|  |  |  |
| --- | --- | --- |
|  | **MICHIGAN DEPARTMENT OF ENVIRONMENT, GREAT LAKES, AND ENERGY**  **AIR QUALITY DIVISION** |  |
| EFFECTIVE DATE: December 30, 2020  ISSUED TO  **Albar Industries Incorporated**  State Registration Number (SRN): N0802  LOCATED AT  780 Whitney Drive, Lapeer, Lapeer County, Michigan 48446 | | |
|  | | |
| **RENEWABLE OPERATING PERMIT**  Permit Number: MI-ROP-N0802-2020  Expiration Date: December 30, 2025  Administratively Complete ROP Renewal Application Due Between  June 30, 2024 and June 30, 2025  This Renewable Operating Permit (ROP) is issued in accordance with and subject to Section 5506(3) of Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended (Act 451). Pursuant to Rule 210(1) of the administrative rules promulgated under Act 451, this ROP constitutes the permittee’s authority to operate the stationary source identified above in accordance with the general conditions, special conditions and attachments contained herein. Operation of the stationary source and all emission units listed in the permit are subject to all applicable future or amended rules and regulations pursuant to Act 451 and the federal Clean Air Act. | | |

|  |
| --- |
| **SOURCE-WIDE PERMIT TO INSTALL**  Permit Number: MI-PTI-N0802-2020  This Permit to Install (PTI) is issued in accordance with and subject to Section 5505(1) of Act 451. Pursuant to Rule 214a of the administrative rules promulgated under Act 451, the terms and conditions herein, identified by the underlying applicable requirement citation of Rule 201(1)(a), constitute a federally enforceable PTI. The PTl terms and conditions do not expire and remain in effect unless the criteria of Rule 201(6) are met. Operation of all emission units identified in the PTI is subject to all applicable future or amended rules and regulations pursuant to Act 451 and the federal Clean Air Act. |

Michigan Department of Environment, Great Lakes, and Energy

Brad Myott, Lansing District Supervisor **TABLE OF CONTENTS**

[AUTHORITY AND ENFORCEABILITY 3](#_Toc60136467)

[A. GENERAL CONDITIONS 4](#_Toc60136468)

[Permit Enforceability 4](#_Toc60136469)

[General Provisions 4](#_Toc60136470)

[Equipment & Design 5](#_Toc60136471)

[Emission Limits 5](#_Toc60136472)

[Testing/Sampling 5](#_Toc60136473)

[Monitoring/Recordkeeping 6](#_Toc60136474)

[Certification & Reporting 6](#_Toc60136475)

[Permit Shield 7](#_Toc60136476)

[Revisions 8](#_Toc60136477)

[Reopenings 8](#_Toc60136478)

[Renewals 9](#_Toc60136479)

[Stratospheric Ozone Protection 9](#_Toc60136480)

[Risk Management Plan 9](#_Toc60136481)

[Emission Trading 9](#_Toc60136482)

[Permit to Install (PTI) 10](#_Toc60136483)

[B. SOURCE-WIDE CONDITIONS 11](#_Toc60136484)

[C. EMISSION UNIT CONDITIONS 12](#_Toc60136485)

[EMISSION UNIT SUMMARY TABLE 12](#_Toc60136486)

[EU-BURNOFFOVEN 14](#_Toc60136487)

[EU-LN1 16](#_Toc60136488)

[EU-LN2 19](#_Toc60136489)

[EU-LN3 22](#_Toc60136490)

[EU-LN4 28](#_Toc60136491)

[EU-LN5 30](#_Toc60136492)

[EU-LN2&3 35](#_Toc60136493)

[D. FLEXIBLE GROUP SPECIAL CONDITIONS 38](#_Toc60136494)

[FLEXIBLE GROUP SUMMARY TABLE 38](#_Toc60136495)

[FG-COATING 40](#_Toc60136496)

[FG-MMMM 45](#_Toc60136497)

[FG-PPPP 51](#_Toc60136498)

[FG-COLDCLEANERS 57](#_Toc60136499)

[FG-BOILER MACT 59](#_Toc60136500)

[E. NON-APPLICABLE REQUIREMENTS 62](#_Toc60136501)

[APPENDICES 63](#_Toc60136502)

[Appendix 1. Acronyms and Abbreviations 63](#_Toc60136503)

[Appendix 2. Schedule of Compliance 64](#_Toc60136504)

[Appendix 3. Monitoring Requirements 64](#_Toc60136505)

[Appendix 4. Recordkeeping 64](#_Toc60136506)

[Appendix 5. Testing Procedures 64](#_Toc60136507)

[Appendix 6. Permits to Install 64](#_Toc60136508)

[Appendix 7. Emission Calculations 64](#_Toc60136509)

[Appendix 8. Reporting 70](#_Toc60136510)

# AUTHORITY AND ENFORCEABILITY

For the purpose of this permit, the **permittee** is defined as any person who owns or operates an emission unit at a stationary source for which this permit has been issued. The **department** is defined in Rule 104(d) as the Director of the Michigan Department of Environment, Great Lakes, and Energy (EGLE) or his or her designee.

The permittee shall comply with all specific details in the permit terms and conditions and the cited underlying applicable requirements. All terms and conditions in this ROP are both federally enforceable and state enforceable unless otherwise footnoted. Certain terms and conditions are applicable to most stationary sources for which an ROP has been issued. These general conditions are included in Part A of this ROP. Other terms and conditions may apply to a specific emission unit, several emission units which are represented as a flexible group, or the entire stationary source which is represented as a Source-Wide group. Special conditions are identified in Parts B, C, D and/or the appendices.

In accordance with Rule 213(2)(a), all underlying applicable requirements are identified for each ROP term or condition. All terms and conditions that are included in a PTI are streamlined, subsumed and/or is state-only enforceable will be noted as such.

In accordance with Section 5507 of Act 451, the permittee has included in the ROP application a compliance certification, a schedule of compliance, and a compliance plan. For applicable requirements with which the source is in compliance, the source will continue to comply with these requirements. For applicable requirements with which the source is not in compliance, the source will comply with the detailed schedule of compliance requirements that are incorporated as an appendix in this ROP. Furthermore, for any applicable requirements effective after the date of issuance of this ROP, the stationary source will meet the requirements on a timely basis, unless the underlying applicable requirement requires a more detailed schedule of compliance.

Issuance of this permit does not obviate the necessity of obtaining such permits or approvals from other units of government as required by law.

# A. GENERAL CONDITIONS

## Permit Enforceability

* All conditions in this permit are both federally enforceable and state enforceable unless otherwise noted. **(R 336.1213(5))**
* Those conditions that are hereby incorporated in a state-only enforceable Source-Wide PTI pursuant to Rule 201(2)(d) are designated by footnote one. **(R 336.1213(5)(a), R 336.1214a(5))**
* Those conditions that are hereby incorporated in a federally enforceable Source-Wide PTI pursuant to Rule 201(2)(c) are designated by footnote two. **(R 336.1213(5)(b), R 336.1214a(3))**

## General Provisions

1. The permittee shall comply with all conditions of this ROP. Any ROP noncompliance constitutes a violation of Act 451, and is grounds for enforcement action, for ROP revocation or revision, or for denial of the renewal of the ROP. All terms and conditions of this ROP that are designated as federally enforceable are enforceable by the Administrator of the United States Environmental Protection Agency (USEPA) and by citizens under the provisions of the federal Clean Air Act (CAA). Any terms and conditions based on applicable requirements which are designated as “state-only” are not enforceable by the USEPA or citizens pursuant to the CAA. **(R 336.1213(1)(a))**
2. It shall not be a defense for the permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this ROP. **(R 336.1213(1)(b))**
3. This ROP may be modified, revised, or revoked for cause. The filing of a request by the permittee for a permit modification, revision, or termination, or a notification of planned changes or anticipated noncompliance does not stay any ROP term or condition. This does not supersede or affect the ability of the permittee to make changes, at the permittee’s own risk, pursuant to Rule 215 and Rule 216. **(R 336.1213(1)(c))**
4. The permittee shall allow the department, or an authorized representative of the department, upon presentation of credentials and other documents as may be required by law and upon stating the authority for and purpose of the investigation, to perform any of the following activities: **(R 336.1213(1)(d))**
   1. Enter, at reasonable times, a stationary source or other premises where emissions-related activity is conducted or where records must be kept under the conditions of the ROP.
   2. Have access to and copy, at reasonable times, any records that must be kept under the conditions of the ROP.
   3. Inspect, at reasonable times, any of the following:
      1. Any stationary source.
      2. Any emission unit.
      3. Any equipment, including monitoring and air pollution control equipment.
      4. Any work practices or operations regulated or required under the ROP.
   4. As authorized by Section 5526 of Act 451, sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with the ROP or applicable requirements.
5. The permittee shall furnish to the department, within a reasonable time, any information the department may request, in writing, to determine whether cause exists for modifying, revising, or revoking the ROP or to determine compliance with this ROP. Upon request, the permittee shall also furnish to the department copies of any records that are required to be kept as a term or condition of this ROP. For information which is claimed by the permittee to be confidential, consistent with the requirements of the 1976 PA 442, MCL §15.231 et seq., and known as the Freedom of Information Act, the person may also be required to furnish the records directly to the USEPA together with a claim of confidentiality. **(R 336.1213(1)(e))**
6. A challenge by any person, the Administrator of the USEPA, or the department to a particular condition or a part of this ROP shall not set aside, delay, stay, or in any way affect the applicability or enforceability of any other condition or part of this ROP. **(R 336.1213(1)(f))**
7. The permittee shall pay fees consistent with the fee schedule and requirements pursuant to Section 5522 of Act 451. **(R 336.1213(1)(g))**
8. This ROP does not convey any property rights or any exclusive privilege. **(R 336.1213(1)(h))**

## Equipment & Design

1. Any collected air contaminants shall be removed as necessary to maintain the equipment at the required operating efficiency. The collection and disposal of air contaminants shall be performed in a manner so as to minimize the introduction of contaminants to the outer air. Transport of collected air contaminants in Priority I and II areas requires the use of material handling methods specified in Rule 370(2).2 **(R 336.1370)**
2. Any air cleaning device shall be installed, maintained, and operated in a satisfactory manner and in accordance with the Michigan Air Pollution Control rules and existing law. **(R 336.1910)**

## Emission Limits

1. Unless otherwise specified in this ROP, the permittee shall comply with Rule 301, which states, in part, “Except as provided in Subrules 2, 3, and 4 of this rule, a person shall not cause or permit to be discharged into the outer air from a process or process equipment a visible emission of a density greater than the most stringent of the following:”2 **(R 336.1301(1))**
   1. A 6-minute average of 20% opacity, except for one 6-minute average per hour of not more than 27% opacity.
   2. A limit specified by an applicable federal new source performance standard.

The grading of visible emissions shall be determined in accordance with Rule 303.

1. The permittee shall not cause or permit the emission of an air contaminant or water vapor in quantities that cause, alone or in reaction with other air contaminants, either of the following:
   1. Injurious effects to human health or safety, animal life, plant life of significant economic value, or property.1 **(R 336.1901(a))**
   2. Unreasonable interference with the comfortable enjoyment of life and property.1**(R 336.1901(b))**

## Testing/Sampling

1. The department may require the owner or operator of any source of an air contaminant to conduct acceptable performance tests, at the owner’s or operator’s expense, in accordance with Rule 1001 and Rule 1003, under any of the conditions listed in Rule 1001(1).2 **(R 336.2001)**
2. Any required performance testing shall be conducted in accordance with Rule 1001(2), Rule 1001(3) and Rule 1003. **(R 336.2001(2), R 336.2001(3), R 336.2003(1))**
3. Any required test results shall be submitted to the Air Quality Division (AQD) in the format prescribed by the applicable reference test method within 60 days following the last date of the test. **(R 336.2001(5))**

## Monitoring/Recordkeeping

1. Records of any periodic emission or parametric monitoring required in this ROP shall include the following information specified in Rule 213(3)(b)(i), where appropriate. **(R 336.1213(3)(b))**
   1. The date, location, time, and method of sampling or measurements.
   2. The dates the analyses of the samples were performed.
   3. The company or entity that performed the analyses of the samples.
   4. The analytical techniques or methods used.
   5. The results of the analyses.
   6. The related process operating conditions or parameters that existed at the time of sampling or measurement.
2. All required monitoring data, support information and all reports, including reports of all instances of deviation from permit requirements, shall be kept and furnished to the department upon request for a period of not less than 5 years from the date of the monitoring sample, measurement, report or application. Support information includes all calibration and maintenance records and all original strip-chart recordings, or other original data records, for continuous monitoring instrumentation and copies of all reports required by the ROP. **(R 336.1213(1)(e), R 336.1213(3)(b)(ii))**

## Certification & Reporting

1. Except for the alternate certification schedule provided in Rule 213(3)(c)(iii)(B), any document required to be submitted to the department as a term or condition of this ROP shall contain an original certification by a Responsible Official which state that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete. **(R 336.1213(3)(c))**
2. A Responsible Official shall certify to the appropriate AQD District Office and to the USEPA that the stationary source is and has been in compliance with all terms and conditions contained in the ROP except for deviations that have been or are being reported to the appropriate AQD District Office pursuant to Rule 213(3)(c). This certification shall include all the information specified in Rule 213(4)(c)(i) through (v) and shall state that, based on information and belief formed after reasonable inquiry, the statements and information in the certification are true, accurate, and complete. The USEPA address is: USEPA, Air Compliance Data - Michigan, Air and Radiation Division, 77 West Jackson Boulevard, Chicago, Illinois 60604-3507. **(R 336.1213(4)(c))**
3. The certification of compliance shall be submitted annually for the term of this ROP as detailed in the special conditions, or more frequently if specified in an applicable requirement or in this ROP. **(R 336.1213(4)(c))**
4. The permittee shall promptly report any deviations from ROP requirements and certify the reports. The prompt reporting of deviations from ROP requirements is defined in Rule 213(3)(c)(ii) as follows, unless otherwise described in this ROP. **(R 336.1213(3)(c))**
   1. For deviations that exceed the emissions allowed under the ROP, prompt reporting means reporting consistent with the requirements of Rule 912 as detailed in Condition 25. All reports submitted pursuant to this paragraph shall be promptly certified as specified in Rule 213(3)(c)(iii).
   2. For deviations which exceed the emissions allowed under the ROP and which are not reported pursuant to Rule 912 due to the duration of the deviation, prompt reporting means the reporting of all deviations in the semiannual reports required by Rule 213(3)(c)(i). The report shall describe reasons for each deviation and the actions taken to minimize or correct each deviation.
   3. For deviations that do not exceed the emissions allowed under the ROP, prompt reporting means the reporting of all deviations in the semiannual reports required by Rule 213(3)(c)(i). The report shall describe the reasons for each deviation and the actions taken to minimize or correct each deviation.
5. For reports required pursuant to Rule 213(3)(c)(ii), prompt certification of the reports is described in Rule 213(3)(c)(iii) as either of the following: **(R 336.1213(3)(c))**
   1. Submitting a certification by a Responsible Official with each report which states that, based on information and belief formed after reasonable inquiry, the statements and information in the report are true, accurate, and complete.
   2. Submitting, within 30 days following the end of a calendar month during which one or more prompt reports of deviations from the emissions allowed under the ROP were submitted to the department pursuant to Rule 213(3)(c)(ii), a certification by a Responsible Official which states that; “based on information and belief formed after reasonable inquiry, the statements and information contained in each of the reports submitted during the previous month were true, accurate, and complete.” The certification shall include a listing of the reports that are being certified. Any report submitted pursuant to Rule 213(3)(c)(ii) that will be certified on a monthly basis pursuant to this paragraph shall include a statement that certification of the report will be provided within 30 days following the end of the calendar month.
6. Semiannually for the term of the ROP as detailed in the special conditions, or more frequently if specified, the permittee shall submit certified reports of any required monitoring to the appropriate AQD District Office. All instances of deviations from ROP requirements during the reporting period shall be clearly identified in the reports. **(R 336.1213(3)(c)(i))**
7. On an annual basis, the permittee shall report the actual emissions, or the information necessary to determine the actual emissions, of each regulated air pollutant as defined in Rule 212(6) for each emission unit utilizing the emissions inventory forms provided by the department. **(R 336.1212(6))**
8. The permittee shall provide notice of an abnormal condition, start-up, shutdown, or malfunction that results in emissions of a hazardous or toxic air pollutant which continue for more than one hour in excess of any applicable standard or limitation, or emissions of any air contaminant continuing for more than two hours in excess of an applicable standard or limitation, as required in Rule 912, to the appropriate AQD District Office. The notice shall be provided not later than two business days after the start-up, shutdown, or discovery of the abnormal conditions or malfunction. Notice shall be by any reasonable means, including electronic, telephonic, or oral communication. Written reports, if required under Rule 912, must be submitted to the appropriate AQD District Supervisor within 10 days after the start-up or shutdown occurred, within 10 days after the abnormal conditions or malfunction has been corrected, or within 30 days of discovery of the abnormal conditions or malfunction, whichever is first. The written reports shall include all of the information required in Rule 912(5) and shall be certified by a Responsible Official in a manner consistent with the CAA.2 **(R 336.1912)**

## Permit Shield

1. Compliance with the conditions of the ROP shall be considered compliance with any applicable requirements as of the date of ROP issuance if either of the following provisions is satisfied. **(R 336.1213(6)(a)(i), R 336.1213(6)(a)(ii))**
   1. The applicable requirements are included and are specifically identified in the ROP.
   2. The permit includes a determination or concise summary of the determination by the department that other specifically identified requirements are not applicable to the stationary source.

Any requirements identified in Part E of this ROP have been identified as non-applicable to this ROP and are included in the permit shield.

