# TECHNICAL EVALUATION
# &
# PRELIMINARY DETERMINATION

## APPLICANT

RJ Dougherty & Associates, Inc.
544 Air Park Road
Edgewater, Florida 32132

RJ Dougherty Manufacturing

Facility ID No. 1270163

## PROJECT

Project No. 1270163-007-AC
Application for Minor Source Air Construction Permit
Project Name: Lower Total VOC/HAP Emission Limits

## COUNTY

Volusia County, Florida

## PERMITTING AUTHORITY

Florida Department of Environmental Protection
Air Resource Management
Central District Office
3319 Maguire Blvd., Ste. 232, Orlando, FL 32803-3767

April 27, 2011

Prepared by Natrevia Gradney

## GENERAL PROJECT INFORMATION

### Air Pollution Regulations

Projects at stationary sources with the potential to emit air pollution are subject to the applicable environmental laws specified in Section 403 of the Florida Statutes (F.S.). The statutes authorize the Department of Environmental Protection (Department) to establish regulations regarding air quality as part of the Florida Administrative Code (F.A.C.), which includes the following applicable chapters: 62-4 (Permits); 62-204 (Air Pollution Control - General Provisions); 62-210 (Stationary Sources - General Requirements); 62-212 (Stationary Sources - Preconstruction Review); 62-213 (Operation Permits for Major Sources of Air Pollution); 62-296 (Stationary Sources - Emission Standards); and 62-297 (Stationary Sources - Emissions Monitoring). Specifically, air construction permits are required pursuant to Rules 62-4, 62-210 and 62-212, F.A.C.

In addition, the U. S. Environmental Protection Agency (EPA) establishes air quality regulations in Title 40 of the Code of Federal Regulations (CFR). Part 60 specifies New Source Performance Standards (NSPS) for numerous industrial categories. Part 61 specifies National Emission Standards for Hazardous Air Pollutants (NESHAP) based on specific pollutants. Part 63 specifies NESHAP based on the Maximum Achievable Control Technology (MACT) for numerous industrial categories. The Department adopts these federal regulations on a quarterly basis in Rule 62-204.800, F.A.C.

### Glossary of Common Terms

Because of the technical nature of the project, the permit contains numerous acronyms and abbreviations, which are defined in Appendix A of this permit.

I. Project Description:

A. Applicant:

Mr. Steve Dougherty, President
RJ Dougherty & Associates, Inc.
544 Air Park Road
Edgewater, Florida 32132

B. Professional Engineer:

Mr. Michael Williams, P.E.
Michael C. Williams and Associates
49 N. Federal Highway #318
Pompano Beach, Florida 33062

C. Project Location:

RJ Dougherty Manufacturing
544 Air Park Road
Edgewater, Florida 32132

D. Project Summary:

This construction permit authorizes lowering the emissions limit for total VOCs/HAPs from 249.0 tons per year to 130.0 tons per year and the removal of visible emission (VE) testing requirements for all insignificant particulate matter (PM) sources.

E. Application Information:

Application Received on: 11/17/2010
Additional Information Requested on: 01/14/2011
Additional Information Received on: 04/13/2011
Application Complete: 04/19/2011

II. Rule Applicability

This project is subject to the preconstruction review requirements of Chapter 403, Florida Statutes and Chapters 62-204 through 62-297, Florida Administrative Code (F.A.C.), as indicated below.

| Subject to: | Y/N | Comments |
|---|---|---|
| **Rule 62-210.300, F.A.C.** - Project Not Subject to Prevention of Significant Deterioration or Nonattainment Requirements, F.A.C. | Y | Not exempt from general permitting requirements. |
| **Rule 62-212.400, F.A.C.** - Prevention of Significant Deterioration | N | Facility is not a PSD major source. |
| **Rule 62-296.320(4), F.A.C.** - General Particulate Emission Limiting Standards | Y | Grinding, cutting, and sanding operations could be a source of unconfined particulate matter emissions. |
| **Rules 62-296.320(1) and (2), F.A.C.** - General Pollutant Emission Limiting Standards (VOCs and Odor) | Y | Gel-coat and resin operations are a source of VOC and odors. |
| **Rule 62-296.400, F.A.C.** - Stationary Source Emission Standards | N | There is no applicable source category. |
| **Rule 62-296.500, F.A.C.** - Reasonably Available Control Technology (VOC) | N | Volusia County is an attainment area for ozone. |

