

SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT	PAGES 8	PAGE 1
ENGINEERING AND COMPLIANCE	523904-7	DATE 10/28/11
PERMIT APPLICATION EVALUATION AND CALCULATIONS	PROCESSED BY AED	CHECKED

**PERMIT TO CONSTRUCT & OPERATE EVALUATION
(Laser Cutters, Dust Collector, ESP, and Vacuum Pump)**

OWNER/OPERATOR: ROHR, INC. OPERATING AS GOODRICH AEROSTRUCTURES

FACILITY ID: 800113

EQUIPMENT LOCATION: 8200 ARLINGTON AVE., RIVERSIDE, CA 92503

MAILING ADDRESS: SAME AS ABOVE

Title V Permit Revision Application:

A/N: 523907

SECTION H: PERMITS TO CONSTRUCT AND TEMPORARY PERMIT TO OPERATE EQUIPMENT DESCRIPTION:

Equipment	ID No.	Connecte d To	Source Type/ Monitoring Unit	Emissions	Conditions
Process 20: LASER CUTTING					
CUTTER, R & D LASER, MODEL NO. ASC-3-SPI-20, 220 WATTS MAXIMUM Reference: A/N: 525296 A/N: 503427	D253	C264		PM: RULE 405	B59.10, C1.20, D323.1, E57.1, E147.1, E193.2
CUTTER, R&D PROTOTYPE, SPI LASER REDENERGY, MODEL #20/HS, WITH FOUR LASERS, 1000 WATTS MAXIMUM INPUT, INCORPORATED INTO ARGES LASER SCANNING, # TIGERCLAW-4 Reference: A/N: 525295 A/N: 511928	D260	C264		PM: RULE 405	B59.10, C1.24, D323.1, E57.1, E147.1, E193.2
DUST COLLECTOR, TWO STAGE FILTER CONSISTING: PRE-FILTER, DAYTON, 3AA31, ¾ HP, FILTER, FUMEX, FA5, WITH MAX 95 SQ. FT DEEP PLEATED DIMPLED FILTER, AND 1 HEPA FINAL FILTER Reference:A/N: 523906	C264	D253, D260		PM: RULE 404	A63.21, C6.19, D29.1, D90.2, D322.4, D381.2, E102.1, E175.2, E193.2, H23.14, K67.1

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SECTION D: PERMITS TO OPERATE					
Equipment	ID No.	Connecte d To	Source Type/ Monitoring Unit	Emissions	Conditions
PUMP, VACUUM SYSTEM Reference: A/N: 525294 A/N: 132478	D89	C263			E57.1
ELECTROSTATIC PRECIPITATOR, UNITED AIR SPECIALIST, SMOG HOG, MODEL NO. SHN-20-M, AND WITH 65 PLATES, 2.3 SQ. FT TOT. PRECIPITATION CROSS SEC. AREA, 2500 CFM EXH. FAN Reference: A/N: 523905	C263	D89		PM: RULE 404	A63.21, D381.1, E202.1, H23.14, K67.12

Laser Cutters # 2 & 3 Conditions:

B59.10 The operator shall not use the following materials in this device:

Materials containing any toxic air containants (TAC) listed in Table 1 of Rule 1401 except methyl ethyl ketone, with an effective date of June 5, 2009, or earlier.

(A/N 525296 only, Laser Cutter # 2)

C1.20 The operator shall limit the material processed to no more than 15 lb(s) in any one calendar month.

For the purposes of this condition, material processed shall be defined as the total weight of material being cut by the laser.

For the purpose of this condition, material processed shall be defined as reins impregnated carbon fiber, resin impregnated fiberglass, epoxy film adhesive, and peel ply material.

To comply with this condition, the operator shall maintain records of the type of material used, total length, width and thickness of the material being cut.

The operator shall maintain records in a manner approved by the District, to demonstrate compliance with this condition.

(A/N 525295 only, Laser Cutter # 3)

C1.24 The operator shall limit the material processed to no more than 30 lb(s) in any one calendar month.

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For the purposes of this condition, material processed shall be defined as the total weight of material being cut by the laser.