1. Nothing in this ROP shall alter or affect any of the following:
   1. The provisions of Section 303 of the CAA, emergency orders, including the authority of the USEPA under Section 303 of the CAA. **(R 336.1213(6)(b)(i))**
   2. The liability of the owner or operator of this source for any violation of applicable requirements prior to or at the time of this ROP issuance. **(R 336.1213(6)(b)(ii))**
   3. The applicable requirements of the acid rain program, consistent with Section 408(a) of the CAA. **(R 336.1213(6)(b)(iii))**
   4. The ability of the USEPA to obtain information from a source pursuant to Section 114 of the CAA. **(R 336.1213(6)(b)(iv))**
2. The permit shield shall not apply to provisions incorporated into this ROP through procedures for any of the following:
   1. Operational flexibility changes made pursuant to Rule 215. **(R 336.1215(5))**
   2. Administrative Amendments made pursuant to Rule 216(1)(a)(i)-(iv). **(R 336.1216(1)(b)(iii))**
   3. Administrative Amendments made pursuant to Rule 216(1)(a)(v) until the amendment has been approved by the department. **(R 336.1216(1)(c)(iii))**
   4. Minor Permit Modifications made pursuant to Rule 216(2). **(R 336.1216(2)(f))**
   5. State-Only Modifications made pursuant to Rule 216(4) until the changes have been approved by the department. **(R 336.1216(4)(e))**
3. Expiration of this ROP results in the loss of the permit shield. If a timely and administratively complete application for renewal is submitted not more than 18 months, but not less than 6 months, before the expiration date of the ROP, but the department fails to take final action before the end of the ROP term, the existing ROP does not expire until the renewal is issued or denied, and the permit shield shall extend beyond the original ROP term until the department takes final action. **(R 336.1217(1)(c), R 336.1217(1)(a))**

## Revisions

1. For changes to any process or process equipment covered by this ROP that do not require a revision of the ROP pursuant to Rule 216, the permittee must comply with Rule 215. **(R 336.1215, R 336.1216)**
2. A change in ownership or operational control of a stationary source covered by this ROP shall be made pursuant to Rule 216(1). **(R 336.1219(2))**
3. For revisions to this ROP, an administratively complete application shall be considered timely if it is received by the department in accordance with the time frames specified in Rule 216. **(R 336.1210(10))**
4. Pursuant to Rule 216(1)(b)(iii), Rule 216(2)(d) and Rule 216(4)(d), after a change has been made, and until the department takes final action, the permittee shall comply with both the applicable requirements governing the change and the ROP terms and conditions proposed in the application for the modification. During this time period, the permittee may choose to not comply with the existing ROP terms and conditions that the application seeks to change. However, if the permittee fails to comply with the ROP terms and conditions proposed in the application during this time period, the terms and conditions in the ROP are enforceable. **(R 336.1216(1)(c)(iii), R 336.1216(2)(d), R 336.1216(4)(d))**

## Reopenings

1. A ROP shall be reopened by the department prior to the expiration date and revised by the department under any of the following circumstances:
   1. If additional requirements become applicable to this stationary source with three or more years remaining in the term of the ROP, but not if the effective date of the new applicable requirement is later than the ROP expiration date. **(R 336.1217(2)(a)(i))**
   2. If additional requirements pursuant to Title IV of the CAA become applicable to this stationary source. **(R 336.1217(2)(a)(ii))**
   3. If the department determines that the ROP contains a material mistake, information required by any applicable requirement was omitted, or inaccurate statements were made in establishing emission limits or the terms or conditions of the ROP. **(R 336.1217(2)(a)(iii))**
   4. If the department determines that the ROP must be revised to ensure compliance with the applicable requirements. **(R 336.1217(2)(a)(iv))**

## Renewals

1. For renewal of this ROP, an administratively complete application shall be considered timely if it is received by the department not more than 18 months, but not less than 6 months, before the expiration date of the ROP. **(R 336.1210(9))**

## Stratospheric Ozone Protection

1. If the permittee is subject to Title 40 of the Code of Federal Regulations (CFR), Part 82 and services, maintains, or repairs appliances except for motor vehicle air conditioners (MVAC), or disposes of appliances containing refrigerant, including MVAC and small appliances, or if the permittee is a refrigerant reclaimer, appliance owner or a manufacturer of appliances or recycling and recovery equipment, the permittee shall comply with all applicable standards for recycling and emissions reduction pursuant to 40 CFR Part 82, Subpart F.
2. If the permittee is subject to 40 CFR Part 82 and performs a service on motor (fleet) vehicles when this service involves refrigerant in the MVAC, the permittee is subject to all the applicable requirements as specified in 40 CFR Part 82, Subpart B, Servicing of Motor Vehicle Air Conditioners. The term “motor vehicle” as used in Subpart B does not include a vehicle in which final assembly of the vehicle has not been completed by the original equipment manufacturer. The term MVAC as used in Subpart B does not include the air-tight sealed refrigeration system used for refrigerated cargo or an air conditioning system on passenger buses using Hydrochlorofluorocarbon-22 refrigerant.

## Risk Management Plan

1. If subject to Section 112(r) of the CAA and 40 CFR Part 68, the permittee shall register and submit to the USEPA the required data related to the risk management plan for reducing the probability of accidental releases of any regulated substances listed pursuant to Section 112(r)(3) of the CAA as amended in 40 CFR 68.130. The list of substances, threshold quantities, and accident prevention regulations promulgated under 40 CFR Part 68, do not limit in any way the general duty provisions under Section 112(r)(1).
2. If subject to Section 112(r) of the CAA and 40 CFR Part 68, the permittee shall comply with the requirements of 40 CFR Part 68, no later than the latest of the following dates as provided in 40 CFR 68.10(a):
   1. June 21, 1999,
   2. Three years after the date on which a regulated substance is first listed under 40 CFR 68.130, or
   3. The date on which a regulated substance is first present above a threshold quantity in a process.
3. If subject to Section 112(r) of the CAA and 40 CFR Part 68, the permittee shall submit any additional relevant information requested by any regulatory agency necessary to ensure compliance with the requirements of 40 CFR Part 68.
4. If subject to Section 112(r) of the CAA and 40 CFR Part 68, the permittee shall annually certify compliance with all applicable requirements of Section 112(r) as detailed in Rule 213(4)(c)). **(40 CFR Part 68)**

## Emission Trading

1. Emission averaging and emission reduction credit trading are allowed pursuant to any applicable interstate or regional emission trading program that has been approved by the Administrator of the USEPA as a part of Michigan’s State Implementation Plan. Such activities must comply with Rule 215 and Rule 216. **(R 336.1213(12))**

## Permit to Install (PTI)

1. The process or process equipment included in this permit shall not be reconstructed, relocated, or modified unless a PTI authorizing such action is issued by the department, except to the extent such action is exempt from the PTI requirements by any applicable rule.2 **(R 336.1201(1))**
2. The department may, after notice and opportunity for a hearing, revoke PTI terms or conditions if evidence indicates the process or process equipment is not performing in accordance with the terms and conditions of the PTI or is violating the department’s rules or the CAA.2 **(R 336.1201(8), Section 5510 of Act 451)**
3. The terms and conditions of a PTI shall apply to any person or legal entity that now or hereafter owns or operates the process or process equipment at the location authorized by the PTI. If a new owner or operator submits a written request to the department pursuant to Rule 219 and the department approves the request, this PTI will be amended to reflect the change of ownership or operational control. The request must include all of the information required by Subrules (1)(a), (b) and (c) of Rule 219. The written request shall be sent to the appropriate AQD District Supervisor, EGLE.2**(R 336.1219)**
4. If the installation, reconstruction, relocation, or modification of the equipment for which PTI terms and conditions have been approved has not commenced within 18 months of the original PTI issuance date, or has been interrupted for 18 months, the applicable terms and conditions from that PTI, as incorporated into the ROP, shall become void unless otherwise authorized by the department. Furthermore, the person to whom that PTI was issued, or the designated authorized agent, shall notify the department via the Supervisor, Permit Section, EGLE, AQD, P. O. Box 30260, Lansing, Michigan 48909, if it is decided not to pursue the installation, reconstruction, relocation, or modification of the equipment allowed by the terms and conditions from that PTI.2 **(R 336.1201(4))**

**Footnotes:**

1This condition is state-only enforceable and was established pursuant to Rule 201(1)(b).

2This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

# B. SOURCE-WIDE CONDITIONS

Part B outlines the Source-Wide Terms and Conditions that apply to this stationary source. The permittee is subject to these special conditions for the stationary source in addition to the general conditions in Part A and any other terms and conditions contained in this ROP.

The permittee shall comply with all specific details in the special conditions and the underlying applicable requirements cited. If a specific condition type does not apply to this source, NA (not applicable) has been used in the table. If there are no Source-Wide Conditions, this section will be left blank.

# C. EMISSION UNIT CONDITIONS

Part C outlines terms and conditions that are specific to individual emission units listed in the Emission Unit Summary Table. The permittee is subject to the special conditions for each emission unit in addition to the General Conditions in Part A and any other terms and conditions contained in this ROP.

The permittee shall comply with all specific details in the special conditions and the underlying applicable requirements cited. If a specific condition type does not apply, NA (not applicable) has been used in the table. If there are no conditions specific to individual emission units, this section will be left blank.

## EMISSION UNIT SUMMARY TABLE

The descriptions provided below are for informational purposes and do not constitute enforceable conditions.

| **Emission Unit ID** | **Emission Unit Description**  **(Including Process Equipment & Control Device(s))** | **Installation**  **Date/**  **Modification Date** | **Flexible Group ID** |
| --- | --- | --- | --- |
| EU-BURNOFF OVEN | A heat cleaning oven primarily used to heat clean paint racks and associated fixtures. This process cleans the tooling associated with the finishing operation, occasionally it is also filled with dry paint filters for disposal. | 02-27-1992/  02-27-1992 | NA |
| EU-LN1 | A plastic parts (except business machine plastic parts) and metal parts (clear coatings and extreme performance coatings) coating line consisting of holding devices for up to 6 spray guns per booth, 5 dry filter spray booths,  3 mask washers, 1 power washer, 1 dry off oven, 1 bake-off oven, and application equipment with HVLP and electrostatic technology, or equivalent technology. Conventional air atomized spray gun may be used for the final coat of metallic base coat on any part. | 01-01-1985/  11-26-1996 | FG-COATING,  FG-MACT MMMM,  FG-MACT PPPP |
| EU-LN2 | A plastic parts (except business machine plastic parts) and metal parts (clear coatings and extreme performance coatings) coating line consisting of holding devices for up to 6 spray guns per booth, 4 dry filter spray booths,  3 mask washers, 1 power washer, 1 dry-off oven, 1 bake-off oven, and application equipment with HVLP and electrostatic technology, or equivalent technology. Conventional air atomized spray gun may be used for the final coat of metallic base coat on any part. | 01-01-1985/  11-26-1996 | FG-COATING,  FG-MACT MMMM,  FG-MACT PPPP |
| EU-LN3 | A plastic parts (except business machine plastic parts) and metal parts (clear coatings and extreme performance coatings) coating line consisting of holding devices for up to 6 applicators per booth, 7 dry filter spray booths,  6 mask washers, 1 prime bake oven,  1 base coat oven (infrared), 1 main bake-off oven (zone 1 and 2), and application equipment with 6 robotic applicators / reciprocators, or equivalent technology. Conventional air atomized spray gun may be used for the final coat of metallic base coat on any part. A carbon concentrator (CC) and regenerative thermal oxidizer (RTO) control system is used to control VOC emissions from the EU-LN3 basecoat booths. Dry filters are used for particulate control. | 01-01-1989/  04-18-1995 | FG-COATING  FG-MACT MMMM  FG-MACT PPPP |
| EU-LN4 | Side-line booth and oven with dry filters and one curing oven. | 01-01-1989/  04-18-1995 | FG-COATING  FG-MACT MMMM  FG-MACT PPPP |
| EU-LN5 | Spray coating process equipment includes spray booth for plastic and metal parts, two coating applicators, natural gas fired heater, and the use of acetone for purge and cleanup activities. | 02-23-2018 | FG-MACT MMMM  FG-MACT PPPP |
| EU-COLDCLEANERS | Mask washers for line numbers 1, 2, 3, and 4. | 01-01-1989 | FG-COLDCLEANERS |
| EU-LN2&3 | Consists of the combination of EU-LN2 and EU-LN3 to be used as an alternative equipment configuration as a single coating line rather than two separate coating lines. Metal parts coating: primer on EU-LN2 with basecoat, clearcoat and curing on EU-LN3. A carbon concentrator (CC) and regenerative thermal oxidizer (RTO) control system is used to control VOC emissions from the EU-LN3 basecoat booths. Dry filters are used for particulate control. | N/A | FG-COATING  FG-MACT MMMM  FG-MACT PPPP |
| EU-BOILER 1 | A 2.499 MMbtu/hr natural gas fired boiler. | 01-01-1985 | FG-BOILER MACT |
| EU-BOILER 2 | A 2.499 MMbtu/hr natural gas fired boiler. | 01-01-1985 | FG-BOILER MACT |
| EU-SOLVDISTUNIT1 | Solvent distillation unit – can produce up to 60 liters of clean solvent per hour (15.85 gallons/hr). This unit has a 60-gallon capacity. All process emissions are vented to the in-plant environment. | 03-13-2014 | NA |

## EU-BURNOFFOVEN

**EMISSION UNIT CONDITIONS**

**DESCRIPTION**

A heat cleaning oven primarily used to heat clean paint racks and associated fixtures. This process cleans the tooling associated with the finishing operation, occasionally it is also filled with dry paint filters for disposal.

**Flexible Group ID:** NA

**POLLUTION CONTROL EQUIPMENT**

Natural gas fired afterburner

**I. EMISSION LIMIT(S)**

NA

**II. MATERIAL LIMIT(S)**

NA

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

1. The permittee shall not operate the heat cleaning oven unless the afterburner is installed and operating properly at a minimum temperature of 1350 ºF.2 **(R 336.1201(3))**

**IV. DESIGN/EQUIPMENT PARAMETER(S)**

NA

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

NA

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The temperature of the afterburner shall be monitored and recorded on a continuous basis.2 **(R 336.1201(3))**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

| **Stack & Vent ID** | **Maximum Exhaust Diameter / Dimensions**  **(inches)** | **Minimum Height Above Ground**  **(feet)** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- |
| 1. BURNOFFINC | 251 | 38 | **R 336.1901** |

**IX. OTHER REQUIREMENT(S)**

NA

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

## EU-LN1

**EMISSION UNIT CONDITIONS**

**DESCRIPTION**

A plastic parts (except business machine plastic parts) and metal parts (clear coatings and extreme performance coatings) coating line consisting of holding devices for up to 6 spray guns per booth, 5 dry filter spray booths, 3 mask washers, 1 power washer, 1 dry off oven, 1 bake-off oven, and application equipment with HVLP and electrostatic technology, or equivalent technology. Conventional air atomized spray gun may be used for the final coat of metallic base coat on any part.

**Flexible Group ID:** FG-COATING, FG-MMMM, FG-PPPP

**POLLUTION CONTROL EQUIPMENT**

Dry filters for paint particulate control.

**I. EMISSION LIMIT(S)**

| **Pollutant** | **Limit** | **Time Period/Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. VOC | 2,194 pounds/day2 | Calendar day | EU LN1 | SC VI.1.  SC VI.2  SC VI.3. | **R 336.1205**  **R 336.1224**  **R 336.1225** |
| 1. VOC | 105.0 tpy2 | 12-month rolling time period as determined at the end of each calendar month | EU LN1 | SC VI.1.  SC VI.2  SC VI.3. | **R 336.1205**  **R 336.1224**  **R 336.1225**  **R 336.1702(d) 40 CFR 52.21** |

**II. MATERIAL LIMIT(S)**

See FG-COATING2 **(R 336.1702(a))**

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

1. The permittee shall not operate any coating spray booth unless its associated exhaust filters are in place, maintained and operating properly.2 **(R 336.1301, R 336.1331, R 336.1910)**

2. The permittee shall not operate any booth on EU-LN1 unless the electrostatic or high volume low pressure (HVLP) application equipment (where “HVLP” means a spray gun operating at a pressure of less than or equal to   
10 pounds per square inch gauge) for that booth is installed and operating properly.2 **(R 336.1702(a))**

3. All purge solvents and coatings from all applicators shall be captured and stored in closed containers.2 **(R 336.1702(a))**

**IV. DESIGN/EQUIPMENT PARAMETERS**

* 1. The electrostatic application equipment shall be equipped and maintained with a device to trigger visual and audible alarms if the electric current is shut off.2 **(R 336.1201(3))**

2. The permittee may use a conventional air atomized spray gun for application of the final coat of metallic base coat on any part.2 **(R 336.1702(a))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The VOC content of any coating, minus water, as applied.2 **(R 336.1702, 40 CFR 52.21)**
2. The VOC content of any coating, minus water, as applied, shall be determined using federal Reference Test Method 24 or other EPA approved reference method. Alternatively, for waterborne coatings, the VOC content may be determined from formulation data, and for non-waterborne coatings, the VOC content may be determined from formulation data upon written approval from the AQD District Supervisor. If the Method 24 and formulation values should differ, then the Method 24 results shall be used to determine compliance.2 **(R 336.1702, 40 CFR** **52.21)**
3. The five most frequently used coatings and five other random coatings shall be tested at least once during each calendar year to verify VOC content using federal Test Method 24.2 **(R 336.1702, 40 CFR 52.21)**

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall keep records of the following:

a. VOC emissions calculated on a daily basis.2 **(R 336.1205, R 336.1224, R 336.1225)**

b. VOC emissions on a 12-month rolling time period as determined at the end of each calendar month.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(d), 40 CFR 52.21)**

c. The VOC content of each coating in pounds per gallon, minus water, as applied.2 **(R 336.1702(a), R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.212)**

1. The permittee shall keep records of the following:

a. The starting and ending dates for each production run. A production run is defined as the coating of one substrate type, metal or plastic, without interruption by the other substrate type.2 **(R 336.1702(d),** **R 336.1702(a))**

b. The type of part coated, metal or plastic, during each production run.2 **(R 336.1702(d), R 336.1702(a))**

c. For each production run:2

i. The identity of each coating and reducer.

ii. The coating category to which each coating belongs. Coating category shall correspond to the coating categories listed in FG-COATING, SC I.1 through SC I.14 for each coating used.

iii. The quantity of each coating and reducer in gallons.

iv. The VOC content in pounds VOC per gallon, minus water.

v. The VOC content in pounds VOC per gallon with water.

vi. The mixing ratio of each component of each coating. **(R 336.1225, R 336.1702(d), R 336.1702(a))**

1. The identity, quantity, and VOC content of each purge and cleanup solvent used each calendar day.2

**(R 336.1702(a))**

e. For each coating category, the calendar day volume weighted average of the VOC content of all coatings in the category in pounds of VOC per gallon of coating, minus water, as applied.2 **(R 336.1702(d))**

3. The permittee shall maintain a current listing of the chemical composition of each coating and adhesion promoter, including the weight percent of each compound.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(d), 40 CFR 52.21)**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

4. Quarterly reporting of the VOC emission records described in Part VI.1 and 2 above. Reports are due 30 days after the end of each calendar quarter.2 **(R 336.1702, 40 CFR 52.21)**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

| **Stack & Vent ID** | **Maximum Exhaust Diameter / Dimensions**  **(inches)** | **Minimum Height**  **Above Ground**  **(feet)** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- |
| 1. SV-LN1-BOOTH1 | 342 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN1-BOOTH2 | 342 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN1-BOOTH3 | 342 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN1-BOOTH4 | 342 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN1-BOOTH5 | 342 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN1-DRYOVEN | 92 | 37.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN1-BAKEOVEN | 92 | 37.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |

**IX. OTHER REQUIREMENT(S)**

NA

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

## EU-LN2

**EMISSION UNIT CONDITIONS**

**DESCRIPTION**

A plastic parts (except business machine plastic parts) and metal parts (clear coatings and extreme performance coatings) coating line consisting of holding devices for up to 6 spray guns per booth, 4 dry filter spray booths, 3 mask washers, 1 power washer, 1 dry-off oven, 1 bake-off oven, and application equipment with HVLP and electrostatic technology, or equivalent technology. Conventional air atomized spray gun may be used for the final coat of metallic base coat on any part.

