00	45.45	0.28	0.00	5.01	50.73
10/2004	0.00	5.91	0.05	0.00	0.34	6.31	0.00	51.36	0.32	0.00	5.35	57.03
11/2004	0.00	3.76	0.02	0.00	0.71	4.49	0.00	55.12	0.34	0.00	6.06	61.52
12/2004	0.00	2.53	0.03	5.16E-09	0.38	2.94	0.00	55.62	0.35	1.07E-07	6.44	62.42

Resin storage vessels, reservoirs, transfer systems, and collection systems are covered or shielded from the ambient air. Preform injection differs from direct die injection in that the injection chambers are not directly attached to the die.

Prepreg materials means reinforcing fabric received precoated with resin which is usually cured through the addition of heat.

Pultrusion means a continuous process for manufacturing composites that have a uniform cross-sectional shape. The process consists of pulling a fiber-reinforcing material through a resin impregnation chamber or bath and through a shaping die, where the resin is subsequently cured. There are several types of pultrusion equipment, such as open bath, resin injection, and direct die injection equipment.

Repair means application of resin or gel coat to a part to correct a defect, where the resin or gel coat application occurs after the part has gone through all the steps of its typical production process, or the application occurs outside the normal production area. For purposes of this subpart, rerouting a part back through the normal production line, or part of the normal production line, is not considered repair.

Resin transfer molding means a process for manufacturing composites whereby catalyzed resin is transferred or injected into a closed mold in which fiberglass reinforcement has been placed.

Sheet molding compound (SMC) means a ready-to-mold putty-like molding compound that contains resin(s) processed into sheet form. The molding compound is sandwiched between a top and a bottom film. In addition to resin(s), it may also contain catalysts, fillers, chemical thickeners, mold release agents, reinforcements, and other ingredients. Sheet molding compound can be used in compression molding to manufacture reinforced plastic composites products.

Shrinkage controlled resin means a resin that when promoted, catalyzed, and filled according to the resin manufacturer's recommendations demonstrates less than 0.3 percent linear shrinkage when tested according to ASTM D2566.

SMC manufacturing means a process which involves the preparation of SMC.

Tooling gel coat means a gel coat that is used to form the surface layer of molds. Tooling gel coats generally have high heat distortion temperatures, low shrinkage, high barcol hardness, and high dimensional stability.

Tooling resin means a resin that is used to produce molds. Tooling resins generally have high heat distortion temperatures, low shrinkage, high barcol hardness, and high dimensional stability.

Uncontrolled oven organic HAP emissions means those organic HAP emissions emitted from the oven through closed vent systems to the atmosphere and not to a control device. These organic HAP emissions do not include organic HAP emissions that may escape into the workplace through the opening of panels or doors on the ovens or other similar fugitive organic HAP emissions in the workplace.

Uncontrolled wet-out area organic HAP emissions means any or all of the following: Organic HAP emissions from wet-out areas that do not have any capture and control, organic HAP emissions that escape from wet-out area enclosures, and organic HAP emissions from wet-out areas that are captured by an enclosure but are vented to the atmosphere and not to an add-on control device.

Unfilled means that there has been no addition of fillers to a resin or that less than 10 percent of fillers by weight of the total resin plus filler mixture has been added.

Vapor suppressant means an additive, typically a wax, that migrates to the surface of the resin during curing and forms a barrier to seal in the styrene and reduce styrene emissions.

Vapor-suppressed resin means a resin containing a vapor suppressant added for the purpose of reducing styrene emissions during curing.

White and off-white gel coat means a gel coat that contains 10 percent of more titanium dioxide by weight.

TABLE 1 TO SUBPART WWWW OF PART 63—EQUATIONS TO CALCULATE ORGANIC HAP EMISSIONS FACTORS FOR SPECIFIC OPEN MOLDING AND CENTRIFUGAL CASTING PROCESS STREAMS

[As required in §§ 63.5796, 63.5799(a)(1) and (b), and 63.5810(a)(1), to calculate organic HAP emissions factors for specific open molding and centrifugal casting process streams you must use the equations in the following table:]