For the purpose of this condition, material processed shall be defined as resin impregnated carbon fiber, resin impregnated fiberglass, epoxy film adhesive, and peel ply material.

To comply with this condition, the operator shall maintain records of the type of material used, total length, width and thickness of the material being cut.

The operator shall maintain records in a manner approved by the District, to demonstrate compliance with this condition.

D323.1 The operator shall conduct an inspection for visible emissions from all stacks and other emission points of this equipment whenever there is a public complaint of visible emissions, whenever visible emissions are observed, and on an annual basis, at least, unless the equipment did not operate during the entire annual period. The routine annual inspection shall be conducted while the equipment is in operation and during daylight hours.

if any visible emissions (not including condensed water vapor) are detected that last more than three minutes in any one hour, the operator shall verify and certify within 24 hours that the equipment causing the emission and any associated air pollution control equipment are operating normally according to their design and standard procedures and under the same conditions under which compliance was achieved in the past, and either;

- 1) Take corrective action(s) that eliminate the visible emissions within 24 hours and report the visible emissions as a potential deviation in accordance with the reporting requirements in Section K of this permit; or
- 2) Have a Carb-certified smoke reader determine compliance with the opacity standard, using EPA Method 9 or the procedures in the CARB manual "Visible Emissions Evaluation", within three business days and report any deviations to AQMD.

The operator shall keep the records in accordance with the recordkeeping requirements in Section K of this permit and the following records;

- 1) Stack or emission point identification
- 2) Description of any corrective actions taken to abate visible emissions
- 3) Date and time visible emission was abated, and
- 4) All visible emissions observation records by operator or a certified smoke reader.

E57.1 The operator shall vent this equipment to an air pollution control device which is in full use and which has been issued a permit to operate by the Executive Officer whenever it is in operation.

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E147.1 The operator shall only conduct the processing of resin impregnated carbon fiber, resin impregnated fiberglass, epoxy film adhesive, and peel ply material in this equipment.

E193.2 The operator shall construct this equipment according to the following requirements;

This permit shall expire if the construction of this equipment is not complete within one year from the date of the issuance of this permit unless an extension of time has been approved in writing by a District representative.

The operator shall notify a District representative when construction has been completed.

Dust Collector Conditions:

A63.21 The operator shall limit emissions from this equipment as follows:

CONTAMINANT	EMISSION LIMIT
Visible emissions	Less than or equal to 0 Percent Opacity

C6.19 The operator shall use this equipment in such a manner that the differential pressure being monitored, as indicated below, does not exceed 4.5 inches water column.

To comply with this condition, the operator shall install and maintain a(n) differential pressure gauge to accurately indicate the differential pressure across the filter media.

The operator shall determine and record the parameter being monitored once every 7 days.

D29.1 The operator shall conduct source test(s) for the pollutant(s) identified below:

Pollutant(s) to be tested	Required Test Method (s)	Averaging Time	Test Location
PM10 emissions	Approved District Method	District-approved averaging time	Simultaneous inlet and outlet
Total hydrocarbon emissions	Approved District Method	District-approved averaging time	Simultaneous inlet and outlet
Polyunuclear Aromatic Hydrocarbons (PAH)	Approved District Method	District-approved averaging time	Simultaneous inlet and outlet
Cyanide emissions	Approved District Method	District-approved averaging time	Simultaneous inlet and outlet

A speciated analysis shall be conducted for organic compounds using GC/MS.

The speciated analysis shall be conducted for the inlet and outlet.

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The source test shall be conducted no later than 210 days after the initial start-up of this equipment unless otherwise approved in writing by the District.

The test shall be conducted to determine the emissions of any toxic air contaminants and volatile organic compounds resulting from the laser cutting operation, the collection efficiency, and the control efficiency of the control equipment.

Two complete copies of source test protocol shall be submitted to the District engineer no later than 90 days after the initial start-up of this equipment unless otherwise approved in writing by the District. The test protocol shall be approved in writing by the District before the test commences.

The test protocol shall include, but not limited to, the proposed operating conditions of the equipment during the test, the identity of the testing laboratory, a statement from the testing laboratory certifying it meets the criteria in District Rule 304(k), and a description of the sampling and analytical procedures to be used.