**Flexible Group ID:** FG-COATING, FG-MMMM, FG-PPPP

**POLLUTION CONTROL EQUIPMENT**

Dry filters for paint particulate control.

**I. EMISSION LIMIT(S)**

| **Pollutant** | **Limit** | **Time Period/Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. VOC | 1,462 pounds/day2 | Calendar day | EU-LN2 | SC VI.1.  SC VI.2  SC VI.3. | **R 336.1205**  **R 336.1224**  **R 336.1225** |
| 1. VOC | 67.7  tpy2 | 12-month rolling time period as determined at the end of each calendar month | EU-LN2 | SC VI.1.  SC VI.2  SC VI.3. | **R 336.1205**  **R 336.1224**  **R 336.1225**  **R 336.1702(d) 40 CFR 52.21** |

**II. MATERIAL LIMIT(S)**

See FG-COATING2 **(R 336.1702(a))**

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

1. The permittee shall not operate any coating spray booth unless its associated exhaust filters are in place, maintained and operating properly.2 **(R 336.1301, R 336.1331, R 336.1910)**

2. The permittee shall not operate any booth on EU-LN2 unless the electrostatic or high volume low pressure (HVLP) application equipment (where “HVLP” means a spray gun operating at a pressure of less than or equal to 10 pounds per square inch gauge) for that booth is installed and operating properly.2 **(R 336.1702(a))**

3. All purge solvents and coatings from all applicators shall be captured and stored in closed containers.2 **(R 336.1702(a))**

4. When EU-LN2 is operating as part of EU-LN2&3, all emissions from EU-LN2 shall be counted as being emitted from EU-LN2&3.2 **(R 336.1702(a), 40 CFR 52.21(j))**

**IV. DESIGN/EQUIPMENT PARAMETER(S)**

1. The electrostatic application equipment shall be equipped and maintained with a device to trigger visual and audible alarms if the electric current is shut off.2 **(R 336.1201(3))**

2. The permittee may use a conventional air atomized spray gun for application of the final coat of metallic base coat on any part.2 **(R 336.1702(a))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The VOC content of any coating, minus water, as applied.2 **(R 336.1702(a), R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.21)**

1. The VOC content of any coating, minus water, as applied, shall be determined using federal Reference Test Method 24 or other EPA approved reference method. Alternatively, for waterborne coatings, the VOC content may be determined from formulation data, and for non-waterborne coatings, the VOC content may be determined from formulation data upon written approval from the AQD District Supervisor. If the Method 24 and formulation values should differ, then the Method 24 results shall be used to determine compliance.2. **(R 336.1702, 40 CFR 52.21)**

3. The five most frequently used coatings and five other random coatings shall be tested at least once during each calendar year to verify VOC content using USEPA Test Method 24.2 **(R 336.1702, 40 CFR 52.21)**

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall keep records of the following:

a. VOC emissions calculated on a daily basis.2 **(R 336.1205, R 336.1224, R 336.1225)**

b. VOC emissions on a 12-month rolling time period as determined at the end of each calendar month.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(d), 40 CFR 52.21)**

c. The VOC content of each coating in pounds per gallon, minus water, as applied.2 **(R 336.1702(a), R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.212)**

1. The permittee shall keep records of the following:

a. The starting and ending dates for each production run. A production run is defined as the coating of one substrate type, metal or plastic, without interruption by the other substrate type.2 **(R 336.1702(d),** **R 336.1702(a))**

b. The type of part coated, metal or plastic, during each production run.2 **(R 336.1702(d), R 336.1702(a))**

c. For each production run:2

i. The identity of each coating and reducer.

ii. The coating category to which each coating belongs. Coating category shall correspond to the coating categories listed in FG-COATING, SC I.1 through SC I.14 for each coating used.

iii. The quantity of each coating and reducer in gallons.

iv. The VOC content in pounds VOC per gallon, minus water.

v. The VOC content in pounds VOC per gallon with water.

vi. The mixing ratio of each component of each coating. **(R 336.1225, R 336.1702(d), R 336.1702(a))**

1. The identity, quantity, and VOC content of each purge and cleanup solvent used each calendar day.2   
   **(R 336.1702(a))**

e. For each coating category, the calendar day volume weighted average of the VOC content of all coatings in the category in pounds of VOC per gallon of coating, minus water, as applied.2 **(R 336.1702(d))**

3. The permittee shall maintain a current listing of the chemical composition of each coating and adhesion promoter, including the weight percent of each compound.2. **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(d),   
40 CFR 52.21)**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

4. Quarterly reporting of the VOC emission records described in SC VI.1 and 2 above. Reports are due 30 days after the end of each calendar quarter.2 **(R 336.1702, 40 CFR 52.21)**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

| **Stack & Vent ID** | **Maximum Exhaust Diameter / Dimensions**  **(inches)** | **Minimum Height**  **Above Ground**  **(feet)** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- |
| 1. EU-LN2-BOOTH1 | 342 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. EU-LN2-BOOTH2 | 342 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. EU-LN2-BOOTH3 | 342 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. EU-LN2-BOOTH4 | 342 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. EU-LN2-DRYOVEN | 92 | 37.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN2-BAKEOVEN | 92 | 37.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |

**IX. OTHER REQUIREMENT(S)**

NA

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

## EU-LN3

**EMISSION UNIT CONDITIONS**

**DESCRIPTION**

A plastic parts (except business machine plastic parts) and metal parts (clear coatings and extreme performance coatings) coating line consisting of holding devices for up to 6 applicators per booth, 7 dry filter spray booths, 6 mask washers, 1 prime bake oven, 1 base coat oven (infrared), 1 main bake-off oven (zone 1 and 2), and application equipment with 6 robotic applicators / reciprocators, or equivalent technology. Conventional air atomized spray gun may be used for the final coat of metallic base coat on any part.

**Flexible Group ID:** FG-COATING, FG-MMMM, FG-PPPP

**POLLUTION CONTROL EQUIPMENT**

1. A carbon concentrator (CC) and regenerative thermal oxidizer (RTO) control system is used to control VOC emissions from the EU-LN3 basecoat booths.
2. Dry filters for paint particulate control.

**I. EMISSION LIMIT(S)**

| **Pollutant** | **Limit** | **Time Period/Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. VOC | 1,668 pounds/day2 | Calendar day for  EU-LN3 and EU-LN2&3 combined | EU-LN3  or  Combined equipment from  EU-LN2 and EU-LN3 operated as a single partially controlled coating line. | SC VI.1.  SC VI.2  SC VI.3  SC VI.7  SC VI.8  SC V.2. | **R 336.1205**  **R 336.1224**  **R 336.1225** |
| 1. VOC | 137.7 tpy2 | 12-month rolling time period as determined at the end of each calendar month for EU-LN3 and EU-LN2&3 combined | EU-LN3  or  Combined equipment from  EU-LN2 and EU-LN3 operated as a single partially controlled coating line. | SC VI.1.  SC VI.2  SC VI.3  SC VI.7  SC VI.8  SC V.2. | **R 336.1205**  **R 336.1224**  **R 336.1225**  **R 336.1702(d)**  **40 CFR 52.21 Subparts**  **(j) & (x)** |
| 1. VOC and Acetone | 157.7 tpy2 | Calendar day per 12-month rolling time period as determined at the end of each calendar month for EU-LN3 and  EU-LN2&3 combined | EU-LN3 | SC VI.1.  SC VI.2  SC VI.3  SC VI.7  SC VI.8  SC V.2. | **R 336.1205**  **R 336.1224**  **R 336.1225**  **R 336.1702(d),**  **40 CFR 52.21 Subparts (j) & (x)** |

**II. MATERIAL LIMIT(S)**

See FG-COATING2 **(R 336.1702(a))**

**III. PROCESS/OPERATIONAL RESTRICTIONS**

1. The permittee shall not operate any paint spray booth unless all exhaust filters are in place, maintained, and operating properly.2 **(R 336.1213(3), R 336.1301, R 336.1331, R 336.1901, R 336.1910, and 40 CFR 64.6(c)(1)(i & ii))**

2. The permittee shall not operate basecoat booths portion of EU-LN3 unless the oxidizer control system is in place and operating properly. Proper operation is defined as maintaining a minimum temperature in the oxidizer section of the control system of 1400 degrees Fahrenheit and maintaining a minimum retention time of 0.5 seconds.2 **(R 336.1213(3), R 336.1224, R 336.1225, R 336.1702(a), R 336.1910, 40 CFR 64.6(c)(1)(i & ii), and 40 CFR 52.21(j) and (x))**

3.The permittee shall not operate basecoat booths portion of EU-LN3 unless the carbon concentrator control system is in place and operating properly. Proper operation is defined as maintaining a minimum desorption gas inlet temperature no more than 15 degrees Fahrenheit below the average desorption gas inlet temperature determined during the most recent acceptable performance test value. The minimum temperature requirement may be based on a 3 hour average.2 **(R 336.1213(3), R 336.1224, R 336.1225, R 336.1702(a), R 336.1910, 40 CFR 64.6(c)(1)(i & ii), and 40 CFR 52.21(j) and (x))**

1. All waste materials shall be captured and stored in closed containers and be disposed of in an acceptable manner in compliance with all-applicable rules and regulations.2 **(R 336.1205, R 336.1225, R 336.1702(a), 40 CFR 52.21(j))**
2. All purge solvents and coatings from all applicators shall be captured and stored in closed containers 2. **(R 336.1702(a))**
3. When EU-LN3 is operating as part of EU-LN2&3, all emissions from EU-LN3 shall be counted as being emitted from EU-LN2&3.2 **(R 336.1702(a), 40 CFR 52.21(j) and (x))**

**IV. DESIGN/EQUIPMENT PARAMETERS**

1. The permittee shall equip and maintain all booths with High Volume Low Pressure (HVLP) guns or equivalent technology with comparable transfer efficiency.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(a), R 336.1910, 40 CFR 52.21(j))**

1. The permittee may use a conventional air atomized spray gun for application of the final coat of metallic base coat on any part.2 **(R 336.1702(a))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The VOC content of any coating, minus water, as applied, shall be determined using federal Reference Test Method 24 or other USEPA approved reference method. Alternatively, for waterborne coatings, the VOC content may be determined from formulation data, and for non-waterborne coatings, the VOC content may be determined from formulation data upon written approval from the AQD District Supervisor. If the Method 24 and formulation values should differ, then the Method 24 results shall be used to determine compliance.2 **(R 336.1702, 40 CFR 52.21)**

2. At least once every five years, or within 180 days of issuance of this permit, whichever is the latter, unless the permittee maintains a yearly demonstration that the most recent acceptable test remains valid and representative, the permittee shall verify the capture efficiency and the removal/destruction efficiency of the control equipment portions of EU-LN3, by testing at owner's expense, in accordance with Department requirements, 40 CFR Part 60 Appendix A or other EGLE approved method. During the test, the permittee shall simultaneously collect desorption gas inlet temperature data from the carbon concentrator control and determine an average operational value. No less than 30 days prior to testing, the permittee shall submit a complete test plan to the AQD. The applicant must receive AQD approval of the final plan prior to testing. Verification of emission limits includes the submittal of a complete report of the test results to the AQD within 60 days following the last date of the test. **(R 336.2001(1)(e), R 336. 2001(4), R 336.1213(3))**

3. The five most frequently used coatings and five other random coatings shall be tested at least once during each calendar year to verify VOC content using federal Test Method 24.2 **(R 336.1702(a))**

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The temperature of the thermal incinerator near the combustion chamber outlet shall be monitored and recorded on a continuous basis in a manner and with instrumentation and at a location acceptable to the District Supervisor, Air Quality Division.2 **(R 336.1205, R 336.12242, R 336.12252, R 336.1702(a), R 336.1910, 40 CFR 64.6(c)(1)(i & ii), and 40 CFR 52.21(j) and (x))**
2. The permittee shall install, calibrate, maintain, and operate, in a satisfactory manner, a temperature monitoring device in the concentrator to monitor and record the desorption gas inlet temperature, on a continuous basis during operation. Desorption gas inlet temperature data recording shall consist of measurements made at equally spaced intervals at least once every 15 minutes. **(40 CFR 64.6(c)(1)(i & ii))**
3. For each control device in operation during production (e.g., coating of parts), the permittee shall conduct bypass monitoring for each bypass line such that the valve or closure method cannot be opened without creating an alarm condition for which a record shall be made. Records of the bypass line(s) that was open and the length of time the bypass was open shall be kept on file. **(40 CFR 64.3(a)(2))**
4. The permittee shall install, calibrate, maintain and operate, in a satisfactory manner, a pressure drop monitoring device in the concentrator to monitor and record the pressure drop in inches of water column, on a continuous basis during operation. Pressure drop data recordings shall be at least once every 15 minutes. **(R 336.1213(3), 40 CFR 64.6(c)(1)(i&ii))**
5. The permittee shall install, calibrate, maintain and operate, in a satisfactory manner, a pressure monitoring device in the regenerative thermal oxidizer to monitor and record the pressure drop on a continuous basis during operation. Pressure drop data recordings shall be at least once every 15 minutes**.** **(40 CFR 64.6(c)(1)(i&ii))**
6. The permittee shall develop, maintain, and implement an Operation and Maintenance (O&M) Plan for EU-LN3. The CAM O&M plan shall be updated as necessary to reflect changes in monitoring, to implement corrective actions and to address malfunctions. Changes to the CAM portion of the O&M Plan shall be submitted to the District Supervisor for review and approval. All records and activities associated with the O&M Plan shall be kept on file for a period of at least 5 years and made available to the Department upon request. At a minimum, the O&M Plan shall include a record of maintenance inspections which include the dates, results of the inspections and the dates and reasons for repairs if made. The following items shall be inspected for the respective control device used: **(40 CFR 64.6(c)(1)(i & ii), 40 CFR 64.7(e))**

a. Validation of thermocouple accuracy or recalibration of each temperature thermocouple a minimum of once every 12 months. The thermocouple can be replaced in lieu of validation.

b. Perform a heat exchange/heat transfer media inspection a minimum of once every 18 months.\*

c. A minimum of once every 18 months, inspect the condition of the Regenerative Thermal Oxidizer valve seals and verify that the continuous valve timing/synchronization monitoring system, and its associated alarm, are operating properly.\*

d. A minimum of once every 18 months, inspect the condition of the carbon concentrator continuous pressure drop monitoring system, and its associated alarm, to assure that are operating properly.\*

1. The permittee shall keep records of the following:2

a. Combined VOC emissions from EU-LN3 calculated on a daily basis. **(R 336.1205, R 336.1224, R 336.1225)**

b. Combined VOC emissions on a 12-month rolling time period from EU-LN3 as determined at the end of each calendar month. **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(d), 40 CFR 52.21(j) and (x))**

c. Combined VOC and acetone emissions on a 12-month rolling time period from EU-LN3 as determined at the end of each calendar month. **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(d))**

d. The VOC content of each coating in pounds per gallon, minus water, as applied. **(R 336.1702(a),** **R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.21)**

1. The permittee shall keep records of the following:2

a. The starting and ending dates for each production run. A production run is defined as the coating of one substrate type, metal or plastic, without interruption by the other substrate type. **(R 336.1702(d), R 336.1702(a))**

b. The type of part coated, metal or plastic, during each production run. **(R 336.1702(d), R 336.1702(a))**

c. For each production run:

* + 1. The identity of each coating and reducer used.
    2. The coating category to which each coating belongs. Coating category shall correspond to the coating categories listed in FG-COATING, SC I.1 through I.14 for each coating used.
    3. The quantity of each coating and reducer used, in gallons.
    4. The VOC content in pounds VOC per gallon, minus water.
    5. The VOC content in pounds VOC per gallon with water.
    6. The mixing ratio of each component of each coating. **(R 336.1225, R 336.1702(d), R 336.1702(a))**

1. The identity, quantity, and VOC content of each purge and cleanup solvent used each calendar day.   
   **(R 336.1702(a))**
2. For each coating category, the calendar day volume weighted average of the VOC content of all coatings in the category in pounds of VOC per gallon of coating, minus water, as applied. **(R 336.1702(d))**
3. The permittee shall maintain a current listing of the chemical composition of each coating and adhesion promoter, including the weight percent of each compound.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(d))**

\* The requirement to address these items is satisfied if a performance test (i.e., stack test) has been performed on the control device within the prior 18-month period.