If your operation type is a new or existing . . .	And you use . . .	With . . .	Use this organic HAP Emissions Factor (EF) Equation for materials with less than 33 percent organic HAP (19 percent organic HAP for nonatomized gel coat) [1 2 3] . . .	Use this organic HAP Emissions Factor (EF) Equation for materials with 33 percent or more organic HAP (19 percent for nonatomized gel coat) [1 2 3] . . .
1. Open molding operation	a. Manual resin application	i. Nonvapor-suppressed resin.	EF = 0.126 × % HAP × 2000.	EF = ((0.286 × %HAP) − 0.0529) × 2000
		ii. Vapor-suppressed resin	EF = 0.126 × % HAP × 2000 × (1 − (0.5 × VSE factor)).	EF = ((0.286 × %HAP) − 0.0529) × 2000 × (1 − (0.5 × VSE factor))
		iii. Vacuum bagging/ closed-mold curing with roll out.	EF = 0.126 × % HAP × 2000 × 0.8.	EF = ((0.286 × %HAP) − 0.0529) × 2000 × 0.8
		iv. Vacuum bagging/ closed-mold curing without roll-out.	EF = (0.126 × % HAP × 2000 × 0.5.	EF = ((0.286 × %HAP) − 0.0529) × 2000 × 0.5
	b. Atomized mechanical resin application.	i. Nonvapor-suppressed resin.	EF = 0.169 × %HAP × 2000.	EF = ((0.714 × %HAP) − 0.18) × 2000
		ii. Vapor-suppressed resin	EF = 0.169 × %HAP × 2000 × (1 − (0.45 × VSE factor)).	EF = ((0.714 × %HAP) − 0.18) × 2000 × (1 − (0.45 × VSE factor))

TABLE 1 TO SUBPART WWWW OF PART 63—EQUATIONS TO CALCULATE ORGANIC HAP EMISSIONS FACTORS FOR SPECIFIC OPEN MOLDING AND CENTRIFUGAL CASTING PROCESS STREAMS—Continued

[As required in §§ 63.5796, 63.5799(a)(1) and (b), and 63.5810(a)(1), to calculate organic HAP emissions factors for specific open molding and centrifugal casting process streams you must use the equations in the following table:]

If your operation type is a new or existing . . .	And you use . . .	With . . .	Use this organic HAP Emissions Factor (EF) Equation for materials with less than 33 percent organic HAP (19 percent organic HAP for nonatomized gel coat) [1 2 3] . . .	Use this organic HAP Emissions Factor (EF) Equation for materials with 33 percent or more organic HAP (19 percent for nonatomized gel coat) [1 2 3] . . .
		iii. Vacuum bagging/ closed-mold curing with roll-out.	EF = 0.169 × %HAP × 2000 × 0.85.	EF = ((0.714 × %HAP) − 0.18) × 2000 × 0.85
		iv. Vacuum bagging/ closed-mold curing without roll-out.	EF = 0.169 × %HAP × 2000 × 0.55.	EF = ((0.714 × %HAP) − 0.18) × 2000 × 0.55
	c. Nonatomized mechanical resin application.	v. Nonvapor-suppressed resin.	EF = 0.107 × %HAP × 2000.	EF = ((0.157 × %HAP) − 0.0165) × 2000
		vi. Vapor-suppressed resin	EF = 0.107 × %HAP × 2000 × (1 − (0.45 × VSE factor)).	EF = ((0.157 × %HAP) − 0.0165) × 2000 × (1 − (0.45 × VSE factor))
		vii. Closed-mold curing with roll-out.	EF = 0.107 × %HAP × 2000 × 0.85.	EF = ((0.157 × %HAP) − 0.0165) × 2000 × 0.85
		viii. Vacuum bagging/ closed-mold curing without roll-out.	EF = 0.107 × %HAP × 2000 × 0.55.	EF = ((0.157 × %HAP) − 0.0165) × 2000 × 0.55
	d. Atomized mechanical resin application with robotic or automated spray control [4].	Nonvapor-suppressed resin.	EF = 0.169 × %HAP × 2000 × 0.77.	EF = 0.77 × ((0.714 × %HAP) − 0.18) × 2000
	e. Filament application [5]	i. Nonvapor-suppressed resin.	EF = 0.184 × %HAP × 2000.	EF = ((0.2746 × %HAP) − 0.0298) × 2000
		ii. Vapor-suppressed resin	EF = 0.12 × %HAP × 2000	EF = ((0.2746 × %HAP) − 0.0298) × 2000 × 0.65
	f. Atomized spray gel coat application.	Nonvapor-suppressed gel coat.	EF = 0.446 × %HAP × 2000.	EF = ((1.03646 × %HAP) − 0.195) × 2000.
	g. Nonatomized spray gel coat application.	Nonvapor-suppressed gel coat.	EF = 0.185 × %HAP × 2000.	EF = ((0.4506 × %HAP) − 0.0505) × 2000.
	h. Manual gel coat application [6].	Nonvapor-suppressed gel coat.	EF = 0.126 × % HAP × 2000 (for emissions estimation only, see footnote 6).	EF = ((0.286 × %HAP) − 0.0529) × 2000 (for emissions estimation only, see footnote 6)
2. Centrifugal casting operations. [7 8].	Heated air blown through molds.	Nonvapor-suppressed resin.	EF = 0.558 × (%HAP) × 2000.	EF = 0.558 × (%HAP) × 2000.
	Vented molds, but air vented through the molds is not heated.	Nonvapor-suppressed resin.	EF = 0.026 × (%HAP) × 2000.	EF = 0.026 × (%HAP) × 2000.