A written notice of the source tests shall be submitted to the District engineer at least 14 days prior to source testing date so that an observer from the District may be present.

Two complete copies of source test reports shall be submitted to the District engineer within 45 days after the source testing date.

The source test report shall also include, exhaust flow rate, moisture content, O₂ concentration, the number of panels used during the test, number of holes cut, and diameter and depth of each hole cut

D90.2 The operator shall periodically monitor the hydrocarbon concentration at the inlet and outlet according to the following specifications:

The operator shall use a District approved Organic Vapor Analyzer (OVA) to monitor the parameter.

The operator shall calibrate the instrument used to monitor the parameter in ppmv methane.

The operator shall monitor once every month

The monitoring frequency shall be reduced to at least quarterly, if three consecutive monthly monitoring show no hydrocarbon readings.

The monitoring frequency shall be increased to once every month, no later than 30 days after the discovery of any hydrocarbon readings.

The operator shall maintain records to demonstrate compliance with this condition.

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D322.4 The operator shall perform a monthly inspection of the equipment and filter media for leaks, broken or torn filter media, and improperly installed filter media.

D381.2 The operator shall conduct an inspection for visible emissions from all stacks and other emission points of this equipment whenever there is a public complaint of visible emissions, whenever visible emissions are observed, and on an annual basis, at least, unless the equipment did not operate during the entire annual period. The routine annual inspection shall be conducted while the equipment is in operation and during daylight hours. If any visible emissions (not including condensed water vapor) are detected, the operator shall take corrective action(s) that eliminate the visible emissions within 24 hours and report the visible emissions as a potential deviation in accordance with the reporting requirements in Section K of this permit.

The operator shall keep the records in accordance with the recordkeeping requirements in Section K of this permit and the following records;

- 1) Stack or emission point identification
- 2) Description of any corrective actions taken to abate visible emissions
- 3) Date and time visible emission was abated, and

E102.1 The operator shall discharge dust collected in this equipment only into closed containers.

E175.2 The operator shall not use this equipment unless all exhaust air passes through the following:

HEPA filters that are individually DOP tested with 0.3 micron particulates and certified to have an efficiency of not less than 99.97%.

E193.2 The operator shall construct this equipment according to the following requirements;

This permit shall expire if the construction of this equipment is not complete within one year from the date of the issuance of this permit unless an extension of time has been approved in writing by a District representative.

The operator shall notify a District representative when construction has been completed.

H23.14 This equipment is subject to the applicable requirements of the following rules or regulations:

Contaminant	Rule	Rule Rule/Subpart
PM	District Rule	1155

K67.1 The operator shall keep records, in a manner approved by the District, for the following parameter(s) or item(s);

The name of the person performing the inspection and/or maintenance of the filter media

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The date, time and results of the inspection.

The date, time and description of any maintenance or repairs resulting from the inspection.

Control Equipment (ESP):

A63.21 The operator shall limit emissions from this equipment as follows:

CONTAMINANT	EMISSION LIMIT
Visible emissions	Less than or equal to 0 Percent Opacity

D381.1 The operator shall conduct an inspection for visible emissions from all stacks and other emission points of this equipment whenever there is a public complaint of visible emissions, whenever visible emissions are observed, and on a quarterly basis, at least, unless the equipment did not operate during the entire quarterly period. The routine quarterly inspection shall be conducted while the equipment is in operation and during daylight hours. If any visible emissions (not including condensed water vapor) are detected, the operator shall take corrective action(s) that eliminate the visible emissions within 24 hours and report the visible emissions as a potential deviation in accordance with the reporting requirements in Section K of this permit.

The operator shall keep the records in accordance with the recordkeeping requirements in Section K of this permit and the following records;

- 1) Stack or emission point identification
- 2) Description of any corrective actions taken to abate visible emissions
- 3) Date and time visible emission was abated, and

E202.1 the operator shall clean and maintain this equipment according to the following specifications:

The equipment shall on a monthly basis be cleaned using proper detergent that has built-in buffering agent. The cabinet high voltage feed-thru insulators, prefilter, ionizer, cell and afterfilter shall be cleaned as recommended by the manufacturer.