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

1. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

4. Each semi-annual report of monitoring and deviations shall include summary information on the number, duration and cause of excursion or exceedances, as applicable and the corrective action taken. If there were no excursions or exceedances in the reporting period, then this report shall include a statement that there were no excursions or exceedances **(R 336.1213(3), 40 CFR 64.9(a)(2)(i))**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

| **Stack & Vent ID** | **Maximum Exhaust Diameter / Dimensions**  **(inches)** | **Minimum Height**  **Above Ground**  **(feet)** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- |
| 1. SV-LN3-BOOTH1 | 422 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN3-BOOTH2 | 422 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN3-RTO | 342 | 322 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN3-BOOTH5 | 322 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN3-BOOTH6 | 422 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN3-BOOTH7 | 422 | 46.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN3-PRIMEOVEN | 92 | 37.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN3-IROVEN | 92 | 37.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN3-BAKEOVEN1 | 92 | 32.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV-LN3-BAKEOVEN2 | 92 | 32.52 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |

**IX. OTHER REQUIREMENT(S)**

For purposes of Compliance and Assurance Monitoring (CAM), excursions are defined as follows: **(R 336.1213(3), 40 CFR 64.6(c)(2))**

A temperature excursion is defined as a confirmed three-hour period during which the average temperature fails to meet the specified temperature requirements in SC III.2 and SC III.3.

A monitoring excursion is defined as a failure to properly monitor as required in SC VI.1, SC VI.2 or SC VI.3.

A monitoring excursion is defined as failure to properly implement and/or maintain the O&M Plan required in SC VI.3.

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

## EU-LN4

**EMISSION UNIT CONDITIONS**

**DESCRIPTION**

Line 4 consists of one side line booth with dry filters and one curing oven.

**Flexible Group ID:** FG-COATING, FG-MMMM, FG-PPPP

**POLLUTION CONTROL EQUIPMENT**

Dry filters for paint particulate control.

**I. EMISSION LIMIT(S)**

| **Pollutant** | **Limit** | **Time Period/**  **Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. VOC | 2,000 pounds/month2 | Calendar month | One Side Line Booth with dry filters for particulate control, and one curing oven | SC VI.1. | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. VOC | 3.0  tpy2 | 12-month rolling time period as determined at the end of each calendar month | One Side Line Booth with dry filters for particulate control, and one curing oven | SC VI.1. | **R 336.1225 R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |

**II. MATERIAL LIMIT(S)**

NA

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

1. The permittee shall not operate any paint spray booth unless all exhaust filters are in place, maintained, and operating properly.2 **(R 336.1301, R 336.1331, R 336.1901, R 336.1910)**

2. All waste materials shall be captured and stored in closed containers and be disposed of in an acceptance manner in compliance with all-applicable rules and regulations.2 **(R 336.1205, R 336.1225, R 336.1702(a), 40 CFR 52.21)**

**IV. DESIGN/EQUIPMENT PARAMETER(S)**

1. The permittee shall equip and maintain all booths with High Volume Low Pressure (HVLP) guns or equivalent technology with comparable transfer efficiency.2 **(R 336.1205, R 336.1702(a))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

NA

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. VOC emission calculations determining a monthly emission rate in pounds per month, tons per month, and a 12-month rolling time period emission rate in tpy.2 **(R 336.1205, R336.1225, R 336.1702(d))**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

| **Stack & Vent ID** | **Maximum Exhaust Diameter / Dimensions**  **(inches)** | **Minimum Height**  **Above Ground**  **(feet)** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- |
| 1. SV-LN4-BOOTH | 422 | 302 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |
| 1. SV- LN4-OVEN | 422 | 302 | **R 336.1225**  **R 336.1901**  **40 CFR 52.21 Subparts (c) & (d)** |

**IX. OTHER REQUIREMENT(S)**

NA

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

## EU-LN5

**EMISSION UNIT CONDITIONS**

**DESCRIPTION**

Spray coating process equipment includes spray booth for plastic and metal parts, two coating applicators, natural gas fired heater, and the use of acetone for purge and cleanup activities.

**Flexible Group ID:** FG-MMMM, FG-PPPP

**POLLUTION CONTROL EQUIPMENT**

Dry filters for paint particulate control.

**I. EMISSION LIMITS**

| **Pollutant** | **Limit** | **Time Period /**  **Operating Scenario** | **Equipment** | **Testing / Monitoring Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. VOC, acetone (CAS No. 67-64-1), and tert-butyl acetate (CAS No. 540-88-5) combined | 15.6 tpy2 | 12-month rolling time period as determined at the end of each calendar month | EU-LN5 | SC VI.4 | **R 336.1205**  **R 336.1224 R 336.1702(a)**  **R 336.1702(d)** |
| 2. Acetone (CAS No. 67-64-1) from purge and cleanup activities | 2.4 tpy1 | 12-month rolling time period as determined at the end of each calendar month | EU-LN5 | SC VI.5 | **R 336.1224** |
| 3. VOC Content for metal parts clear coatings | 4.0 lb/gal  (minus water)2,a  as applied | Daily volume-weighted average. | EU-LN5 | SC VI.4 | **R 336.1702(a)** |
| 4. VOC Content for metal parts extreme performance coatings | 3.5 lb/gal  (minus water)2,a  as applied | Daily volume-weighted average. | EU-LN5 | SC VI.4 | **R 336.1702(d)** |
| 5. VOC Content for plastic parts: air dried coatings for exterior parts in the prime-coating category | 4.6 lb/gal (minus water)2,a,c  as applied | Daily volume-weighted average. | EU-LN5 | SC VI.4 | **R 336.1702(a)** |
| 6. VOC Content for plastic parts: air dried coatings for exterior parts in the topcoat-basecoat coating category | 5.0 lb/gal  (minus water)2,a,b,c  as applied | Daily volume-weighted average. | EU-LN5 | SC VI.4 | **R 336.1702(d)** |
| 7. VOC Content for plastic parts: air dried coatings for exterior parts in the topcoat-clearcoat coating category | 4.0 lb/gal  (minus water)2,a,c  as applied | Daily volume-weighted average. | EU-LN5 | SC VI.4 | **R 336.1702(a)** |
| 8. VOC Content for plastic parts: air dried coatings for exterior parts in the topcoat-non-basecoat/clearcoat coating category | 4.0 lb/gal  (minus water)2,a,c  as applied | Daily volume-weighted average. | EU-LN5 | SC VI.4 | **R 336.1702(a)** |
| 9. VOC Content for plastic parts: air dried coatings for interior parts | 5.0 lb/gal  (minus water)2,a,b,c  as applied | Daily volume-weighted average. | EU-LN5 | SC VI.4 | **R 336.1702(d)** |
| 10. VOC Content for plastic parts: touch-up and repair | 5.0 lb/gal  (minus water)2,a,c  as applied | Daily volume-weighted average. | EU-LN5 | SC VI.4 | **R 336.1702(a)** |
| 1. Ethylbenzene   (CAS No. 100-41-4) | 0.6 tpy1 | 12-month rolling time period as determined at the end of each calendar month | EU-LN5 | SC VI.6 | **R 336.1225(1)** |
| 1. Glycol n-butyl ether   (CAS No. 112-34-5) | 2.0 tpy1 | 12-month rolling time period as determined at the end of each calendar month | EU-LN5 | SC VI.6 | **R 336.1225(1)** |
| 1. Dimethyl Ester   (CAS No. 1119-40-0) | 1.6 tpy1 | 12-month rolling time period as determined at the end of each calendar month | EU-LN5 | SC VI.6 | **R 336.1225(1)** |
| 1. Dibasic ester group   (CAS Nos. 1119-40-0, 106-65-0, 627-93-0) | 2.0 tpy1 | 12-month rolling time period as determined at the end of each calendar month | EU-LN5 | SC VI.6 | **R 336.1225(1)** |
| a. The phrase “minus water” shall also include compounds which are used as organic solvents, and which are excluded from the definition of volatile organic compound. **(R 336.1602(4))**  b.For black coatings, the emission limitation shall be determined by multiplying by 1.15.  c.When 40 CFR Part 60, Appendix A, Method 24 is used to determine the VOC content of a coating, the applicable emission limitation shall be determined by adding 0.1 to the appropriate limit | | | | | |

**II. MATERIAL LIMITS**

| **Material** | **Limit** | **Time Period / Operating Scenario** | **Equipment** | **Testing / Monitoring Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. VOC content of adhesion promoter for plastic or metal parts | 0.93 lb/gal (minus water) 2a  as applied | Instantaneous | EU LN5 | SC V.1 | **R 336.1702(a)** |

a. The phrase “minus water” shall also include compounds which are used as organic solvents and which are excluded from the definition of volatile organic compound. **(R 336.1602(4))**

**III. PROCESS/OPERATIONAL RESTRICTIONS**

The permittee shall capture all waste prime, base, adhesion promoter, reducers, thinners, purge and cleanup solvents, etc. (materials) and shall store them in closed containers. The permittee shall dispose of all waste materials in an acceptable manner in compliance with all applicable state rules and federal regulations.2   
**(R 336.1224, R 336.1702(a))**

The permittee shall dispose of spent filters in a manner which minimizes the introduction of air contaminants to the outer air.2 **(R 336.1224, R 336.1370)**

The permittee shall handle all VOC and / or HAP containing materials, in a manner to minimize the generation of fugitive emissions. The permittee shall keep containers covered at all times except when operator access is necessary.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(a)&(d))**

The permittee shall not operate the spray booth / bake oven portion of EU-LN5 at a temperature in excess of 194°F.2 **(R 336.1702(d))**

**IV. DESIGN/EQUIPMENT PARAMETERS**

The permittee shall not operate EU-LN5 unless all respective exhaust filters are installed, maintained and operated in a satisfactory manner.2 **(R 336.1224, R 336.1301, R 336.1910)**

The permittee shall equip and maintain EU-LN5 with HVLP applicators or comparable technology with equivalent transfer efficiency. For HVLP applicators, the permittee shall keep test caps available for pressure testing.2   
**(R 336.1702(a) and (d))**

3. The permittee shall install, calibrate, maintain and operate in a satisfactory manner a device to monitor and record the bake oven temperature on a per batch basis.2 **(R 336.1621, R 336.1632, R 336.1702(d))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall determine the VOC content, water content and density of any coating, as applied and as received, using federal Reference Test Method 24. Upon prior written approval by the AQD District Supervisor, the permittee may determine the VOC content from manufacturer’s formulation data. If the Method 24 and the formulation values should differ, the permittee shall use the Method 24 results to determine compliance.2   
**(R 336.1205, R 336.1225, R 336.1702, R 336.2001, R 336.2003, R 336.2004, R 336.2040(5))**

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1201(3))**

1. The permittee shall complete all required calculations in a format acceptable to the AQD District Supervisor by the last day of the calendar month, for the previous calendar month, unless otherwise specified in any monitoring/recordkeeping special condition.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702)**

2. The permittee shall monitor and record the bake oven temperature in a satisfactory manner on a batch basis for EU-LN5. The permittee shall keep the records using the format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request.2

**(R 336.1702(d))**

3. The permittee shall maintain a current listing from the manufacturer of the chemical composition of each material, including the weight percent of each component. The data may consist of Material Safety Data Sheets, manufacturer’s formulation data, or both as deemed acceptable by the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request.1 **(R 336.1224,   
R 336.1225, R 336.1702)**

4. The permittee shall keep the following information on a calendar day basis for EU-LN5:

1. Type of spray coating operation (metal or plastic).
2. Gallons (with water) of each prime, base, adhesion promoter, reducers, thinners, purge and cleanup solvents, etc. (materials) used.
3. VOC content (minus water and with water) of each material as applied.
4. VOC emission calculations determining the volume-weighted average VOC content of each coating category for both plastic and metal parts as applied on a calendar day basis.
5. VOC mass emission calculations determining the monthly emission rate in tons per calendar month.
6. fVOC mass emission calculations determining the annual emission rate in tons per 12-month rolling time period as determined at the end of each calendar month.

The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request.2 **(R 336.1205, R 336.1702)**

5. The permittee shall keep the following information on a calendar day basis for the use of purge and clean-up solvents (acetone) associated with EU-LN5:

1. Gallons of each solvent used and reclaimed.
2. VOC content, in pounds per gallon, of each solvent used.
3. VOC mass emission calculations determining the monthly emission rate in tons per calendar month.
4. VOC mass emission calculations determining the annual emission rate in tons per 12-month rolling time period as determined at the end of each calendar month.

The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request.1 **(R 336.1224)**

6. The permittee shall keep the following information on a calendar month basis for EU-LN5:1

1. Gallons (with water) of each ethylbenzene (CAS No. 100-41-4), glycol n-butyl ether (CAS No. 112-34-5), and dibasic esters (CAS Nos. 1119-40-0, 106-65-0, and/or 627-93-0) containing material used.
2. Where applicable, gallons (with water) of each ethylbenzene (CAS No. 100-41-4), glycol n-butyl ether (CAS No. 112-34-5), and dibasic esters (CAS Nos. 1119-40-0, 106-65-0, and/or 627-93-0) containing material reclaimed.
3. The ethylbenzene (CAS No. 100-41-4), glycol n-butyl ether (CAS No. 112-34-5), and dibasic esters (CAS Nos. 1119-40-0, 106-65-0, and/or 627-93-0) content (with water) in pounds per gallon of each material used.
4. Ethylbenzene (CAS No. 100-41-4), glycol n-butyl ether (CAS No. 112-34-5), and dibasic esters (CAS Nos. 1119-40-0, 106-65-0, and/or 627-93-0) mass emission calculations determining the monthly emission rate in tons per calendar month.
5. Ethylbenzene (CAS No. 100-41-4), glycol n-butyl ether (CAS No. 112-34-5), and dibasic esters (CAS Nos. 1119-40-0, 106-65-0, and/or 627-93-0) mass emission calculations determining the annual emission rate in tons per 12-month rolling time period as determined at the end of each calendar month.

The permittee shall keep the records using mass balance, or an alternative method and format acceptable to the AQD District Supervisor. The permittee shall keep all records on file and make them available to the Department upon request.1 **(R 336.1225(1))**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

**VIII. STACK/VENT RESTRICTIONS**

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

| **Stack & Vent ID** | **Maximum Exhaust Dimensions**  **(inches)** | **Minimum Height Above Ground**  **(feet)** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- |
| 1. SV-LN5   (Spray Booth for Ln 5) | 33.962 | 46.52 | **R 336.1225,**  **40 CFR 52.21(c) & (d)** |

**IX. OTHER REQUIREMENTS**

NA

**Footnotes:**

1This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

## EU-LN2&3

**EMISSION UNIT CONDITIONS**

**DESCRIPTION**

Consists of the combination of EU-LN2 and EU-LN3 to be used as an alternative equipment configuration as a single coating line rather than two separate coating lines. Metal parts coating: primer on EU-LN2 with basecoat, clearcoat and curing on EU-LN3.

**Flexible Group ID:** FG-COATING, FG-MMMM, FG-PPPP

**POLLUTION CONTROL EQUIPMENT**

1. A combined concentrator/oxidizer (RTO) control system is used to control VOC emissions from the EU-LN3 basecoat booths.2

1. Dry filters for paint particulate control on both EU-LN2 and EU-LN3.2

**I. EMISSION LIMITS**

As required in Table for EU-LN3.2 **(R336.1702(a))**

**II. MATERIAL LIMIT(S)**

NA

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

1. As required in EU-LN2 and EU-LN3.2 **(R336.1702(a))**

**IV. DESIGN/EQUIPMENT PARAMETER(S)**

1. As required in EU-LN2 and EU-LN3.2 **(R336.1702(a))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The VOC content of any coating, minus water, as applied.2 **(R 336.1702(a))**

2. The VOC content of any coating, minus water, as applied, shall be determined using federal Reference Test Method 24 or other EPA approved reference method. Alternatively, for waterborne coatings, the VOC content may be determined from formulation data, and for non-waterborne coatings, the VOC content may be determined from formulation data upon written approval from the AQD District Supervisor. If the Method 24 and formulation values should differ, then the Method 24 results shall be used to determine compliance.2 **(R336.1702(a), 40 CFR 52.21)**

3. The five most frequently used coatings and five other random coatings shall be tested at least once during each calendar year to verify VOC content using federal Test Method 24 or an alternate method as approved by the AQD District Supervisor.2 **(R 336.1702(a))**

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. As required in EU-LN3, SC VI.1-7.2 **(R336.1702(a))**
2. The permittee shall keep records of the following:

a. VOC emissions calculated on a daily basis.2 **(R 336.1205, R 336.1224, R 336.1225)**

b. VOC emissions on a 12-month rolling time period as determined at the end of each calendar month.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(d), 40 CFR 52.21)**

c. The VOC content of each coating in pounds per gallon, minus water, as applied.2 **(R 336.1702(a), R 336.2001, R 336.2003, R 336.2004, 40 CFR 52.212)**

1. The permittee shall keep records of the following:

a. The starting and ending dates for each production run. A production run is defined as the coating of one substrate type, metal or plastic, without interruption by the other substrate type.2 **(R 336.1702(d),** **R 336.1702(a))**

b. The type of part coated, metal or plastic, during each production run.2 **(R 336.1702(d), R 336.1702(a))**

c. For each production run:2

i. The identity of each coating and reducer.

ii. The coating category to which each coating belongs. Coating category shall correspond to the coating categories listed in FG-COATING, SC I.1 through SC I.14 for each coating used.

iii. The quantity of each coating and reducer in gallons.

iv. The VOC content in pounds VOC per gallon, minus water.

v. The VOC content in pounds VOC per gallon with water.

vi. The mixing ratio of each component of each coating. **(R 336.1225, R 336.1702(d), R 336.1702(a))**

1. The identity, quantity, and VOC content of each purge and cleanup solvent used each calendar day.2**(R 336.1702(a))**
2. For each coating category, the calendar day volume weighted average of the VOC content of all coatings in the category in pounds of VOC per gallon of coating, minus water, as applied.2 **(R 336.1702(d))**
3. The permittee shall maintain a current listing of the chemical composition of each coating and adhesion promoter, including the weight percent of each compound.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(d), 40 CFR 52.21)**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

| **Stack & Vent ID** | **Maximum Exhaust Diameter / Dimensions**  **(inches)** | **Minimum Height**  **Above Ground**  **(feet)** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- |
| As indicated in  EU-LN2 and EU-LN3 | As indicated in  EU-LN2 and EU-LN32 | As indicated in  EU-LN2 and EU-LN32 | As indicated in  EU-LN2 and EU-LN3 |

**IX. OTHER REQUIREMENT(S)**

NA

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

# D. FLEXIBLE GROUP SPECIAL CONDITIONS

Part D outlines the terms and conditions that apply to more than one emission unit. The permittee is subject to the special conditions for each flexible group in addition to the General Conditions in Part A and any other terms and conditions contained in this ROP.