| Subject to: | Y/N | Comments |
|---|---|---|
| **Rule 62-296.700, F.A.C.** - Reasonably Available Control Technology (PM) | N | There is no applicable source category. |
| **Rule 62-204.800, F.A.C.** - Standards of Performance for New Stationary Sources (NSPS) | N | There is no applicable source category. |
| **Rule 62-204.800, F.A.C.** National Emission Standard for Hazardous Air Pollutants (NESHAPS – 40 CFR 61) | N | There is no applicable source category. |
| **Rule 62-204.800, F.A.C.** National Emission Standard for Hazardous Air Pollutants for Source Categories a.k.a. MACT (NESHAPS – 40 CFR 63) | Y | EU No. 001 is subject to 40 CFR 63, Subpart VVVV- Boat Manufacturing.<br>EU No. 002 (emergency generator engine) is subject to 40 CFR 63, Subpart ZZZZ (Stationary RICE). |
| **Chapter 62-213, F.A.C.** - Operation Permits for Major Sources of Air Pollution | Y | Facility is a Title V source. |
| **Rule 62-297.310, F.A.C.** - General Compliance Test Requirements, F.A.C. | N | No testing is required for EU No. 001 and EU No. 002. |

III. Summary of Emissions

| Pollutant | EU No. and brief description | Potential Emissions (tpy) | Allowable Emissions (tpy) |
|---|---|---|---|
| VOC | 001- Boat Manufacturing Operations | 130.0 | |
| | **Total** | **130.0** | **130.0** |
| Total HAP | 001- Boat Manufacturing Operations | 130.0 | |
| | **Total** | **130.0** | **130.0** |
| VE | 001- Boat Manufacturing Operations | | 20% |

IV. Federal NSPS and/or NESHAP Provisions

A. NESHAP, Subpart A- General Provisions and Subpart VVVV- Boat Manufacturing. Facility has chosen to use the MACT model point averaging (emissions averaging) option to comply with the NESHAP.

B. NESHAP, Subpart ZZZZ – Stationary Reciprocating Internal Combustion Engines. Initial Notification required per section 63.6645(f).

## V. Conclusions

The emission limits proposed by the applicant will meet all of the requirements of Chapters 62-204 through 297, F.A.C.

The General and Specific Conditions listed in the proposed permit (attached) will assure compliance with all the applicable requirements of Chapters 62-204 through 297, F.A.C.

## VI. Preliminary Determination

The Department makes a preliminary determination that the proposed project will comply with all applicable state and federal air pollution regulations as conditioned by the draft permit. This determination is based on a technical review of the complete application, reasonable assurances provided by the applicant, and the conditions specified in the draft permit. Additional details of this analysis may be obtained by contacting the project engineer at the Florida Department of Environmental Protection Air Resource Management, Central District, 3319 Maguire Blvd., Ste. 232, Orlando, FL 32803-3767.

Pursuant to Section 403.087, Florida Statutes and Section 62-4.070, Florida Administrative Code, the Department hereby gives notice of its intent to issue a permit to construct the aforementioned air pollution source in accordance with the draft permit and its conditions as stipulated (see attached).

# Florida Department of Environmental Protection

Central District
3319 Maguire Boulevard, Suite 232
Orlando, Florida 32803-3767

Rick Scott
Governor

Jennifer Carroll
Lt. Governor

Herschel T. Vinyard Jr.
Secretary


*Electronically Sent- Received Receipt Requested*
**sdough@bellsouth.net**

## DRAFT PERMIT

**PERMITTEE**

RJ Dougherty & Associates, Inc.
544 Air Park Road
Edgewater, Florida 32132

Authorized Representative:
Mr. Steve Dougherty, President

Air Permit No. 1270163-007-AC
Permit Expires: 12/30/2011
Site Name: RJ Dougherty Manufacturing
Major Source Air Construction
Project Name: Lower VOC/HAP
Emissions Limit

This is the final air construction permit, which authorizes a lower emissions limit for total VOCs/HAPs and the removal of visible emission (VE) testing requirements for insignificant particulate matter (PM) sources. RJ Dougherty Manufacturing (Standard Industrial Classification No. 3732) is located in Volusia County at 544 Air Park Road in Edgewater, Florida. The UTM coordinates are Zone 17, 506.97 km East, and 3205.88 km North.