Footnotes to Table 1

[1] To obtain the organic HAP emissions factor value for an operation with an add-on control device multiply the EF above by the add-on control factor calculated using Equation 1 of § 63.5810. The organic HAP emissions factors have units of lbs of organic HAP per ton of resin or gel coat applied.

[2] Percent HAP means total weight percent of organic HAP (styrene, methyl methacrylate, and any other organic HAP) in the resin or gel coat prior to the addition of fillers, catalyst, and promoters. Input the percent HAP as a decimal, *i.e.* 33 percent HAP should be input as 0.33, not 33.

[3] The VSE factor means the percent reduction in organic HAP emissions expressed as a decimal measured by the VSE test method of appendix A to this subpart.

[4] This equation is based on a organic HAP emissions factor equation developed for mechanical atomized controlled spray. It may only be used for automated or robotic spray systems with atomized spray. All spray operations using hand held spray guns must use the appropriate mechanical atomized or mechanical nonatomized organic HAP emissions factor equation. Automated or robotic spray systems using nonatomized spray should use the appropriate nonatomized mechanical resin application equation.

[5] Applies only to filament application using an open resin bath. If resin is applied manually or with a spray gun, use the appropriate manual or mechanical application organic HAP emissions factor equation.

[6] Do not use this equation for determining compliance with emission limits in Tables 3 or 5 to this subpart. To determine compliance with emission limits you must treat all gel coat as if it were applied as part of your gel coat spray application operations. If you apply gel coat by manual techniques only, you must treat the gel coat as if it were applied with atomized spray and use Equation 1.f. to determine compliance with the appropriate emission limits in Tables 3 or 5 to this subpart. To estimate emissions from manually applied gel coat, you may either include the gel coat quantities you apply manually with the quantities applied using spray, or use this equation to estimate emissions from the manually applied portion of your gel coat.

[7] These equations are for centrifugal casting operations where the mold is vented during spinning. Centrifugal casting operations where the mold is completely sealed after resin injection are considered to be closed molding operations.