The permittee shall comply with all specific details in the special conditions and the underlying applicable requirements cited. If a specific condition type does not apply, NA (not applicable) has been used in the table. If there are no special conditions that apply to more than one emission unit, this section will be left blank.

## FLEXIBLE GROUP SUMMARY TABLE

The descriptions provided below are for informational purposes and do not constitute enforceable conditions.

| **Flexible Group ID** | **Flexible Group Description** | **Associated**  **Emission Unit IDs** |
| --- | --- | --- |
| FG-COATING | Four Separate Coating Lines as Described in EU-LN1, EU-LN2, EU-LN3, and EU-LN5; One Sideline Coating Booth as Described in EU-LN4; and a combined Emission Unit described in EU-LN2&3. | EU-LN1  EU-LN2  EU-LN3  EU-LN4  EU-LN2&3 |
| FG-COLDCLEANERS | Any cold cleaner that is grandfathered or exempt from Rule 201 pursuant to Rule 281(h) or Rule 285(r)(iv). Existing cold cleaners were placed into operation prior to July 1, 1979. New cold cleaners were placed into operation on or after July 1, 1979. | EUCOLDCLEANERS |
| FG-MMMM | Each new, reconstructed, and existing affected source described in 40 CFR 63.3881(a)(1), including the subcategories listed in 40 CFR Part 63, Subpart MMMM,40 CFR63.3881(a)(2) through (6), meeting the applicability requirements of 40 CFR 63.3881(b), which is engaged in the surface coating of miscellaneous metal parts and products. The affected source includes the collection of all the items listed in 40 CFR 63.3882(b)(1) through (4). Surface coating is defined by 40 CFR 63.3881 as the application of coating to a substrate using, for example, spray guns or dip tanks. Surface coating also includes associated activities, such as surface preparation, cleaning, mixing, and storage if they are directly related to the application of the coating. 40 CFR Part 63, Subpart MMMM does not apply to surface coating or a coating operation that meets any of the criteria of 40 CFR 63.3881(c)(1) through (17). | EU-LN1  EU-LN2  EU-LN3  EU-LN4  EU-LN5  EU-LN2&3 |
| FG–PPPP | Each new, reconstructed, and existing affected source engaged in the surface coating of plastic parts and products, identified within each of the four subcategories listed in 40 CFR Part 63, Subpart PPPP,40 CFR63.4481(a)(2) to (5). Surface coating is defined by 40 CFR 63.4481 as the application of coating to a substrate using, for example, spray guns or dip tanks. Surface coating also includes associated activities, such as surface preparation, cleaning, mixing, and storage if they are directly related to the application of the coating. | EU-LN1  EU-LN2  EU-LN3  EU-LN4  EU-LN5  EU-LN2&3 |
| FG-BOILERMACT | This Flexible Group establishes the national emission limitations and work practice standards for hazardous air pollutants (HAP) emitted from industrial, commercial, and institutional boilers and process heaters located at major sources of HAP as found in 40 CFR Part 63, Subpart DDDDD. | EU-BOILER1  EU-BOILER2 |

## FG-COATING

**FLEXIBLE GROUP CONDITIONS**

**DESCRIPTION**

Four Separate Coating Lines as Described in EU-LN1, EU-LN2, EU-LN3, and One Sideline Coating Booth as Described in EU-LN4; and a combined Emission Unit described in EU-LN2&3.

**Emission Units:** EU-LN1, EU-LN2, EU-LN3, EU-LN4, EU-LN2&3

**POLLUTION CONTROL EQUIPMENT**

1. Dry filters for overspray particulate control.
2. A combined concentrator/oxidizer (RTO) control system is used to control VOC emissions from the EU-LN3 basecoat booths.

**I. EMISSION LIMIT(S)**

| **Pollutant** | **Limit** | **Time Period/**  **Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. VOC – coating of metal parts using clear coatings | 4.3 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1205, R 336.1225, R 336.1702(a)** |
| 1. VOC – coating of metals parts using extreme performance coatings | 3.5 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1205, R 336.1225, R 336.1702(a)** |
| 1. VOC – Solvent based adhesion promoter(s) | 5.88 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN4  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1702(a), 40 CFR 52.21** |
| 1. VOC – High bake coatings for both interior and exterior parts in the Prime-Flexible Coating Category3,4 | 4.5 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1702(d)** |
| 1. VOC – High bake coatings for both interior and exterior parts in the Prime-Non-Flexible Coating Category 3,4 | 3.5 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1702(d)** |
| 1. VOC – High bake coatings for both interior and exterior parts in the Topcoat-Basecoat Coating Category3,4 | 4.3 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1702(d)** |
| 1. VOC – High bake coatings for both interior and exterior parts in the Topcoat-Clearcoat Coating Category3,4 | 4.0 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1702(d)** |
| 1. VOC – High bake coatings for both interior and exterior parts in the Topcoat-Non-Basecoat/Clearcoat Coating Category3,4 | 4.3 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1702(d)** |
| 1. VOC – Air dried coatings for exterior parts in the Prime-Coating Category 3,5 | 4.8 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1702(d)** |
| 1. VOC – Air dried coatings for exterior parts in the Topcoat-Basecoat Coating Category 3,5 | 5.0 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1702(d)** |
| 1. VOC – Air dried coatings for exterior parts in the Topcoat-Clearcoat Coating Category 3,5 | 4.5 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.2  SC VI.3 | **R 336.1702(d)** |
| 1. VOC – Air dried coatings for exterior parts in the Topcoat-Non-Basecoat/Clearcoat Coating Category 3,5 | 5.0 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.3 | **R 336.1702(d)** |
| 1. VOC – Air dried coatings for interior parts 3,5 | 5.0 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SCVI.3 | **R 336.1702(d)** |
| 1. VOC – Touch-up and repair 5 | 5.2 pounds per gallon of coating, minus water, as applied**2** | Calculated on a volume weighted, calendar day average per coating line | EU-LN1  EU-LN2  EU-LN3  EU-LN2&3 | SC VI.1  SC VI.3 | **R 336.1702(d)** |

a. For red and black coatings, the emission limitation shall be determined by multiplying the appropriate limit by 1.15.

b. When Method 24 is used to determine the volatile organic compound content of a coating, the applicable emission limitation shall be determined by adding 0.5 to the appropriate limit.

c. When Method 24 is used to determine the volatile organic compound content of a coating, the applicable emission limitation shall be determined by adding 0.1 to the appropriate limit.

**II. MATERIAL LIMIT(S)**

| **Material** | **Limit** | **Time Period/**  **Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. Waterborne coatings and waterborne adhesion promoters combined | 360 gallons/day1 | Calendar day | EU-LN1  EU-LN2  EU-LN3  EU-LN4  EU-LN5  EU-LN2&3 | SC VI.1  SC VI.3 | **R 336.1225** |
| 1. Waterborne coatings and waterborne adhesion promoters combined | 78,000 gallons/year1 | 12-month rolling time period as determined at the end of each calendar | EU-LN1  EU-LN2  EU-LN3  EU-LN4  EU-LN5  EU-LN2&3 | SC VI.1  SC VI.3 | **R 336.1225** |
| 1. Waterborne adhesion promoters | 154.8 gallons/day1 | As received, based on a calendar day average | EU-LN1  EU-LN2  EU-LN3  EU-LN4  EU-LN5  EU-LN2&3 | SC VI.1  SC VI.3 | **R 336.1225** |
| 1. Waterborne adhesion promoters | 33,540 gallons/year1 | 12-month rolling time period as determined at the end of each calendar month | EU-LN1  EU-LN2  EU-LN3  EU-LN4  EU-LN5  EU-LN2&3 | SC VI.1  SC VI.3 | **R 336.1225** |
| 1. Solvent based adhesion promoters | 48 gallons/day1 | Calendar day | EU-LN1  EU-LN2  EU-LN3  EU-LN4  EU-LN5  EU-LN2&3 | SC VI.1  SC VI.3 | **R 336.1225** |

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

The permittee shall not operate any paint spray booth unless all exhaust filters are in place, maintained, and operating properly.2 **(R 336.1301, R 336.1331, R 336.1901, R 336.1910)**

All waste materials shall be captured and stored in closed containers and be disposed of in an acceptance manner in compliance with all-applicable rules and regulations.2 **(R 336.1205, R 336.1225, R 336.1702(a), 40 CFR 52.21)**

1. All purge solvents and coatings from all applicators shall be captured and stored in closed containers.2 **(R 336.1702(a))**
2. The exhaust filters on the paint booths shall be inspected and replaced if necessary at least once per week.1 **(R 336.1225)**

**IV. DESIGN/EQUIPMENT PARAMETER(S)**

1. The permittee shall equip and maintain all booths with High Volume Low Pressure (HVLP) guns or equivalent technology with comparable transfer efficiency.2 **(R 336.1205, R 336.1224, R 336.1225, R 336.1702(a), R 336.1910, 40 CFR 52.21)**

2. The permittee shall not operate basecoat booths portion of EU-LN3 unless the concentrator/oxidizer control system is in place and operating properly. Proper operation is defined as maintaining a minimum temperature in the oxidizer section of the control system of 1400 degrees Fahrenheit and maintaining a minimum retention time of 0.5 seconds.2 **(R 336.1224, R 336.1225, R 336.1702(a), R 336.1910, 40 CFR 52.21)**

3. The permittee may use a conventional air atomized spray gun for application of the final coat of metallic base coat on any part.2 **(R 336.1702(a))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. As described in EU-LN3.2 **(R 336.1213(3))**

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. As described in EU-LN1, SC VI.1-3, EU-LN2, SC VI.1-3, EU-LN3, SC VI.1-4, EU-LN4. SC VI.1, EU-LN5.   
   SC VI.1-6, and EU-LN2&3, SC VI.1-4.2 **(R 336.1702(a))**
2. Once per month, the permittee shall measure and record the pressure across each HVLP applicator.2 **(R 336.1702(a))**
3. The permittee shall keep records of the following:1 **(R 336.1225)**

a. The calendar day usage, separately for waterborne coatings and waterborne adhesion promoters, in gallons.

b. The usage, separately for waterborne coatings and waterborne adhesion promoters over each 12-month rolling time period as determined at the end of each calendar month.

c. The calendar day usage of solvent based adhesion promoter.

1. A record of the weekly inspection with the date of the exhaust filter replacement shall be maintained. **(R 336.12125(3))**

**See Appendix 7**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

4. Quarterly reporting of the emissions rates described in SC I.1-14 and SC II.1-5 above. Due 30 days after the end of each calendar quarter.2 **(R 336.1702, 40 CFR 52.21)**

1. The permittee shall submit any performance test reports to the AQD Technical Programs Unit and District Office, in a format approved by the AQD. **(R 336.1213(3)(c), R 336.2001(5))**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

| **Stack & Vent ID** | **Maximum Exhaust Diameter / Dimensions**  **(inches)** | **Minimum Height Above Ground**  **(feet)** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- |
| As indicated in EU-LN1, EU-LN2, EU-LN3, and EU-LN4 | As indicated in EU-LN1, EU-LN2, EU-LN3, EU-LN5, and EU-LN42 | As indicated in EU-LN1, EU-LN2, EU-LN3, EU-LN5, and EU-LN42 | As indicated in EU-LN1, EU-LN2, EU-LN3, EU-LN5, and EU-LN4 |

**IX. OTHER REQUIREMENT(S)**

1. The permittee shall meet all applicable provisions of 40 CFR Part 63, Subpart PPPP and 40 CFR Part 63,   
   Subpart MMMM for the surface coating of plastic parts or products and metal parts or products. **(40 CFR Part 63, Subpart PPPP, 40 CFR Part 63, Subpart MMMM)**

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

## FG-MMMM

**FLEXIBLE GROUP CONDITIONS**

**DESCRIPTION**

Each new, reconstructed, and existing affected source described in 40 CFR 63.3881(a)(1), including the subcategories listed in 40 CFR Part 63, Subpart MMMM,40 CFR63.3881(a)(2) through (6), meeting the applicability requirements of 40 CFR 63.3881(b), which is engaged in the surface coating of miscellaneous metal parts and products. The affected source includes the collection of all the items listed in 40 CFR 63.3882(b)(1) through (4). Surface coating is defined by 40 CFR 63.3881 as the application of coating to a substrate using, for example, spray guns or dip tanks. Surface coating also includes associated activities, such as surface preparation, cleaning, mixing, and storage if they are directly related to the application of the coating. 40 CFR Part 63, Subpart MMMM does not apply to surface coating or a coating operation that meets any of the criteria of 40 CFR 63.3881(c)(1) through (17).

**Emission Units:** EU-LN1, EU-LN2, EU-LN3, EU-LN4, EU-LN5, EU-LN2&3

**POLLUTION CONTROL EQUIPMENT**

Fluidized bed concentrator and thermal oxidizer

**I. EMISSION LIMIT(S)**

| **Pollutant** | **Limit** | **Time Period/Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. Organic HAP | 2.6 lbs per gal of coating solids | 12-month rolling time period \* | Existing –  General Use Coating | SC V.1  SC VI.1-10 | **40 CFR 63.3890(b)(1)** |
| 1. Organic HAP | 27.5 lbs per gal of coating solids | 12-month rolling time period \* | Existing –  High Performance Coating | SC V.1  SC VI.1-10 | **40 CFR 63.3890(b)(2)** |

\* As determined at the end of each calendar month.

3. The permittee shall determine whether the organic HAP emission rate is equal to or less than the applicable emission limits in 40 CFR 63.3890 using at least one of the following three options, which are listed in 40 CFR 63.3891(a) through (c):

a. Compliant material option,

b. Emission rate without add-on controls option, or

c. Emission rate with add-on controls option.

The permittee shall include all coatings, thinners, and/or other additives, and cleaning materials used when determining the emission rate. **(40 CFR 63.3891)**

4. Any coating operation(s) using the compliant material option or the emission rate without add-on controls option, shall be in compliance with the applicable emission limits in 40 CFR 63.3890 at all times. **(40 CFR 63.3900(a)(1))**

5. Any coating operation(s) using the emission rate with add-on controls option shall be in compliance with the applicable emission limits at all times except during periods of startup, shutdown, and malfunction. **(40 CFR 63.3900(a)(2)(i))**

6. If the surface coating operation(s) meet the applicability criteria of more than one of the subcategory emission limits specified in 40 CFR 63.3890(a) or (b), the permittee may comply separately with each subcategory emission limit, or comply using one of the alternatives in 40 CFR 63.3890(c)(1) or (2). **(40 CFR 63.3890(c))**

**II. MATERIAL LIMIT(S)**

| **Material** | **Limit** | **Time Period/**  **Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. Each Thinner and/or Additive | No Organic HAP \* | Continuous | Each Coating Operation using  Compliant Material Option | SC VI.1-10 | **40 CFR 63.3891(a)** |
| 1. Each Cleaning Material | No Organic HAP \* | Continuous | Each Coating Operation using  Compliant Material Option | SC VI.1-10 | **40 CFR 63.3891(a)** |

\* Determined according to 40 CFR 63.3941(a).

