TECHNICAL EVALUATION
&
PRELIMINARY DETERMINATION

APPLICANT

Agri-Source Fuels, LLC
15000 Citrus Country Dr., Suite 110
Dade City, Florida 33523

Facility ID No. 1010505

PROJECT

Project No. 1010505-003-AC
Application for Minor Air Construction Permit
Project Name: Revise Construction Permit 1010505-002-AC

COUNTY

Pasco, Florida

PERMITTING AUTHORITY

Florida Department of Environmental Protection
Air Resource Management
Southwest District Office
Temple Terrace, Florida 33637-7600

March 19, 2012

Prepared by Danny Stubbs

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. Rodney Sutton, President
Agri-Source Fuels, LLC
15000 Citrus Country Dr., Suite 110
Dade City, FL 33523

B. Professional Engineer:
Mr. Scott McCann, P.E.,
Golder Associates Inc.
6026 NW 1st Place
Gainesville, FL 32607

C. Project Location:

The facility is located at 15000 Citrus County Dr., Suite 110, Pasco County.

Figure 1. Aerial view and map location of the Agri-Source, LLC. Images obtained from Google Maps.

D. Project Summary:

This project redefines the facility's emissions units by removing the glycerin refining operation from Emissions Unit No. 001 (Biodiesel Production and Glycerin Refining) and permitting it as Emissions Unit No. 003 (Glycerin Refining). This project also increases the permitted production rate for the glycerin refining operation from 1.2 to 3.6 million gallons per year.

E. Application Information:

Application Received on: 01/25/2012
Application Complete: 01/25/2012

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. - Permits Required	Y	Subject to 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	Process may be a source of unconfined particulate matter emissions
Rules 62-296.320(1) and (2), F.A.C. - General Pollutant Emission Limiting Standards (VOC and Odor)	Y	facility is a source of VOC, could also be a source of odor
Rule 62-296.401-407, 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	Pasco County is not an air quality maintenance area for ozone
Rule 62-296.700, F.A.C. - Reasonably Available Control Technology (PM)	N	this is a new source, therefore not subject to PM RACT rule
Rule 62-204.800, F.A.C. - Standards of Performance for New Stationary Sources (NSPS)	Y	Applicable NSPS subparts for this facility include Dc, Kb, VVa and NNN. Additionally, this facility produces the SOCMI chemical glycerin.
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)	N	there is no applicable source category
Chapter 62-213, F.A.C. - Operation Permits for Major Sources of Air Pollution	N	facility is a synthetic non-Title V source
Rule 62-297.310, F.A.C. - General Compliance Test Requirements, F.A.C.	Y	NSPS performance testing is required for EU No. 001.

III. Summary of Emissions

With Methanol Vapory Recovery System (60 MM Gal Biodiesel Production)			
Pollutant	EU No.	Potential Emissions (tpy)	Allowable Emissions (tpy)
PM	002	0.91	N/A
PM10	002	0.91	
VOC	001	2.37	
	002	0.66	
	003	3.5	
	Fitting Losses	5.01	
	Facility Total	**11.54**	
NOx	002	12.0	
SO2	002	0.075	
CO	002	10.1	
Total HAP	001	2.50	
	Fitting Losses	5.01	
	Facility Total	**7.51**	
Individual HAP (Methanol)	001	2.37	
	Fitting Losses	5.01	
	Facility Total	**7.38**	
Individual HAP (HCl)	001	0.128	

Note: Potential emissions for E.U. 002 are based on operating with the hot oil heater fired with natural gas as the fuel. VOC emissions for E.U. No. 003 are based on vacuum pump exhaust emissions of 0.8 lb/hr during December 20, 2011 emissions test. Based on information contained in a previous permit application dated August 4, 2009 and the resulting technical evaluation included with draft construction permit 1010505-002-AC, potential VOC emission increased from 0 to 3.5 tpy. On page 8 of the permit application dated August 4, 2009, the consultant Penn Pro includes a disclaimer that states "It is the opinion of PENN PRO that glycerin, as handled in this facility, does not represent a VOC". On page 16 of the permit application dated August 4, 2009, potential VOC emissions are listed at 9.8 tpy for biodiesel production and glycerin refining combined. On page 16 of the permit application dated September 12, 2008, potential VOC emissions are listed at 9.8 tpy for biodiesel production without glycerin refining. In both cases, Penn Pro was including the potential VOC emissions limit as if it were the allowable limit for the permit. However, to avoid the need for monthly VOC emissions calculations, biodiesel and glycerin throughputs limit are used to control VOC potential emissions. E.U. No. 001 potential VOC emissions estimate can be found in Attachment 5 of the permit application dated September 12, 2008.

IV. 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.

V. 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, Southwest District 13051 North Telecom Parkway, Temple Terrace, Florida 33637-7600.

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).