The operator shall maintain records demonstration compliance with this condition.

H23.14 This equipment is subject to the applicable requirements of the following rules or regulations:

Contaminant	Rule	Rule Rule/Subpart
PM	District Rule	1155

K67.12 The operator shall keep records, in a manner approved by the District, for the following parameter(s) or item(s);

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The name of the person performing the inspection and/or maintenance of the filter media, ionizer, and cell

The date, time and results of the inspection

The date, time and description of any maintenance or repairs resulting from the inspection

Vacuum Pump:

E57.1 The operator shall vent this equipment to an air pollution control device which is in full use and which has been issued a permit to operate by the Executive Officer whenever it is in operation.

BACKGROUND:

The above applications were submitted for the modification of R&D laser cutters No.2 and No.3 by proposing to remove the venting to current air pollution control systems C254 and C261 and venting them to the new proposed air pollution control system C264. Both current and the proposed air pollution control systems consist of a pre-filter, a pleated filter, and HEPA filter. A source test was conducted on one of the existing laser cutters and its associated air pollution control system. A review of the source test result indicated that the air pollution control system did not meet the efficiency requirement specified in the permit. The applicant is proposing to use a larger air pollution control system in order to meet the permit requirement. Also, the applicant is proposing to use laser cutter D260 as the primary cutter and only use laser cutter D253 as a back-up unit.

According to information provided by applicant, the new proposed air pollution control system for the laser cutters consists of two stage filtration system with a pre-filter to collect the larger particles followed by a large capacity, multi-stage filtration system that will replace the existing dust collectors, and will serve the two existing laser cutters. The configuration and materials processed at existing R&D laser cutters will be unchanged. Also, the applicant has removed laser cutter no.1 and its associated air pollution control system C249.

In addition, the applicant submitted applications for an ESP to control the emissions from vacuum pump D89. Emissions from the vacuum pump were controlled by mist eliminator C228. However, due to malfunction of the mist eliminator, the applicant removed the mist eliminator and installed the ESP without the benefit of a permit to construct.

The new ESP operates with much larger air flow (2500 CFM versus 1000 CFM, see attachment). The ESP will be used to filter out vacuum pump oil-based mist. It is equipped on the first stage with heavy duty aluminum mesh prefilters to remove large particles not suitable for precipitation. The second stage of ESP, the aluminum mesh or coalescing type filters mechanically remove oil droplet/coolant mist from air stream. This allows the ESP filter to operate for longer intervals between services. The third stage, is an ionizing section. The fourth stage is collection cells with parallel plates of aluminum. The last stage is the afterfilters, with heavy-duty industrial aluminum mesh filters which aid even air distribution across the cells and trap any collected contaminants that could release from the cells during start and stop operations. The new ESP is expected to perform better than the mist eliminator.

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The following is the summary of the submitted applications:

Previous A/N	Previous Device	New A/N	New Device	Equipment Description	Action
NA		523907		RECLAIM/ TV Revision	
503427	D253	525296	D253	Laser Cutter No. 2	Modification-will be vented to new APC C264
511928	D260	525295	D260	Laser cutter No. 3	Modification-will be vented to new APC C264
511930	C261	523906	C264	Dust Control	Replacement of APC with a larger unit
132478	D89	525294	D89	Vacuum System	Modification-removal of venting to mist eliminator C228 and venting to new ESP
436633	C228	523905	C263	Control Equipment (ESP)	Replacement of mist eliminator with an ESP
503428	C254	NA	NA	Control equipment (dust collector)	Will be inactivated (equipment replaced by C264)
496103	C249	NA	NA	Control equipment (dust collector)	Will be inactivated (per facility request, equipment removed)
501000	D248	NA	NA	Laser Cutter	Will be inactivated (per facility request, equipment removed)

This is a Title V/RECLAIM facility and the Title V renewal permit was issued to the facility on July 6, 2010. This project is the second permit revision since the issuance of the Title renewal V permit. There are no records of complaints or Notices of Violation issued to the facility during the last two years. However, the facility was issued a Notice to Comply on 03/03/10 requiring the facility to comply with all aspects of the requirements of Rule 109 recordkeeping. The facility has complied with above notice and is currently operating in compliance with all applicable rules and regulations.