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

1. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall meet the operating limits specified in Table 1 of 40 CFR Part 63, Subpart MMMM as identified below. The permittee must establish the operating limits during the performance test according to the requirements in 40 CFR 63.3967.   
**(40 CFR 63.3892(b) and Table 1)**

| **Add-on Control Device** | **Operating Limit** |
| --- | --- |
| Thermal oxidizer | 1. The average combustion temperature in any 3-hour period must not fall below the combustion temperature limit established according to 40 CFR 63.3967(a). |
| Concentrators, including zeolite wheels and rotary carbon adsorbers | 1. The Average gas temperature of the desorption concentrate stream in any 3-hour period must not fall below the limit established according to 40 CFR 63.3967(e) and 2. The average pressure drop of the dilute stream across the concentrator in any 3-hour period must not fall below the limit established according to 40 CFR 63.3967(e). |
| Emission capture system that is not a PTE according to 40 CFR 63.3965(a). | 1. The average gas volumetric flow rate or duct static pressure in each duct between a capture device and add-on control device inlet in any 3-hour period must not fall below the average volumetric flow rate or duct static pressure limit established for that capture device according to 40 CFR 63.3967(f). |

2. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall develop and implement a work practice plan, to minimize the organic HAP emissions from the storage, mixing and conveying of coatings, thinners and/or other additives, and cleaning materials used in, and waste materials generated by the controlled coating operation(s). The work practice plan shall specifiy practices and procedures to ensure at a minimum the following elements are implemented:

a. All organic HAP containing coatings, thinners and/or other additives, cleaning materials, and waste materials must be stored in closed containers. **(40 CFR 63.3893(b)(1))**

b. Spills of organic HAP containing coatings, thinners and/or other additives, cleaning materials, and waste materials must be minimized. **(40 CFR 63.3893(b)(2))**

c. Organic HAP containing coatings, thinners and/or other additives, cleaning materials, and waste materials must be conveyed from one location to another in closed containers or pipes. **(40 CFR 63.3893(b)(3))**

d. Mixing vessels which contain organic-HAP-containing coatings and other materials must be closed except when adding to, removing, or mixing the contents. **(40 CFR 63.3893(b)(4))**

e. Emissions of organic HAP must be minimized during cleaning of storage, mixing, and conveying equipment. **(40 CFR 63.3893(b)(5))**

1. The permittee may choose to comply with an alternative to the work practice standard, after receiving prior approval from the USEPA in accordance with 40 CFR 63.6(g). **(40 CFR 63.3893(c))**
2. If the affected source uses an emission capture system and add-on control device, the permittee shall develop and implement a written startup, shutdown and malfunction plan (SSMP) according to the provisions of 40 CFR 63.6(e)(3). This SSMP must address the startup, shutdown and corrective actions in the event of a malfunction of the emission capture system or the add-on control device. The SSMP must also address any coating operation equipment that may cause increased emissions or that would affect capture efficiency if the process equipment malfunctions, such as conveyors that move parts among enclosures. **(40 CFR 63.3900(c))**
3. Any coating operation(s) using the emission rate with add-on controls option shall be in compliance with the operating limits for emission capture systems and add-on control devices required by 40 CFR 63.3892 at all times except during periods of startup, shutdown, and malfunction. **(40 CFR 63.3900(a)(2)(ii))**
4. Any coating operation(s) using the emission rate with add-on controls option shall be in compliance with the work practice standards in 40 CFR 63.3893 at all times. **(40 CFR 63.3900(a)(2)(iii))**

**IV. DESIGN/EQUIPMENT PARAMETER(S)**

1. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall not operate FG-MMMM unless the Regenerative Thermal Oxidizer and Carbon Adsorber are installed, maintained, and operated in a satisfactory manner. **(40 CFR 63.3892(b))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall conduct each performance test required by 40 CFR 63.3960 according to the requirements in 40 CFR 63.7(e)(1) and under the conditions in 40 CFR 63.3964(a)(1) and (2), unless a waiver of the performance test is obtained in accordance with 40 CFR 63.7(h). **(40 CFR 63.3964(a))**

1. The permittee shall conduct each performance test of an emission capture system and add-on control device to determine capture efficiency and emission destruction or removal efficiency, according to the requirements in 40 CFR 63.3965 and 40 CFR 63.3966. **(40 CFR 63.3964(b))**

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall conduct an initial compliance demonstration for the initial compliance period according to the requirements in 40 CFR 63.3941, 40 CFR 63.3951, or 40 CFR 63.3961. The initial compliance period begins on the applicable compliance date specified in 40 CFR 63.3883 and ends on the last day of the 12th month following the compliance date. If the compliance date occurs on any day other than the first of the month, then the compliance period extends through that month plus the next 12 months. **(40 CFR 63.3940, 40 CFR 63.3950,  
 40 CFR 63.3960)**

2. The permittee shall keep all records required by 40 CFR 63.3930 in the format and timeframes outlined in 40 CFR 63.3931. **(40 CFR 63.3942(d), 40 CFR 63.3952(d), 40 CFR 63.3963(j))**

3. The permittee shall maintain, at a minimum, the following records for each compliance period:

a. A copy of each notification and report that is submitted to comply with Subpart MMMM, and the documentation supporting each notification and report. **(40 CFR 63.3930(a))**

b. A current copy of information provided by materials suppliers or manufacturers, such as manufacturer’s formulation data, or test data used to determine the mass fraction of organic HAP and density of each coating, thinner and/or other additive, and cleaning material, and the volume fraction of coating solids for each coating. **(40 CFR 63.3930(b))**

c. A list of the coating operations on which each compliance option was used, and the beginning and ending dates and times for each compliance option used. **(40 CFR 63.3930(c)(1))**

d. For the compliant materials option, the calculation of the organic HAP content for each coating, using Equation 2 of 40 CFR 63.3941. **(40 CFR 63.3930(c)(2))**

e. For the emission rate without add-on controls option, the calculation of the total mass of organic HAP emissions for the coatings, thinners and/or additives, and cleaning materials used each month using Equations 1, 1A through 1C and 2 of 40 CFR 63.3951; and, if applicable, the calculation used to determine mass of organic HAP in waste materials according to 40 CFR 63.3951(e)(4); the calculation of the total volume of coating solids used each month using Equation 2 of 40 CFR 63.3951; and the calculation of each 12-month organic HAP emission rate using Equation 3 of 40 CFR 63.3951. **(40 CFR 63.3930(c)(3))**

f. For the emission rate with add-on controls option, the calculations specified in 40 CFR 63.3930(c)(4)(i) through (v). **(40 CFR 63.3930(c)(4))**

g. The name and mass or volume of each coating, thinner and/or other additive, and cleaning material used during each compliance period. If the compliant material option is used for all coatings at the affected source, the permittee may maintain purchase records for each material used rather than a record of the volume used. **(40 CFR 63.3930(d))**

h. The mass fraction of organic HAP for each coating, thinner and/or additive, and cleaning material used during each compliance period unless the material is tracked by weight. **(40 CFR 63.3930(e))**

i. The volume fraction of coating solids for each coating used during each compliance period. **(40 CFR 63.3930(f))**

j. For either the emission rate without add-on controls or with add-on controls option, the density of for each coating, thinner and/or other additive, and cleaning material used during each compliance period. **(40 CFR 63.3930(g))**

k. The information specified in 40 CFR 63.3930(h)(1) through (3), if an allowance is used in Equation 1 of 40 CFR 63.3951 for organic HAP contained in waste materials sent to or designated for shipment to a treatment, storage, and disposal facility (TSDF) according to 40 CFR 63.3951(e)(4). **(40 CFR 63.3930(h))**

l. The date, time, and duration of each deviation. **(40 CFR 63.3930(j))**

m. For the emission rate with add-on controls option, records specified in 40 CFR 63.3930(k)(1) through 40 CFR 63.3930(k)(8). **(40 CFR 63.3930(k))**

4. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall demonstrate continuous compliance with the operating limits specified in Table 1 of 40 CFR Part 63, Subpart MMMM using the applicable method(s) described below: **(40 CFR 63.3963(c))**

| **Add-on Control Device** | **Operating Limit** | **Continuous Compliance**  **Demonstration Method** |
| --- | --- | --- |
| Thermal oxidizer | 1. The average combustion temperature in any 3-hour period must not fall below the combustion temperature limit established according to 40 CFR 63.3967(a). | 1. Collect the combustion temperature data according to 40 CFR 63.3968(c); 2. Reduce the data to 3-hour block averages; and 3. Maintain the 3-hour average combustion temperature at or above the temperature limit. |
| Concentrators including zeolite wheels and rotary carbon adsorbers | 1. The Average gas temperature of the desorption concentrate stream in any 3-hour period must not fall below the limit established according to 40 CFR 63.3967(e) and 2. The average pressure drop of the dilute stream across the concentrator in any 3-hour period must not fall below the limit established according to 40 CFR 63.3967(e). | 1. Measure the total regeneration desorbing gas (e.g. steam or nitrogen) mass flow for each regeneration cycle according to 40 CFR 63.3968(d); and 2. Maintain the total regeneration desorbing gas mass flow at or above the mass flow limit. 3. Measure the temperature of the carbon bed after completing each regeneration and any cooling cycle according to 40 CFR 63.3968(d); and 4. Operate the carbon beds such that each carbon bed is not returned to service until completing each regeneration and any cooling cycle until the recorded temperature of the carbon bed is at or below the temperature limit. |
| Emission capture system that is not a PTE according to 40 CFR 63.3965(a). | * 1. The average gas volumetric flow rate or duct static pressure in each duct between a capture device and add-on control device inlet in any 3-hour period must not fall below the average volumetric flow rate or duct static pressure limit established for that capture device according to 40 CFR 63.3967(f). | 1. Collect the gas volumetric flow rate or duct static pressure for each capture device according to 40 CFR 63.3968(g); 2. Reduce the data to 3-hour block averages; and 3. Maintain the 3-hour average gas volumetric flow rate or duct static pressure for each capture device at or above the gas volumetric flow rate or duct static pressure limit. |

5. For each coating used for the compliant coating option, the permittee shall demonstrate continuous compliance with the emission limit in 40 CFR 63.3890, for each compliance period, using Equation 2 of 40 CFR 63.3941. For each thinner and cleaning material used, the permittee shall determine continuous compliance according to 40 CFR 63.3941(a). **(40 CFR 63.3942)**

6. For any coating operation or group of coating operations using the emission rate without add-on controls option, the permittee shall demonstrate continuous compliance with the applicable organic HAP emission limit in 40 CFR 63.3890, for each compliance period, according to 40 CFR 63.3951(a) through (g). **(40 CFR 63.3952)**

7. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall demonstrate continuous compliance with the applicable organic HAP emission limit in 40 CFR 63.3890, for each compliance period, according to the procedures in 40 CFR 63.3961. **(40 CFR 63.3963)**

1. During the performance test required by 40 CFR 63.3960, the permittee shall perform the applicable monitoring and recordkeeping in accordance with 40 CFR 63.3967 to establish the emission capture system and add-on control device operating limits required by 40 CFR 63.3892. **(40 CFR 63.3967)**

9. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall install, operate, and maintain each Continuous Parameter Monitoring System (CPMS) according to the requirements of 40 CFR 63.3968(a). If the capture system contains a bypass line, the permittee shall comply with the requirements of 40 CFR 63.3968(b). **(40 CFR 63.3968)**

10. The permittee must apply to the USEPA for approval of alternative monitoring under 40 CFR 63.8(f), if using an add-on control device other than those listed in Table 1 of 40 CFR Part 63, Subpart MMMM, or to monitor an alternative parameter and comply with a different operating limit. **(40 CFR 63.3892(c))**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

1. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

4. For the compliant material option, if any coating used for any 12-month compliance period exceeds the applicable emission limit specified in 40 CFR 63.3890; or any thinner or cleaning material used contains any organic HAP, the permittee shall report this as a deviation as specified in 40 CFR 63.3910(c)(6) and 40 CFR 63.3920(a)(5)   
**(40 CFR 63.3942(b))**

5. For the emission rate without add-on controls, if the organic HAP emission rate for any 12-month compliance period exceeds the applicable emission limit specified in 40 CFR 63.3890, the permittee shall report this as a deviation as specified in 40 CFR 63.3910(c)(6) and 40 CFR 63.3920(a)(6). **(40 CFR 63.3952(b))**

6. For the emission rate with add-on controls option, the permittee shall report the following as deviations as specified in 40 CFR 63.3910(c)(6) and 40 CFR 63.3920(a)(7):

a. The organic HAP emission rate for any 12-month compliance period exceeds the applicable emission limit specified in 40 CFR 63.3890; **(40 CFR 63.3963(b))**

b. An operating parameter is out of the allowed range; **(40 CFR 63.3963(c)(1))**

c. Any control system by-pass line, for which liquid-liquid material balances are not carried out, is opened;   
**(40 CFR 63.3963(d))**

d. Deviations from work practice standards occur. **(40 CFR 63.3963(e))**

7. The permittee shall submit the applicable notifications specified in 40 CFR 63.7(b) and (c), 63.8(f)(4) and 63.9(b) through (e) and (h), an initial notification and a notification of compliance status as specified in 40 CFR 63.3910. **(40 CFR Part 63, Subparts A and MMMM)**

8. The permittee shall submit all semiannual compliance reports specified in 40 CFR 63.3920(a). Each semi-annual compliance report shall identify which coating operation(s) used each compliance option, and if there were no deviations from the emission limitations in 40 CFR 63.3890, include a statement that the coating operations were in compliance. **(40 CFR 63.3920, 40 CFR 63.3942(c), 40 CFR 63.3952(c), 40 CFR 63.3963(f))**

9. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall submit all performance test reports for emission capture systems and add-on control devices. **(40 CFR 63.3920(b))**

1. If the emission rate with add-on controls option is used and a startup, shutdown, or malfunction occurs during the semi-annual reporting period, the permittee shall submit a SSM report as specified in 40 CFR 63.3920(c).   
   **(40 CFR 63.3920(c), 40 CFR 63.10(d))**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

NA

**IX. OTHER REQUIREMENT(S)**

1. The permittee shall comply with all applicable provisions of the National Emission Standards for Hazardous Air Pollutants, as specified in 40 CFR Part 63, Subpart A and Subpart MMMM for Surface Coating of Miscellaneous Metal Parts and Products by the initial compliance date. **(40 CFR Part 63, Subparts A and MMMM)**

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

## FG-PPPP

**FLEXIBLE GROUP CONDITIONS**

**DESCRIPTION**

Each new, reconstructed, and existing affected source engaged in the surface coating of plastic parts and products, identified within each of the four subcategories listed in 40 CFR Part 63, Subpart PPPP,63.4481(a)(2) to (5). Surface coating is defined by 40 CFR 63.4481 as the application of coating to a substrate using, for example, spray guns or dip tanks. Surface coating also includes associated activities, such as surface preparation, cleaning, mixing, and storage if they are directly related to the application of the coating.

**Emission Units:** EU-LN1, EU-LN2, EU-LN3, EU-LN4, EU-LN-5, EU-LN2&3

**POLLUTION CONTROL EQUIPMENT**

Fluidized bed concentrator and thermal oxidizer

**I. EMISSION LIMIT(S)**

| **Pollutant** | **Limit** | **Time Period/Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. Organic HAP | 0.16 lb per lb of coating solids | 12-month rolling time period \* | Existing -  General Use Coating | SC V.1-10 | **40 CFR 63.4490(b)(1)** |

\* As determined at the end of each calendar month

2. The permittee shall determine whether the organic HAP emission rate is equal to or less than the applicable emission limits in 40 CFR 63.4490 using at least one of the following three options, which are listed in 40 CFR 63.4491(a) through (c):

a. Compliant material option,

b. Emission rate without add-on controls option, or

c. Emission rate with add-on controls option.

The permittee shall include all coatings, thinners and/or other additives, and cleaning materials used when determining the emission rate. **(40 CFR 63.4491)**

3. Any coating operation(s) using the compliant material option or the emission rate without add-on controls option shall be in compliance with the applicable emission limits in 40 CFR 63.4490 at all times. **(40 CFR 63.4500(a)(1))**

4. Any coating operation(s) using the emission rate with add-on controls option shall be in compliance with the applicable emission limits at all times except during periods of startup, shutdown, and malfunction. **(40 CFR 63.4500(a)(2)(i))**

5. If the surface coating operation(s) meet the applicability criteria of more than one of the subcategory emission limits specified in 40 CFR 63.4490(a) or (b), the permittee may comply separately with each subcategory emission limit, or comply using one of the alternatives in 40 CFR 63.4490(c)(1) or (2). **(40 CFR 63.4490(c))**

1. **MATERIAL LIMIT(S)**

| **Material** | **Limit** | **Time Period/Operating Scenario** | **Equipment** | **Monitoring/**  **Testing Method** | **Underlying Applicable Requirements** |
| --- | --- | --- | --- | --- | --- |
| 1. Each Thinner and/or Additive | No Organic HAP \* | Continuous | Each Coating Operation using  Compliant Material Option | SC VI.1-10 | **40 CFR 63.4491(a)** |
| 1. Each Cleaning Material | No Organic HAP \* | Continuous | Each Coating Operation using  Compliant Material Option | SC VI.1-10 | **40 CFR 63.4491(a)** |

\* Determined according to 40 CFR 63.4541(a).

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

* 1. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall meet the operating limits specified in Table 1 of 40 CFR Part 63, Subpart PPPP as identified below. The permittee must establish the operating limits during the performance test according to the requirements in 40 CFR 63.4567.