This final permit is organized by the following sections:

Section 1. General Information

Section 2. Administrative Requirements

Section 3. Facility-wide and Emissions Unit Specific Conditions

Section 4. Appendices

Because of the technical nature of the project, the permit contains numerous acronyms and abbreviations, which are defined in Appendix A of Section 4 of this permit.

This air pollution permit is issued under the provisions of: Chapter 403 of the Florida Statutes (F.S.) and Chapters 62-4, 62-204, 62-210, 62-212, 62-296 and 62-297 of the Florida Administrative Code (F.A.C.). The permittee is authorized to conduct the proposed work in accordance with the conditions of this permit. This project is subject to the general preconstruction review requirements in Rule 62-212.300, F.A.C. and is not subject to the preconstruction review requirements for major stationary sources in Rule 62-212.400, F.A.C. for the Prevention of Significant Deterioration (PSD) of Air Quality.

Upon issuance of this final permit, any party to this order has the right to seek judicial review of it under Section 120.68 of the Florida Statutes by filing a notice of appeal under Rule 9.110 of the Florida Rules of Appellate Procedure with the clerk of the Department of Environmental Protection in the Office of General Counsel (Mail Station #35, 3900 Commonwealth Boulevard, Tallahassee, Florida, 32399-3000) and by filing a copy of the notice of appeal accompanied by the applicable

filing fees with the appropriate District Court of Appeal. The notice must be filed within 30 days after this order is filed with the clerk of the Department.

Executed in Orange County, Florida

*DRAFT*

_____ _____

Caroline D. Shine
District Air Program Administrator
Central District

Effective Date

## CERTIFICATE OF SERVICE

The undersigned duly designated deputy agency clerk hereby certifies that this Final Air Permit package (including the Final Determination, the Final Permit and the Appendices) was sent by electronic mail (or a link to these documents made available electronically on a publicly accessible server) with received receipt requested before the close of business on _____ _____ to the persons listed below.

Mr. Steve Dougherty: sdough@bellsouth.net
Mr. Michael Williams, P.E.: mwilliams@mwilliamsassoc.com
Ms. Katy Forney, U.S. EPA Region 4: forney.kathleen@epamail.epa.gov
Ms. Ana Oquendo, EPA Region 4: oquendo.ana@epamail.epa.gov
Ms. Barbara Friday, DEP BAR: barbara.friday@dep.state.fl.us (for posting with U.S. EPA, Region 4)

Clerk Stamp

**FILING AND ACKNOWLEDGMENT FILED**, on this date, pursuant to Section 120.52(7), Florida Statutes, with the designated agency clerk, receipt of which is hereby acknowledged.

*DRAFT*

_____ _____ _____ _____

(Clerk) (Date)

## FACILITY AND PROJECT DESCRIPTION

### RJ Dougherty Manufacturing

The facility is a fiberglass boat manufacturing facility. The operations are located in six buildings at the facility that are designated as Buildings A, B, C, D, E, and F.

The existing facility consists of the following emissions units.

| Facility ID No. 1270163 | |
|---|---|
| ID No. | Emission Unit Description |
| 001 | Boat Manufacturing Operations |

### Project Description

This project authorizes lower emission limits for total VOCs and total HAPs from 249.0 tons per year to 130.0 tons per year and the removal of visible emission (VE) testing requirements for all insignificant particulate matter (PM) sources.

*NOTE: Please reference the Permit No., Facility ID, and Emission Unit ID in all correspondence, test report submittals, applications, etc.*

## FACILITY REGULATORY CLASSIFICATION

- The facility is a major source of hazardous air pollutants (HAP).
- The facility has no units subject to the acid rain provisions of the Clean Air Act (CAA).
- The facility is a Title V major source of air pollution in accordance with Chapter 213, F.A.C.
- The facility is not a major stationary source in accordance with Rule 62-212.400(PSD), F.A.C.