PROCESS DESCRIPTION:

Rohr manufactures aerospace components for commercial and military aircraft. They perform metal and composite material processing, structural bonding and assembly operations. Manufacturing processes conducted at this location include composite bonding, resin curing, core stabilizing, primer and topcoat spray painting, roller coating, degreasing, solvent cleaning, metal surface preparation, abrasive blasting and tooling preparation.

The two laser cutting equipment are prototypes and will be used to conduct preliminary testing and collecting necessary data for building much larger size equipment to be used for a full production in the future. The configuration, operating hours and materials processed at existing R&D Laser Cutter No. 2

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and No. 3 will be unchanged. Both laser cutters will be vented to the air pollution control system. The new control equipment is a large capacity, multi stage filtration laser fume extraction air filtration system.

The operation of the vacuum pump will remain the same. The facility replaced the mist eliminator with an ESP to control the emissions from the vacuum pumps serving autoclaves and hydroclaves.

EMISSIONS CALCULATIONS:

Laser Cutters:

The facility will replace the existing air pollution control systems C254 and C261 with a new a new air pollution control system, Fumex FA5 C264. According to the technical data sheet, Fumex FA5 is about two times larger, with stronger blower (395 cfm), larger deep-pleated dimpled media pre-filter, HEPA filter, and five times bigger bonded carbon technology versus blended activated carbon with a large domed hood. The new system will be venting two existing laser cutters Devices D253 and D260. The configuration, operating hours and materials processed at existing R&D laser Cutter 2 and 3 will be unchanged. PM10 and VOC emissions will be unchanged. The AEIS and NSR emissions will be entered as calculate in previous applications. A source test will be required to verify the control efficiency requirements of the air pollution control system. The PM emissions was calculated based on assuming maximum total amount of material removed is one pound per day, 99.97 HEPA filter control efficiency, and operating maximum 18hrs/day for previous applications. It is assumed that 98% of material removed will be PM emissions, and the remaining 2% contributes to VOC and TAC emissions.

PM10 Emissions:

Operating the laser cutter results in particulate matter emissions. The PM emissions will be calculated based on the total amount of material removed of one pound per day, 99.97 HEPA filter control efficiency, and operating maximum 18hrs/day. It is assumed that 98% of material removed will be PM emissions, and the remaining 2% contributes to VOC and TAC emissions.

PM:

$$\begin{aligned} \text{Uncontrolled (R}_1\text{)} &= 1 \text{ lb (material removed) X } 0.98 = 0.98 \text{ lb/day} \quad (0.0544 \text{ lb/hr)} \\ \text{Controlled (R}_2\text{)} &= 0.98 \text{ lb/day X (1-0.9997)} = 2.94 \times 10\text{E-04 lb/day} \quad (0.00001 \text{ lb/hr)} \end{aligned}$$

$$(\text{PM}_{10} = \text{PM})$$

VOC Emissions:

VOC Emissions:

It is assumed that maximum of 2% of the material removed contributes to VOC emissions.

$$\begin{aligned} \text{Uncontrolled(R}_1\text{)} &= 1 \text{ lb (material removed) x } 0.02 = 0.02 \text{ lb/day} \quad (0.0011 \text{ lb/hr)} \\ \text{Controlled (R}_2\text{)} &= 0.02 \text{ lb/day} \quad (0.0011 \text{ lb/hr)} \end{aligned}$$

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Vacuum Pump vented to ESP

According to applicant, the configuration, operating hours and materials processed in the existing vacuum pumps will be unchanged, and the facility continues to maintain the same operation. According to previous evaluation (A/N 436633, see attachment), the maximum oil losses are two gallons per month as the worst case scenario.

Assumptions:

Oil density: 10 lbs/gal

ESP efficiency: 94% (per manufacturer)

PM₁₀ emissions:

Uncontrolled (R₁) = 20 lb (material removed per month) = 0.7 lb/day (0.03 lb/hr)

Controlled (R₂) = 20 lbs x (1-0.94) = 1.2 lb/ month = 0.04 lb/day (0.0017 lb/hr)

TOXIC EVALUATION:

According to applicant the facility continues to use the same material processed in the existing laser cutters and vacuum pump, and there would no change in the operating hours or configuration of the units. Therefore, the proposed project will not result in any toxic emission increase.