**(40 CFR 63.4492(b) and Table 1)**

| **Add-on Control Device** | **Operating Limit** |
| --- | --- |
| Thermal oxidizer | The average combustion temperature in any 3-hour period must not fall below the combustion temperature limit established according to 40 CFR 63.4567(a). |
| Concentrators, including zeolite wheels and rotary carbon adsorbers | The average gas temperature of the desorption concentrate stream in an 3-hour period must not fall below the limit established according to 40 CFR 63.4567(e); and  The average pressure drop of the dilute stream across the concentrator in any 3 hour period must not fall below the limit established according to 40 CFR 63.4567(e). |
| Emission capture system that is not a PTE according to 40 CFR 63.4565(a). | The average gas volumetric flow rate or duct static pressure in each duct between a capture device and add-on control device inlet in any 3-hour period must not fall below the average volumetric flow rate or duct static pressure limit established for that capture device according to 40 CFR 63.4567(f). |

2. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall develop and implement a work practice plan to minimize the organic HAP emissions from the storage, mixing and conveying of coatings, thinners and/or other additives, and cleaning materials used in, and waste materials generated by the controlled coating operation(s). The work practice plan shall specifiy practices and procedures to ensure at a minimum the following elements are implemented:

a. All organic HAP containing coatings, thinners and/or other additives, cleaning materials, and waste materials must be stored in closed containers. **(40 CFR 63.4493(b)(1))**

b. Spills of organic HAP containing coatings, thinners and/or other additives, cleaning materials, and waste materials must be minimized. **(40 CFR 63.4493(b)(2))**

c. Organic HAP containing coatings, thinners and/or other additives, cleaning materials and waste materials must be conveyed from one location to another in closed containers or pipes. **(40 CFR 63.4493(b)(3))**

d. Mixing vessels which contain organic-HAP-containing coatings and other materials must be closed except when adding to, removing, or mixing the contents. **(40 CFR 63.4493(b)(4))**

e. Emissions of organic HAP must be minimized during cleaning of storage, mixing, and conveying equipment. **(40 CFR 63.4493(b)(5))**

The permittee may choose to comply with an alternative to the work practice standard, after receiving prior approval from the USEPA in accordance with 40 CFR 63.6(g). **(40 CFR 63.4493(c))**

3. If the affected source uses an emission capture system and add-on control device, the permittee shall develop and implement a written startup, shutdown and malfunction plan (SSMP) according to the provisions of 40 CFR 63.6(e)(3). This SSMP must address the startup, shutdown and corrective actions in the event of a malfunction of the emission capture system or the add-on control device. The SSMP must also address any coating operation equipment that may cause increased emissions or that would affect capture efficiency if the process equipment malfunctions, such as conveyors that move parts among enclosures. **(40 CFR 63.4500(c))**

4. Any coating operation(s) using the emission rate with add-on controls option shall be in compliance with the operating limits for emission capture systems and add-on control devices required by 40 CFR 63.4492 at all times except during periods of startup, shutdown, and malfunction. **(40 CFR 63.4500(a)(2)(ii))**

5. Any coating operation(s) using the emission rate with add-on controls option shall be in compliance with the work practice standards in 40 CFR 63.4493 at all times. **(40 CFR 63.4500(a)(2)(iii))**

**IV. DESIGN/EQUIPMENT PARAMETER(S)**

1. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall not operate FG-PPPP unless the Regenerative Thermal Oxidizer and Carbon Adsorber are installed, maintained, and operated in a satisfactory manner. **(40 CFR 63.4492(b))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall determine the mass fraction of organic HAP for each material used, the mass fraction of coating solids for each coating, and the density of each material used in accordance with 40 CFR 63.4541, 40 CFR 63.4551, and/or 40 CFR 63.4561. **(40 CFR 63.4541, 40 CFR 63.4551, 40 CFR 63.4561)**

2. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall conduct each performance test required by 40 CFR 63.4560 according to the requirements in 40 CFR 63.7(e)(1) and under the conditions in 40 CFR 63.4564(a)(1) and (2), unless a waiver of the performance test is obtained in accordance with 40 CFR 63.7(h). **(40 CFR 63.4564(a))**

3. The permittee shall conduct each performance test of an emission capture system and add-on control device to determine capture efficiency and emission destruction or removal efficiency, according to the requirements in 40 CFR 63.4565 and 40 CFR 63.4566. **(40 CFR 63.4564(b))**

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee shall conduct an initial compliance demonstration for the initial compliance period according to the requirements in 40 CFR 63.4541, 40 CFR 63.4551, or 40 CFR 63.4561. The initial compliance period begins on the applicable compliance date specified in 40 CFR 63.4483 and ends on the last day of the 12th month following the compliance date. If the compliance date occurs on any day other than the first of the month, then the compliance period extends through that month plus the next 12 months. **(40 CFR 63.4483, 40 CFR 63.4540,   
40 CFR 63.4550, 40 CFR 63.4560)**

2. The permittee shall keep all records required by 40 CFR 63.4530 in the format and timeframes outlined in 40 CFR 63.4531. **(40 CFR 63.4542(d), 40 CFR 63.4552(d), 40 CFR 63.4563(j))**

3. The permittee shall maintain, at a minimum, the following records for each compliance period:

a. A copy of each notification and report that is submitted to comply with 40 CFR Part 63, Subpart PPPP, and the documentation supporting each notification report. **(40 CFR 63.4530(a))**

b. A current copy of information provided by materials suppliers or manufacturers, such as manufacturer’s formulation data, or test data used to determine the mass fraction of organic HAP and density of each coating, thinner and/or other additive, and cleaning material, and the mass fraction of coating solids for each coating. **(40 CFR 63.4530(b))**

c. A list the coating operations on which each compliance option was used, and the beginning and ending dates and times for each compliance option used. **(40 CFR 63.4530(c)(1))**

d. For the compliant materials option, the calculation of the organic HAP content for each coating, using Equation 1 of 40 CFR 63.4541. **(40 CFR 63.4530(c)(2))**

e. For the emission rate without add-on controls option, the calculation of the total mass of organic HAP emissions for the coatings, thinners and/or additives, and cleaning materials used each month using Equations 1, 1A through 1C and 2 of 40 CFR 63.4551; and, if applicable, the calculation used to determine mass of organic HAP in waste materials according to 40 CFR 63.4551(e)(4); the calculation of the total mass of coating solids used each month using Equation 2 of 40 CFR 63.4551; and the calculation of each 12-month organic HAP emission rate using Equation 3 of 40 CFR 63.4551. **(40 CFR 63.4530(c)(3))**

f. For the emission rate with add-on controls option, the calculations specified in 40 CFR 63.4530(c)(4)(i) through (v). **(40 CFR 63.4530(c)(4))**

g. The name and mass or volume of each coating, thinner and/or other additive, and cleaning material used during each compliance period. If the compliant material option is used for all coatings at the affected source, the permittee may maintain purchase records for each material used rather than a record of the mass used. **(40 CFR 63.4530(d))**

h. The mass fraction of organic HAP for each coating, thinner and/or additive, and cleaning material used during each compliance period. **(40 CFR 63.4530(e))**

i. The mass fraction of coating solids for each coating used during each compliance period. **(40 CFR 63.4530(f))**

j. The information specified in 40 CFR 63.4530(g)(1) through (3), if an allowance is used in Equation 1 of 40 CFR 63.4551 for organic HAP contained in waste materials sent to or designated for shipment to a treatment, storage, and disposal facility (TSDF) according to 40 CFR 63.4551(e)(4). **(40 CFR 63.4530(g))**

k. The date, time, and duration of each deviation. **(40 CFR 63.4530(h))**

l. For the emission rate with add-on controls option, records specified in 40 CFR 63.4530(i)(1) through (8). **(40 CFR 63.4530(i))**

4. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall demonstrate continuous compliance with the operating limits specified in Table 1 to 40 CFR Part 63, Subpart PPPP using the applicable method(s) described below: **(40 CFR 63.4563(c))**

| **Add-on Control Device** | **Operating Limit** | **Continuous Compliance**  **Demonstration Method** |
| --- | --- | --- |
| Thermal oxidizer | a. The average combustion temperature in any 3-hour period must not fall below the combustion temperature limit established according to 40 CFR 63.4567(a). | 1. Collect the combustion temperature data according to 40 CFR 63.4568(c) 2. Reduce the data to 3-hour block averages; and 3. Maintain the 3-hour average combustion temperature at or above the temperature limit. |
| Concentrators, including zeolite wheels and rotary carbon adsorbers | a. The average gas temperature of the desorption concentrate stream in any 3 hour period must not fall below the limit established according to 40 CFR 63.4567(e); and  b. The average pressure drop of the dilute stream across the concentrator in any 3 hour period must not fall below the limit established according to 40 CFR 63.4567(e). | 1. Measure the total regeneration desorbing gas (e.g. steam or nitrogen) mass flow for each regeneration cycle according to 40 CFR 63.4568(d); and 2. Maintain the total regeneration desorbing gas mass flow at or above the mass flow limit. 3. Measure the temperature of the carbon bed after completing each regeneration and any cooling cycle according to 40 CFR 63.4568(d); and 4. Operate the carbon beds such that each carbon bed is not returned to service until completing each regeneration and any cooling cycle until the recorded temperature of the carbon bed is at or below the temperature limit. |
| Emission capture system that is not a PTE according to 40 CFR 63.4565(a). | a. The average gas volumetric flow rate or duct static pressure in each duct between a capture device and add-on control device inlet in any 3-hour period must not fall below the average volumetric flow rate or duct static pressure limit established for that capture device according to 40 CFR 63.4567(f). | 1. Collect the gas volumetric flow rate or duct static pressure for each capture device according to 40 CFR 63.4568(g) 2. Reduce the data to 3-hour block averages; and 3. Maintain the 3-hour average gas volumetric flow rate or duct static pressure for each capture device at or above the gas volumetric flow rate or duct static pressure limit. |

5. For each coating used for the compliant coating option, the permittee shall demonstrate continuous compliance with the emission limit in 40 CFR 63.4490, for each compliance period, using Equation 1 of 40 CFR 63.4541. For each thinner and cleaning material used, the permittee shall determine continuous compliance according to 40 CFR 63.4541(a). **(40 CFR 63.4542)**

6. For any coating operation or group of coating operations using the emission rate without add-on controls option, the permittee shall demonstrate continuous compliance with the applicable organic HAP emission limit in 40 CFR 63.4490, for each compliance period according to 40 CFR 63.4551(a) through (g). **(40 CFR 63.4552)**

7. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall demonstrate continuous compliance with the applicable organic HAP emission limit, for each compliance period according to the procedures in 40 CFR 63.4561. **(40 CFR 63.4563)**

8. During the performance test required by 40 CFR 63.4560, the permittee shall perform the applicable monitoring and recordkeeping in accordance with 40 CFR 63.4567 to establish the emission capture system and add-on control device operating limits required by 40 CFR 63.4492. **(40 CFR 63.4567)**

9. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall install, operate, and maintain each Continuous Parameter Monitoring System (CPMS) according to the requirements of 40 CFR 63.4568(a). If the capture system contains a bypass line, the permittee shall comply with the requirements of 40 CFR 63.4568(b). **(40 CFR 63.4568)**

10. The permittee must apply to the USEPA for approval of alternative monitoring under 40 CFR 63.8(f), if using an add-on control device other than those listed in Table 1 of 40 CFR Part 63, Subpart PPPP, or to monitor an alternative parameter and comply with a different operating limit. **(40 CFR 63.4492(c))**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

4. For the compliant material option, the use of any coating, thinner or cleaning material which does not meet the criteria specified in 40 CFR 63.4542(a) is a deviation that must be reported as specified in 40 CFR 63.4510(c)(6) and 40 CFR 63.4520(a)(5) **(40 CFR 63.4542(b))**

5. For the emission rate without add-on controls, if the organic HAP emission rate for any compliance period exceeds the applicable emission limit specified in 40 CFR 63.4490, the permittee shall report this as a deviation as specified in 40 CFR 63.4510(c)(6) and 40 CFR 63.4520(a)(6). **(40 CFR 63.4552(b))**

6. For the emission rate with add-on controls option, the permittee shall report the following as deviations as specified in 40 CFR 63.4510(c)(6) and 40 CFR 63.4520(a)(7):

a. The organic HAP emission rate for any compliance period exceeds the applicable emission limit specified in 40 CFR 63.4490; **(40 CFR 63.4563(b))**

b. An operating parameter is out of the allowed range; **(40 CFR 63.4563(c)(1))**

c. Any control system by-pass line, for which liquid-liquid material balances are not carried out, is opened; **(40 CFR 63.4563(d))**

d. Deviations from work practice standards occur. **(40 CFR 63.4563(e))**

7. The permittee shall submit the applicable notifications specified in 40 CFR 63.7(b) and (c), 63.8(f)(4) and 63.9(b) through (e) and (h), an initial notification and a notification of compliance status as specified in 40 CFR 63.4510. **(40 CFR Part 63, Subparts A and PPPP)**

8. The permittee shall submit all semiannual compliance reports as required by 40 CFR 63.4520. Each semi-annual compliance report shall identify which coating operation(s) used each compliance option, and if there were no deviations from the emission limitations in 40 CFR 63.4490, include a statement that the coating operations were in compliance. **(40 CFR 63.4520, 40 CFR 63.4542(c), 40 CFR 63.4552(c), 40 CFR 63.4563(f))**

9. For any coating operation(s) using the emission rate with add-on controls option, the permittee shall submit all performance test reports for emission capture systems and add-on control devices. **(40 CFR 63.4520(b))**

10. If the emission rate with add-on controls option is used and a startup, shutdown, or malfunction occurs during the semi-annual reporting period, the permittee shall submit a SSM report as specified in 40 CFR 63.4520(c). **(40 CFR 63.4520(c), 40 CFR 63.10(d))**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

NA

**IX. OTHER REQUIREMENT(S)**

1. The permittee shall comply with all applicable provisions of the National Emission Standards for Hazardous Air Pollutants, as specified in 40 CFR Part 63, Subpart A and Subpart PPPP for Surface Coating of Plastic Parts and Products by the initial compliance date. **(40 CFR Part 63, Subparts A and PPPP)**

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

## FG-COLDCLEANERS

**FLEXIBLE GROUP CONDITIONS**

**DESCRIPTION**

Any cold cleaner that is grandfathered or exempt from Rule 201 pursuant to Rule 278, Rule 278a and Rule 281(2)(h) or Rule 285(2)(r)(iv). Existing cold cleaners were placed into operation prior to July 1, 1979. New cold cleaners were placed into operation on or after July 1, 1979.

**Emission Unit:** EUCOLDCLEANERS

**POLLUTION CONTROL EQUIPMENT**

NA

**I. EMISSION LIMIT(S)**

NA

**II. MATERIAL LIMIT(S)**

1. The permittee shall not use cleaning solvents containing more than five percent by weight of the following halogenated compounds: methylene chloride, perchloroethylene, trichloroethylene, 1,1,1‑trichloroethane, carbon tetrachloride, chloroform, or any combination thereof. **(R 336.1213(2))**

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

1. Cleaned parts shall be drained for no less than 15 seconds or until dripping ceases. **(R 336.1611(2)(b), R 336.1707(3)(b))**

2. The permittee shall perform routine maintenance on each cold cleaner as recommended by the manufacturer. **(R 336.1213(3))**

**IV. DESIGN/EQUIPMENT PARAMETER(S)**

1. The cold cleaner must meet one of the following design requirements:

a. The air/vapor interface of the cold cleaner is no more than ten square feet. **(R 336.1281(2)(h))**

b. The cold cleaner is used for cleaning metal parts and the emissions are released to the general in-plant environment. **(R 336.1285(2)(r)(iv))**

2. The cold cleaner shall be equipped with a device for draining cleaned parts. **(R 336.1611(2)(b), R 336.1707(3)(b))**

3. All new and existing cold cleaners shall be equipped with a cover and the cover shall be closed whenever parts are not being handled in the cold cleaner. **(R 336.1611(2)(a), R 336.1707(3)(a))**

4. The cover of a new cold cleaner shall be mechanically assisted if the Reid vapor pressure of the solvent is more than 0.3 psia or if the solvent is agitated or heated. **(R 336.1707(3)(a))**

5. If the Reid vapor pressure of any solvent used in a new cold cleaner is greater than 0.6 psia; or, if any solvent used in a new cold cleaner is heated above 120  F, then the cold cleaner must comply with at least one of the following provisions:

a. The cold cleaner must be designed such that the ratio of the freeboard height to the width of the cleaner is equal to or greater than 0.7. **(R 336.1707(2)(a))**

b. The solvent bath must be covered with water if the solvent is insoluble and has a specific gravity of more than 1.0. **(R 336.1707(2)(b))**

c. The cold cleaner must be controlled by a carbon adsorption system, condensation system, or other method of equivalent control approved by the AQD. **(R 336.1707(2)(c))**

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

NA

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. For each new cold cleaner in which the solvent is heated, the solvent temperature shall be monitored and recorded at least once each calendar week during routine operating conditions. **(R 336.1213(3))**

2. The permittee shall maintain the following information on file for each cold cleaner: **(R 336.1213(3))**

a. A serial number, model number, or other unique identifier for each cold cleaner.

b. The date the unit was installed, manufactured or that it commenced operation.

c. The air/vapor interface area for any unit claimed to be exempt under Rule 281(2)(h).

d. The applicable Rule 201 exemption.

e. The Reid vapor pressure of each solvent used.

f. If applicable, the option chosen to comply with Rule 707(2).

3. The permittee shall maintain written operating procedures for each cold cleaner. These written procedures shall be posted in an accessible, conspicuous location near each cold cleaner. **(R 336.1611(3), R 336.1707(4))**

4. As noted in Rule 611(2)(c) and Rule 707(3)(c), if applicable, an initial demonstration that the waste solvent is a safety hazard shall be made prior to storage in non-closed containers. If the waste solvent is a safety hazard and is stored in non-closed containers, verification that the waste solvent is disposed of so that not more than 20 percent, by weight, is allowed to evaporate into the atmosphere shall be made on a monthly basis. **(R 336.1213(3), R 336.1611(2)(c), R 336.1707(3)(c))**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semiannual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked or received by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

NA

**IX. OTHER REQUIREMENT(S)**

1. The permittee shall maintain written procedures to demonstrate compliance with the requirements of R 336.1707. Such procedures shall be posted in an accessible, conspicuous location near each machine.2 **(R 336.1707(4))**
2. The permittee may construct, reconstruct, modify, install or commence operation of any new or existing emission units under FGCOLDCLEANERS without modifying the RO Permit providing that it is not defined as a minor or significant modification to the RO Permit, as defined by R 336.1216(2) and R 336.1216(3), respectively, and the following provisions are met:2
3. It is not a major stationary source or major modification as defined in the prevention of significant deterioration regulations in 40 CFR 52.21. **(R 336.1278(a))**
4. It is not a major offset source or a major offset modification as defined in R 336.1113(c) and (b), respectively, for which volatile organic compounds, particulate matter, PM-10, carbon monoxide, nitrogen oxides, sulfur dioxide, or lead is a non-attainment air contaminant. **(R 336.1278(b))**
5. It does not have actual emissions of volatile organic compounds, particulate matter, carbon monoxide, nitrogen oxides, sulfur dioxide, or lead above the significance levels as defined in R 336.1119. **(R 336.1278(c))**
6. It is not a major source as defined in the national emission standards for hazardous air pollutants for source categories, 40 CFR 63.2, and it is subject to the provisions of 40 CFR 63.40 through 63.44. **(R 336.1278(d))**

## FG-BOILER MACT

**FLEXIBLE GROUP CONDITIONS**

**DESCRIPTION**

This Flexible Group establishes the national emission limitations and work practice standards for hazardous air pollutants (HAP) emitted from industrial, commercial, and institutional boilers and process heaters located at major sources of HAP as found in 40 CFR Part 63, Subpart DDDDD.