## PERMIT HISTORY/AFFECTED PERMITS

Modifies Permit No. 1270163-005-AV

1. Permitting Authority: The permitting authority for this project is the Florida Department of Environmental Protection, Central District Air Resource Management Section. The Central District's mailing address and phone number is:

   Florida Department of Environmental Protection
   Central District Office
   Air Resource Management Section
   3319 Maguire Blvd., Ste. 232
   Orlando, FL 32803-3767
   Telephone: 407-897-4100 (effective 6/30/11)

   All documents related to applications for permits shall be submitted to the above address.

2. Compliance Authority: All documents related to compliance activities such as reports, tests, and notifications shall be submitted to the Central District Air Resource Management Section (see above mailing address and phone number) or Local Air Program Name. The mailing address and phone number of the Local Air Program is: Address and Phone Number.

3. Appendices: The following Appendices are attached as part of this permit:
   a. Appendix A. Citation Formats and Glossary of Common Terms;
   b. Appendix B. General Conditions;
   c. Appendix C. Common Conditions; and
   d. Appendix D. Common Testing Requirements.
   e. Appendix E. NESHAP, Subpart VVVV

4. Applicable Regulations, Forms and Application Procedures: Unless otherwise specified in this permit, the construction and operation of the subject emissions units shall be in accordance with the capacities and specifications stated in the application. The facility is subject to all applicable provisions of: Chapter 403, F.S.; and Chapters 62-4, 62-204, 62-210, 62-212, 62-213, 62-296 and 62-297, F.A.C. Issuance of this permit does not relieve the permittee from compliance with any applicable federal, state, or local permitting or regulations.

5. New or Additional Conditions: For good cause shown and after notice and an administrative hearing, if requested, the Department may require the permittee to conform to new or additional conditions. The Department shall allow the permittee a reasonable time to conform to the new or additional conditions, and on application of the permittee, the Department may grant additional time.
   [Rule 62-4.080, F.A.C.]

6. Modifications: Unless otherwise exempt by rule, the permittee shall not initiate any construction, reconstruction, or modification at the facility and shall not install/modify any pollution control device at the facility without obtaining prior authorization from the Department. Modification is defined as: Any physical change or changes in the method of operations or addition to a facility that would result in an increase in the actual emissions of any air pollutant subject to air regulations, including any not previously emitted, from any emission unit or facility.
   [Rules 62-210.200 - Definition of "Modification" and 62-210.300(1)(a), F.A.C.]

7. Annual Operating Report: On or before **April 1** of each year, the permittee shall submit a completed DEP Form 62-210.900(5), "Annual Operating Report for Air Pollutant Emitting Facility" (AOR) for the preceding calendar year. The report may be submitted electronically in accordance with the instructions received with the AOR package sent by the Department, or a hardcopy may be sent to the Compliance Authority.
[Rule 62-210.370(3), F.A.C.]

8. Application for Title V Air Operation Permit: This permit authorizes construction or modification of the permitted emissions unit(s) and initial operation to determine compliance with Department rules. A Title V air operation permit is required for continued operation of the permitted emissions unit(s).

   **{Permitting Note: The application for the operation permit has already been submitted to the Department}**

   [Rules 62-4.030, 62-4.050, 62-4.220 and Chapter 62-213, F.A.C.]

## A. EU No. 001- Boat Manufacturing Operations

This section of the permit addresses the following emissions unit.

| ID No. | Emission Unit Description |
|---|---|
| 001 | The boat manufacturing operations include building hulls, decks, and parts by applying gel coat to the inside of a mold, then applying fiberglass laminate. The parts are then removed from the mold and ground and trimmed of excess material. The hulls and decks are assembled and foam is injected into the assembly, then the assembly is sanded, buffed, and polished. Motors, consoles, rub rails, and other parts are then assembled. Small parts are made with a similar gel coat/fiberglass lamination process. |

### PERFORMANCE RESTRICTIONS

A.1. Federal Regulatory Requirements: This emission unit is subject to 40 CFR 63, Subpart A-General Provisions and Subpart VVVV – Boat Manufacturing, which is adopted by reference in Rule 62-204.800, F.A.C.
[Rule 62-204.800(11), F.A.C.]

