TECHNICAL EVALUATION
&
PRELIMINARY DETERMINATION

APPLICANT

Pro-Mac Machine, Inc.
6156 15th Street East
Bradenton, FL 34203

Facility ID No. 0810242

PROJECT

Project No. 0810242-001-AC
Application for Minor Air Construction Permit
Project Name: Beryllium Machining

COUNTY

Manatee County, Florida

PERMITTING AUTHORITY

Florida Department of Environmental Protection
Air Resource Management
Southwest District Office
Temple Terrace, Florida 33637-0926

5/29/2014

Prepared by Quaid Noor

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. Facility Description:

The applicant proposes to construct a beryllium machining operation for producing high tolerance components manufactured from beryllium. Particulate Matter (PM) hazardous air pollutant (HAP) emissions (i.e., beryllium) from operation of machining equipment will be collected by vacuum pick-up lines and removed by an emissions control system which consists of dust collector with a cyclone, bag collector and an in-line HEPA filter (99.9% design efficiency).

II. Project Description:

A. Applicant:

John Kosiarski, President
Pro-Mac Machine, Inc.
6156 15th Street East, Bradenton, FL 34203

B. Professional Engineer:

Robert Wallace, III
Environmental Engineering Consultants, Inc.
5119 N. Florida Ave, Tampa, FL 33603

C. Project Location:

6156 15th Street East, Bradenton, FL 34203

D. Project Summary:

The applicant proposes to construct a beryllium machining operation for producing high tolerance components manufactured from beryllium. Particulate Matter (PM) hazardous air pollutant (HAP) emissions (i.e., beryllium) from operation of machining equipment will be collected by vacuum pick-up lines and removed by an emissions control system which consists of dust collector with a cyclone, bag collector and an in-line HEPA filter (99.9% design efficiency), as further described in the permit.

E. Application Information:

Application Received on: 4/21/2014
Additional Information Requested on: 5/5/2014
Additional Information Received on: 5/28/2014
Application Complete on: 5/28/2014

III. Applicable State and Federal Regulations

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	machining 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)	N	there is no applicable source category
Rule 62-296.401-418, 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	Manatee 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)	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)	Y	EU No. 001 is subject to 40 CFR 61, Subpart C
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

Subject to:	Y/N	Comments
Chapter 62-213, F.A.C. - Operation Permits for Major Sources of Air Pollution	N	facility is a natural minor source
Rule 62-297.310, F.A.C. - General Compliance Test Requirements, F.A.C.	Y	Beryllium testing is required for EU No. 001

IV. Summary of Emissions

Pollutant	EU No. and brief description	Potential Emissions	Allowable Emissions
Individual HAP (Beryllium)	001 – Beryllium Machining	0.022 lb/24-hour (equivalent to 4.01×10^{-3} tpy)	0.022 lb/24-hour

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, 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).