**Emission Units:** EU-BOILER1, EU-BOILERr2

|  |  |
| --- | --- |
| Equal to or less than 5 MMBTU/hr and only burns gaseous or light liquid fuels | EU-Boiler1, 2.499 MMBTU/hr  EU-Boiler2, 2.499 MMBTU/hr |

**POLLUTION CONTROL EQUIPMENT**

NA

**I. EMISSION LIMIT(S)**

NA

**II. MATERIAL LIMIT(S)**

NA

**III. PROCESS/OPERATIONAL RESTRICTION(S)**

1. The permittee shall conduct the initial tune-up of the Boilers 1, & 2 no later than January 31, 2016, and every five years (no more than 61 months after the previous tune-up) thereafter to demonstrate continuous compliance as specified in 40 CFR 63.7540(a)(10)(i) through (a)(10)(vi). **(40 CFR 63.7510(e), 40 CFR 63.7515(d), 40 CFR 63.7540(a)(12))**

1. As applicable, inspect the burner and clean or replace any components of the burner as necessary. The permittee may perform the burner inspection any time prior to the tune-up or may delay the burner inspection until the next scheduled unit shutdown. At units where entry into a piece of process equipment or into a storage vessel is required to complete the tune-up inspections, inspections are required only during planned entries into the storage vessel or process equipment. **(40 CFR 63.7540(a)(10)(i))**
2. Inspect the flame pattern, as applicable, and adjust the burner as necessary to optimize the flame pattern. The adjustment should be consistent with the manufacturer's specifications, if available. **(40 CFR 63.7540(a)(10)(ii))**
3. Inspect the system controlling the air-to-fuel ratio, as applicable, and ensure that it is correctly calibrated and functioning properly. The permittee may delay the inspection until the next scheduled unit shutdown. **(40 CFR 63.7540(a)(10)(iii))**
4. Optimize total emissions of CO. This optimization should be consistent with the manufacturer's specifications, if available, and with any NOX requirement to which the unit is subject. **(40 CFR 63.7540(a)(10)(iv))**
5. Measure the concentrations in the effluent stream of CO in parts per million, by volume, and oxygen in volume percent, before and after the adjustments are made (measurements may be either on a dry or wet basis, as long as it is the same basis before and after the adjustments are made). Measurements may be taken using a portable CO analyzer. **(40 CFR 63.7540(a)(10)(v))**
6. Maintain on-site and submit, if requested by the Administrator, an annual report containing the information in paragraphs (a)(19)(vi)(A) through (C) of this section.

2. If the unit is not operated on the required date for the tune-up, the tune-up must be conducted within 30 calendar days of startup. **(40 CFR 63.7540(a)(13))**

1. At all times, the permittee must operate and maintain each existing small boiler or process heater, including associated air pollution control equipment and monitoring equipment, in a manner consistent with safety and good air pollution control practices for minimizing emissions. Determination of whether such operation and maintenance procedures are being used will be based on information available to the Administrator that may include, but is not limited to, monitoring results, review of operation and maintenance procedures, review of operation and maintenance records, and inspection of the source. **(40 CFR 63.7500(a)(3))**

**IV. DESIGN/EQUIPMENT PARAMETER(S)**

NA

**V. TESTING/SAMPLING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

NA

**VI. MONITORING/RECORDKEEPING**

Records shall be maintained on file for a period of five years. **(R 336.1213(3)(b)(ii))**

1. The permittee must keep a copy of each notification and report submitted to comply with 40 CFR Part 63, Subpart DDDDD, including all documentation supporting any Initial Notification or Notification of Compliance Status or 2 or 5 year compliance report or one-time energy assessment, as applicable, that the permittee submitted. **(40 CFR 63.7555(a)(1))**
2. The permittee must keep the records in a form suitable and readily available for expeditious review. **(40 CFR 63.7560(a))**
3. The permittee must keep each record for 5 years following the date of each occurrence, measurement, maintenance, corrective action, report, or record. **(40 CFR 63.7560(b))**
4. The permittee must keep each record on site, or they must be accessible from on-site (for example, through a computer network), for at least 2 years after the date of each occurrence, measurement, maintenance, corrective action, report, or record. The permittee can keep the records off site for the remaining 3 years. **(40 CFR 63.7560(c))**

**VII. REPORTING**

1. Prompt reporting of deviations pursuant to General Conditions 21 and 22 of Part A. **(R 336.1213(3)(c)(ii))**

2. Semi-annual reporting of monitoring and deviations pursuant to General Condition 23 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for reporting period July 1 to December 31 and September 15 for reporting period January 1 to June 30. **(R 336.1213(3)(c)(i))**

3. Annual certification of compliance pursuant to General Conditions 19 and 20 of Part A. The report shall be postmarked orreceived by the appropriate AQD District Office by March 15 for the previous calendar year. **(R 336.1213(4)(c))**

1. The permittee must submit boiler or process heater tune-up compliance reports to the appropriate AQD District Office and must be postmarked or submitted by March 15th of the year following the applicable 2 or 5-year period starting from January 1 of the year following the previous tune-up to December 31 (of the latest tune-up year). Compliance reports must also be submitted to EPA using the Compliance and Emissions Data Reporting Interface (CEDRI) which is accessed through the EPA’s Central Data Exchange (CDX) ([www.epa.gov/cdx](http://www.epa.gov/cdx)). If the reporting form is not available in CEDRI at the time the compliance report is due, a hardcopy of the compliance report shall be submitted to EPA Region 5. **(40 CFR 63.7550(b)**, **40 CFR 63.7550(h)(3))**
2. The permittee must include the following information in the compliance report. **(40 CFR 63.7550(c)(1))**
3. Company and Facility name and address. **(40 CFR 63.7550(c)(5)(i))**
4. Process unit information, emissions limitations, and operating parameter limitations.

**(40 CFR 63.7550(c)(5)(ii))**

1. Date of report and beginning and ending dates of the reporting period. **(40 CFR 63.7550(c)(5)(iii))**
2. Include the date of the most recent tune-up for each unit. Include the date of the most recent burner inspection if it was not done biennially or on a 5-year period and was delayed until the next scheduled or unscheduled unit shutdown. **(40 CFR 63.7550(c)(5)(xiv))**
3. Statement by a responsible official with that official's name, title, and signature, certifying the truth, accuracy, and completeness of the content of the report. **(40 CFR 63.7550(c)(5)(xvii))**

**See Appendix 8**

**VIII. STACK/VENT RESTRICTION(S)**

NA

**IX. OTHER REQUIREMENT(S)**

1. The permittee shall comply with all applicable requirements of the National Emission Standards for Hazardous Air Pollutants, as specified in 40 CFR Part 63, Subparts A and DDDDD for Industrial, Commercial, and Institutional Boilers and Process Heaters. **(40 CFR Part 63, Subparts A and DDDDD)**

**Footnotes:**

1 This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

2 This condition is federally enforceable and was established pursuant to Rule 201(1)(a).

# E. NON-APPLICABLE REQUIREMENTS

At the time of the ROP issuance, the AQD has determined that the requirements identified in the table below are not applicable to the specified emission unit(s) and/or flexible group(s). This determination is incorporated into the permit shield provisions set forth in the General Conditions in Part A pursuant to Rule 213(6)(a)(ii).

|  |
| --- |
| **APPENDICES** |

## Appendix 1. Acronyms and Abbreviations

|  |  |  |  |
| --- | --- | --- | --- |
| **Common Acronyms** | | **Pollutant / Measurement Abbreviations** | |
| AQD | Air Quality Division | acfm | Actual cubic feet per minute |
| BACT | Best Available Control Technology | BTU | British Thermal Unit |
| CAA | Clean Air Act | °C | Degrees Celsius |
| CAM | Compliance Assurance Monitoring | CO | Carbon Monoxide |
| CEM | Continuous Emission Monitoring | CO2e | Carbon Dioxide Equivalent |
| CEMS | Continuous Emission Monitoring System | dscf | Dry standard cubic foot |
| CFR | Code of Federal Regulations | dscm | Dry standard cubic meter |
| COM | Continuous Opacity Monitoring | °F | Degrees Fahrenheit |
| Department/  department | Michigan Department of Environment, Great Lakes, and Energy | gr | Grains |
| HAP | Hazardous Air Pollutant |
| EGLE | Michigan Department of Environment, Great Lakes, and Energy | Hg | Mercury |
| hr | Hour |
| EU | Emission Unit | HP | Horsepower |
| FG | Flexible Group | H2S | Hydrogen Sulfide |
| GACS | Gallons of Applied Coating Solids | kW | Kilowatt |
| GC | General Condition | lb | Pound |
| GHGs | Greenhouse Gases | m | Meter |
| HVLP | High Volume Low Pressure\* | mg | Milligram |
| ID | Identification | mm | Millimeter |
| IRSL | Initial Risk Screening Level | MM | Million |
| ITSL | Initial Threshold Screening Level | MW | Megawatts |
| LAER | Lowest Achievable Emission Rate | NMOC | Non-methane Organic Compounds |
| MACT | Maximum Achievable Control Technology | NOx | Oxides of Nitrogen |
| MAERS | Michigan Air Emissions Reporting System | ng | Nanogram |
| MAP | Malfunction Abatement Plan | PM | Particulate Matter |
| MSDS | Material Safety Data Sheet | PM10 | Particulate Matter equal to or less than 10 microns in diameter |
| NA | Not Applicable |
| NAAQS | National Ambient Air Quality Standards | PM2.5 | Particulate Matter equal to or less than 2.5  microns in diameter |
| NESHAP | National Emission Standard for Hazardous Air Pollutants | pph | Pounds per hour |
| ppm | Parts per million |
| NSPS | New Source Performance Standards | ppmv | Parts per million by volume |
| NSR | New Source Review | ppmw | Parts per million by weight |
| PS | Performance Specification | % | Percent |
| PSD | Prevention of Significant Deterioration | psia | Pounds per square inch absolute |
| PTE | Permanent Total Enclosure | psig | Pounds per square inch gauge |
| PTI | Permit to Install | scf | Standard cubic feet |
| RACT | Reasonable Available Control Technology | sec | Seconds |
| ROP | Renewable Operating Permit | SO2 | Sulfur Dioxide |
| SC | Special Condition | TAC | Toxic Air Contaminant |
| SCR | Selective Catalytic Reduction | Temp | Temperature |
| SNCR | Selective Non-Catalytic Reduction | THC | Total Hydrocarbons |
| SRN | State Registration Number | tpy | Tons per year |
| TEQ | Toxicity Equivalence Quotient | µg | Microgram |
| USEPA/EPA | United States Environmental Protection Agency | µm | Micrometer or Micron |
| VOC | Volatile Organic Compounds |
| VE | Visible Emissions | yr | Year |

\*For HVLP applicators, the pressure measured at the gun air cap shall not exceed 10 psig.

## Appendix 2. Schedule of Compliance

The permittee certified in the ROP application that this stationary source is in compliance with all applicable requirements and the permittee shall continue to comply with all terms and conditions of this ROP. A Schedule of Compliance is not required. **(R 336.1213(4)(a), R 336.1119(a)(ii))**

## Appendix 3. Monitoring Requirements

Specific monitoring requirement procedures, methods or specifications are detailed in Part A or the appropriate Source-Wide, Emission Unit and/or Flexible Group Special Conditions. Therefore, this appendix is not applicable.

## Appendix 4. Recordkeeping

Specific recordkeeping requirement formats and procedures are detailed in Part A or the appropriate Source-Wide, Emission Unit and/or Flexible Group Special Conditions. Therefore, this appendix is not applicable.

## Appendix 5. Testing Procedures

There are no specific testing requirement plans or procedures for this ROP. Therefore, this appendix is not applicable.

## Appendix 6. Permits to Install

The following table lists any PTIs issued or ROP revision applications received since the effective date of the previously issued ROP No. MI-ROP-N0802-2015. Those ROP revision applications that are being issued concurrently with this ROP renewal are identified by an asterisk (\*). Those revision applications not listed with an asterisk were processed prior to this renewal.

Source-Wide PTI No MI-PTI-2015 is being reissued as Source-Wide PTI No. MI-PTI-N0802-2020.

|  |  |  |  |
| --- | --- | --- | --- |
| **Permit to Install Number** | **ROP Revision**  **Application Number** | **Description of Equipment or Change** | **Corresponding Emission Unit(s) or**  **Flexible Group(s)** |
| 142-17\* | NA | Spray coating process equipment includes spray booth for plastic and metal parts, two coating applicators, natural gas heater, and the use of acetone for purge solvent. | EU-LN5 |

## Appendix 7. Emission Calculations

**7.1** The permittee shall use the following calculations in conjunction with monitoring, testing or recordkeeping data to determine compliance with the applicable requirements referenced in Tables EU-LN1, EU-LN2, EU-LN3, EU-LN4, EU-LN5, EU-LN2&3, and FG-COATING.

**7.1.1 Calendar Day VOC emissions after control.**

Date:\_\_\_\_\_\_\_\_\_\_

Line no. or emission unit identification:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | A | B | C  SEE NOTE 1 | D  SEE NOTE 2 |  | E | F | G=(C\*D)+(E\*F) |  |  | R | S | K = 1- [(R\*S)/10000] |
| COATING  IDENTITY | GALLONS OF COATING USED AS RECEIVED WITH WATER | COATING DENSITY | GALLONS OF COATING USED MINUS WATER | LBS OF VOC PER GAL OF COATING MINUS WATER | REDUCER OR PURGE SOLVENT  IDENTITY | GAL OF REDUCER  USED OR PURGE SOLVENT NOT RECLAIMED | LBS OF VOC PER GAL OF REDUCER OR PURGE SOLVENT | LBS OF VOC |  |  | Percent  Capture Efficiency | Percent Destruction Efficiency | CONTROL FACTOR |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| TOTAL UNCONTROLLED LBS VOC, **H** = SUM OF ALL G’s | H |  |  |

|  |  |
| --- | --- |
| CONTROLLED EMISSIONS (lbs), **J** = H x K \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |  |

|  |  |
| --- | --- |
| **Limit, Pounds VOC emitted per calendar day \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_** |  |

NOTES:

1. C = 

2. D =  or D = 

3. Column R and S will apply for only basecoat booths ofEU-LN3**7.1.2 Monthly and 12 month rolling VOC emission after control.**

12-Month Period:\_\_\_\_\_\_\_\_\_\_\_\_\_\_ to\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Line no. or emission unit identification:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | A | B | C  SEE NOTE 1 | D  SEE NOTE 2 |  | E | F | G=(C\*D)+(E\*F) |  |  | R | S | K = 1- [(R\*S)/10000] |
| COATING | GALLONS OF COATING USED AS RECEIVED WITH WATER | COATING DENSITY | GALLONS OF COATING USED MINUS WATER | LBS OF VOC PER GAL OF COATING MINUS WATER | REDUCER OR PURGE SOLVENT | GAL OF REDUCER USED OR PURGE SOLVENT NOT RECOVERED | LBS OF VOC PER GAL OF REDUCER OR PURGE SOLVENT | LBS OF VOC |  |  | Percent  Capture Efficiency | Percent Destruction Efficiency | CONTROL FACTOR |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| TOTAL UNCONTROLLED LBS VOC, **H** = SUM OF ALL G’s | H |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| LBS CONTROLLED EMISSIONS, **J** = H x K | J |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| Tons VOC’s emitted this month N = J/2000 | N |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| Tons VOC’s emitted 11 previous months = P | P |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| Tons emitted 12-month rolling period =Q **Q may = T or be < T** | Q |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **Limit, tons emitted 12-month rolling period = T** | T |  |  |

NOTES:

1. C = 

2. D =  or D = 

3. Column R and S will apply for only basecoat booths of EU-LN3.

**7.1.3** The Material Safety Data Sheet (MSDS) and Technical Data Sheet should contain the information pertaining to the coating VOC content, pounds VOC/gallon of coating, minus water.

If it is not given, then calculate the coating VOC content, pounds VOC/gallon of coating (minus water, as received), **G**, from the pounds VOC/gallon of coating (with water, as received), **F**.

If volume fraction of water, **V**, is given, then

**G** = **F/(**1-**V**)

Where **F** = Coating VOC content, pounds VOC/gallon of coating (with water, as received)

**V** = Volume fraction of water

If weight fraction of water, **W**,is given, then, convert **W** to **V** by

**V** = **WPc**,**/Pw**

Where **Pw** = Density of water, 8.34 pounds per gallon

**Pc** = Density of coating, pounds per gallon

If no solvent reduction is done, or the coating is reduced with water, then the coating VOC content, minus water, as received = coating VOC content, minus water, as applied.

**7.1.4** To calculate coating VOC content of reduced coating, pounds VOC/gallon of coating (minus water, as applied), **X**,

if the coating is reduced by a solvent, use the following equation:

**X** = **(1-V)LM + NQ**

**(1-V)L + N**

Where **V** = Volume fraction of water

**L** = Gallons of coating

**M** = Coating VOC content, pounds VOC/gallon of coating (minus water)

**N** = Gallons of solvent reducer

**Q** = Density of solvent reducer, pounds/gallon

**7.1.5** For each coating line and for each coating category, calculate the 24-hour volume weighted average of the VOC content of all coatings, pounds of VOC/gallon of coating, minus water, as applied, **R**, by using the following equation:

**R** = **J1 K1 + J2 K2 + J3 K3 .................**

**K1 + K2 + K3.....................................**

where **J** = coating VOC content, minus water, as applied

**K** = gallons of coating, minus water, applied during the calendar day averaging period

## Appendix 8. Reporting

**A. Annual and Deviation Certification Reporting**

The permittee shall use the EGLE, AQD, Report Certification form (EQP 5736) and EGLE, AQD, Deviation Report form (EQP 5737) for the annual, semiannual and deviation certification reporting referenced in the Reporting Section of the Source-Wide, Emission Unit and/or Flexible Group Special Conditions. Alternative formats must meet the provisions of Rule 213(4)(c) and Rule 213(3)(c)(i), respectively, and be approved by the AQD District Supervisor.

**B. Other Reporting**

Specific reporting requirement formats and procedures are detailed in Part A or the appropriate Source-Wide, Emission Unit and/or Flexible Group Special Conditions. Therefore, Part B of this appendix is not applicable.