RULE ANALYSIS

RULE 212 (c)(1) This section requires a public notice for all new or modified permit units that emit air contaminants located within 1,000 feet from the outer boundary of a school. No public notice is required since no school is located within 1,000 ft from the above site.

(c)(2) This section requires a public notice for all new or modified facilities that have on-site emission increases exceeding any of the daily maximums as specified by Rule 212(g).

The equipment will not result in on-site emission increases exceeding the daily maximums for any criteria pollutant emissions as specified in Rule 212(g). Therefore, a 30-day public notice period will not be required.

(c)(3) This section requires a public notice for all new or modified permit units with increases in emissions of toxic air contaminants listed in Table I of Rule 1401 resulting in a cancer risk equal or greater than one in a million.

The proposed modification of two existing laser cutters to be vented to a new air pollution control system, and the venting existing vacuum pump to the ESP will not result in any increase in toxic emissions. Public notice is not required under this section of the rule.

212(g) this section requires a public notice for all new or modified sources that result in emission increases exceeding any of the daily maximums as specified by Rule 212(g). The proposed modifications will not result in an emission increase exceeding the daily maximums.

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	Maximum Daily Emissions					
	ROG	NO _x	PM ₁₀	SO ₂	CO	Pb
Emission increase	0	0	0	0	0	0
MAX Limit (lb/day)	30	40	30	60	220	3
Compliance Status	Yes	Yes	Yes	Yes	Yes	Yes

RULES 401 & 402: Particulate emissions from the laser cutters will be vented to an air pollution control system consisting of a prefilter, a panel filter, and a HEPA filter for particulate emission control and a carbon adsorber for VOC emission control. Particulate emissions from the vacuum pump are vented to an ESP with multiple filter stages to control particulate emissions. With the proper operation and maintenance, no visible emissions are expected from the above operations. compliance with this rule is expected.

RULE 404: (A/N 523906) The flow rate from the multi-stage filtration control equipment is specified at 385 cfm. Particulate emissions for both laser cutters are:
 Controlled hourly A/N 525295: PM10 emissions = 1.0×10^{-5} lbs/hr.
 Controlled hourly A/N 525296 : PM10 emissions = 1.36×10^{-5} lb/hr
 Total PM emissions: 2.36×10^{-5} lb/hr

$$0.0000236 \text{ lbs/hr} \times 7000 \text{ grains/lb} \div (385 \text{ ft}^3/\text{min}) (60 \text{ min/hr}) = 0.000007 \text{ grains/ft}^3$$

Rule 404 specifies that the particulate emission concentration for air flow rates of less than 883 cfm shall not exceed 0.196 grains/cf. The emissions from the multi-stage filtration unit will be less than this limit.

(A/N 525294) The flow rate from ESP is specified as 2500 cfm. Particulate emissions from the vacuum pumps are 0.0017 lb/hr.

$$0.0017 \text{ lbs/hr} \times 7000 \text{ grains/lb} \div (2500 \text{ ft}^3/\text{min}) (60 \text{ min/hr}) = 0.00008 \text{ grains/ft}^3$$

Rule 404 specifies that the particulate emission concentration for air flow rates of 2500 cfm shall not exceed 0.131 grains/cf. The emissions from the multi-stage filtration unit will be less than this limit. Compliance with this rule is expected.

RULE 405: The particulate emissions from the laser cutters and vacuum pumps are less than the limits specified in this rule of 0.99 lbs/hr. Compliance with this rule is expected.

RULE 1303: The proposed project will not result in any emissions increase. There would be an emission decrease as a result of installation of ESP which is more efficient control

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equipment than the mist eliminator. The facility is expected to be in compliance with this rule.