A.2. Restricted Operation: The hours of operation are not limited (8760 hours per year).
[Rules 62-4.070(3) and 62-210.200(PTE), F.A.C.]

### EMISSIONS STANDARDS

A.3. VOC/HAP Emissions Limitation: The maximum permitted emissions shall not exceed the following:

| Pollutant | Emissions (tons per any consecutive 12-month period) |
|---|---|
| Total VOCs | 130.0 |
| Total HAPs | 130.0 |

[Rule 62-210.200(PTE), F.A.C.]

A.4. Visible Emissions (VE) Limitation: No person shall cause, let, permit or allow to be discharged into the atmosphere the emissions of air pollutants from any activity, the density of which is equal to or greater than 20 percent opacity.
[Rule 62-296.320(4)(b)1 (General Visible Emission Standard), F.A.C.]

### RECORDS AND REPORTS

A.5. Monthly Recordkeeping Requirement: In order to demonstrate compliance with specific condition A.3., the permittee shall maintain a monthly log at the facility. The log shall be completed by the end of the following month and retained on file at the facility for at least five years from the date the data is recorded. At a minimum, the monthly log shall contain the following:

a) Designation of the month and year of operation for which the records are being tabulated.
b) Consecutive 12-month totals of gel-coat, resins and other VOC/HAP containing materials.

c) Consecutive 12-month totals of VOC, combined HAPs, and individual HAP emission rates. The VOC/HAP emission rates are calculated using emission factors from the following table:

| | NVS Monomer-35% | NVS Monomer-38% | NVS Monomer-42% |
|---|---|---|---|
| Resin Non-Spray Lay-up | 11 | 11 | 12 |
| Resin Spray Lay-up | 16 | 18 | 20 |
| Gel Coat | 48 | 51 | 54 |

NVS = non-vapor suppressed emission factors as a percent of available monomer

Note: A consecutive 12-month total is equal to the total for the month in question plus the totals for the eleven months previous to the month in question. A consecutive 12-month total treats each month of the year as the end of a 12-month period. A 12-month total is not a year-to-date total. Facilities that have not been operating for 12 months should retain 12-month totals using whatever number of months of data is available until such a time as a consecutive 12-month total can be maintained each month. **The monthly logs shall be completed by the end of the following month.**

Logs must document the method, calculations, and formulas used in determining the usage rate and the emission rate. This includes, but is not limited to, the product name, density, individual and total HAP contents, and individual and total VOC content. All calculations, including those used to derive emission credits for mass balance, must be clearly documented, and may be presented **in the form of a template of sample calculations**, which is filed with the logs required in this specific condition and available for review on site by regulatory inspectors.
[Rule 62-4.070(3), F.A.C.]

A.6. Supporting Documentation: Documentation of each chemical reclaimed will use a mass balance method to determine usage/emissions (the amount used minus the amount collected for disposal or recycle). Supporting documentation (chemical usage tracking logs, MSD sheets, emission factors, purchase orders, EPA "As Supplied" data sheets, EPA Method 24 and 24A, etc.) and including references to the VOC/HAP emission factors used, shall be kept for each chemical and associated products which includes sufficient information to determine usage rates and emissions. These records shall be made available to the Department upon request.

Volatile matter content shall be calculated using a percent solids basis (less water and exempt solvents) for adhesives, coatings, and inks, using EPA Reference Method 24 and 24A, or the Department shall accept a certification by the coating manufacturer of the composition of the coating if it is supported by standard formulation records for catalog paints or actual batch formulation records. The manufacturer's certification shall be consistent with EPA's document number 450/3-84-019, titled, "Procedures for Certifying Quantity of Volatile

Organic Compounds Emitted by Paint, Ink, and Other Coatings". The documents shall be kept at the facility for at least five years and made available to the Department.
[Rules 62-4.070(3), and 62-213.440(1)(b)2., F.A.C.]

A.7. Semi Annual Report: Within 60 days following the end of each 6-month period after startup, submit a semi-annual compliance report.
[Rule 62-4.070(3), F.A.C.; 40 CFR 63, Subpart VVVV]