Unified Emission Factors for Open Molding of Composites

July 23, 2001

Emission Rate in Pounds of Styrene Emitted per Ton of Resin or Gelcoat Processed

Styrene content in resin/gelcoat, % [1]	<33 [2]	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	>50 [2]
Manual	0.126 x %styrene x 2000	83	89	94	100	106	112	117	123	129	134	140	146	152	157	163	169	174	180	((0.286 x %styrene) - 0.0529) x 2000
Manual w/ Vapor Suppressed Resin VSR [3]	**Manual emission factor** [listed above] x (1 - (0.50 x specific VSR reduction factor for each resin/suppressant formulation))																			
Mechanical Atomized	0.169 x %styrene x 2000	111	126	140	154	168	183	197	211	225	240	254	268	283	297	311	325	340	354	((0.714 x %styrene) - 0.18) x 2000
Mechanical Atomized with VSR [3]	**Mechanical Atomized emission factor** [listed above] x (1 - (0.45 x specific VSR reduction factor for each resin/suppressant formulation))																			
Mechanical Atomized Controlled Spray [4]	0.130 x %styrene x 2000	86	97	108	119	130	141	152	163	174	185	196	207	218	229	240	251	262	273	0.77 x ((0.714 x %styrene) - 0.18) x 2000
Mechanical Controlled Spray with VSR	**Mechanical Atomized Controlled Spray emission factor** [listed above] x (1 - (0.45 x specific VSR reduction factor for each resin/suppressant formulation))																			
Mechanical Non-Atomized	0.107 x %styrene x 2000	71	74	77	80	83	86	89	93	96	99	102	105	108	111	115	118	121	124	((0.157 x %styrene) - 0.0165) x 2000
Mechanical Non-Atomized with VSR [3]	**Mechanical Non-Atomized emission factor** [listed above] x (1 - (0.45 x specific VSR reduction factor for each resin/suppressant formulation))																			
Filament application	0.184 x %styrene x 2000	122	127	133	138	144	149	155	160	166	171	177	182	188	193	199	204	210	215	((0.2746 x %styrene) - 0.0298) x 2000
Filament application with VSR [3]	0.120 x %styrene x 2000	79	83	86	90	93	97	100	104	108	111	115	118	122	125	129	133	136	140	0.65 x ((0.2746 x %styrene) - 0.0298) x 2000
Gelcoat Application	0.445 x %styrene x 2000	294	315	336	356	377	398	418	439	460	481	501	522	543	564	584	605	626	646	((1.03646 x %styrene) - 0.195) x 2000
Gelcoat Controlled Spray Application [4]	0.325 x %styrene x 2000	215	230	245	260	275	290	305	321	336	351	366	381	396	411	427	442	457	472	0.73 x ((1.03646 x %styrene) - 0.195) x 2000
Gelcoat Non-Atomized Application [8]	SEE **Note 9** below	196	205	214	223	232	241	250	259	268	278	287	296	305	314	323	332	341	350	((0.4506 x %styrene) - 0.0505) x 2000
Covered-Cure after Roll-Out	**Non-VSR process emission factor** [listed above] x (0.80 for Manual <or> 0.85 for Mechanical)																			
Covered-Cure without Roll-Out	**Non-VSR process emission factor** [listed above] x (0.50 for Manual <or> 0.55 for Mechanical)																			

Emission Rate in Pounds of Methyl Methacrylate Emitted per Ton of Gelcoat Processed

MMA content in gelcoat, % [6]	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	≥20
Gel coat application [7]	15	30	45	60	75	90	105	120	135	150	165	180	195	210	225	240	255	270	285	0.75 x %MMA x 2000

Notes

1 Including styrene monomer content as supplied, plus any extra styrene monomer added by the molder, but before addition of other additives such as powders, fillers, glass,...etc.

2 Formulas for materials with styrene content < 33% are based on the emission rate at 33% (constant emission factor expressed as percent of available styrene), and for styrene content > 50% on the emission rate based on the extrapolated factor equations; these are not based on test data but are believed to be conservative estimates. The value for "% styrene" in the formulas should be input as a fraction. For example, use the input value 0.30 for a resin with 30% styrene content by wt.

3 The VSR reduction factor is determined by testing each resin/suppressant formulation according to the procedures detailed in the ***CFA Vapor Suppressant Effectiveness Test.***

4 SEE the ***CFA Controlled Spray Handbook*** for a detailed description of the controlled spray procedures.

5 The effect of vapor suppressants on emissions from filament winding operations is based on the ***Dow Filament Winding Emissions Study.***

6 Including MMA monomer content as supplied, plus any extra MMA monomer added by the molder, but before addition of other additives such as powders, fillers, glass,...etc.

7 Based on gelcoat data from ***NMMA Emission Study.***

8 SEE the July 17, 2001 EECS report ***Emission Factors for Non-Atomized Application of Gel Coats used in the Open Molding of Composites*** for a detailed description of the non-atomized gelcoat testing.

9 Use the equation **((0.4506 x %styrene) - 0.0505) x 2000** for gelcoats with styrene contents between 19% and 32% by wt.; use the equation **0.185 x %styrene x 2000** for gelcoats with less than 19% styrene content by wt.

DOCUMENT ID: EU001-013
ALTERNATIVE METHODS OF OPERATION

Alternative Methods of Operation

The methods of operation include the following:

- Open Molding Operations using non-CR/HS Resins (Mechanical Applications);
- Open Molding Operations using Tooling Resins (Mechanical & Manual Applications); and
- Cleaning Activities using non-HAP solvents.