RULE 1401: Toxics: Rule 1401 contains the following requirements:

- 1) *(d)(1) MICR and Cancer Burden* - The cumulative increase in MICR which is the sum of the calculated MICR values for all toxic air contaminants emitted from the new, relocated or modified permit unit will not result in any of the following:
 - (A) an increased MICR greater than one in one million (1.0×10^{-6}) at any receptor location, if the permit unit is constructed without T-BACT;
 - (B) an increased MICR greater than ten in one million (1.0×10^{-5}) at any receptor location, if the permit unit is constructed with T-BACT;
 - (C) a cancer burden greater than 0.5.
- 2) *(d)(2) Chronic Hazard Index* - The cumulative increase in total chronic HI for any target organ system due to total emissions from the new, relocated or modified permit unit will not exceed 1.0 at any receptor location.
- 3) *(d)(3) Acute Hazard Index* - The cumulative increase in total acute HI for any target organ system due to total emissions from the new, relocated or modified permit unit will not exceed 1.0 at any receptor location.

According to the information submitted with the applications, the facility will continue to use the same material processed in the existing laser cutters, and vacuum pump, and there would no change in the operating hours or configuration of the unit. As a result, there would be no toxic emission increase, and no increase in risk.

REGULATION XXX

This facility is in the RECLAIM program. The proposed project is considered as a “de minimis significant permit revision” for non-RECLAIM pollutants or hazardous air pollutants (HAPs), and a “minor permit revision” for RECLAIM pollutants to the RECLAIM/Title V permit for this facility.

Non-RECLAIM Pollutants or HAPs

Rule 3000(b)(6) defines a “de minimis significant permit revision” as any Title V permit revision where the cumulative emission increases of non-RECLAIM pollutants or HAPs from these permit revisions during the term of the permit are not greater than any of the following emission threshold levels:

<u>Air Contaminant</u>	<u>Daily Maximum (lbs/day)</u>
HAP	30
VOC	30
NO _x *	40
PM ₁₀	30

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SOx*	60
CO	220

* Not applicable if this is a RECLAIM pollutant

To determine if a project is considered as a “de minimis significant permit revision” for non-RECLAIM pollutants or HAPs, emission increases for non-RECLAIM pollutants or HAPs resulting from all permit revisions that are made after the issuance of the Title V renewal permit shall be accumulated and compared to the above threshold levels. This proposed project is the 2nd permit revision to the Title V renewal permit issued to this facility on July 6, 2010. The following table summarizes the cumulative emission increases resulting from all permit revisions since the Title V renewal permit was issued:

Revision	HAP	VOC	NOx*	PM10	SOx	CO
First Permit Revision; Addition of laser cutter (D260), Dust collector (C261)	0	0	0	0	0	0
Second Permit Revision: Venting of laser cutters to new APC C264 Venting of vacuum pump to new ESP C263 Inactivation of dust collectors and laser cutter A/N 496103, 503428 & 501000	0	0	0	0	0	0
Cumulative Total	0	0	0	0	0	0
Maximum Daily	30	30	40*	30	60	220

* RECLAIM pollutant, not subject to emission accumulation requirements

Since the cumulative emission increases resulting from all permit revisions are not greater than any of the emission threshold levels, this proposed project is considered as a “de minimis significant permit revision” for non-RECLAIM pollutants or HAPs.

RECLAIM Pollutants

Rule 3000(b)(12)(A)(v) defines a “minor permit revision” as any Title V permit revision that does not result in an emission increase of RECLAIM pollutants over the facility starting Allocation plus nontradeable Allocations, or higher Allocation amount which has previously undergone a significant permit revision process.

Since NOx is a RECLAIM pollutant for this facility, a separate analysis shall be made to determine if the proposed permit revision is considered a “minor permit revision” for RECLAIM pollutants. However, the proposed changes will not result in an increase in NOx emissions. As a result, this proposed project is considered as a “minor permit revision” for RECLAIM pollutants.

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RECOMMENDATION

The proposed project is expected to comply with all applicable District Rules and Regulations. Since the proposed project is considered as a “de minimis significant permit revision” for non-RECLAIM pollutants and hazardous air pollutants, and a “minor permit revision” for RECLAIM pollutants, it is exempt from the public participation requirements under Rule 3006 (b). A proposed permit incorporating this permit revision will be submitted to EPA for a 45-day review pursuant to Rule 3003(j). If EPA does not raise any objections within the review period, a revised Title V permit will be issued to this facility.