

November 20, 2023

Mr. Chris Carlson, Regional EHS Manager Steelscape, LLC 222 W. Kalama River Road Kalama, WA 98625

#### Final Air Discharge Permit for New Solvent Recycling System Subject:

Dear Mr. Carlson:

The public comment period for the preliminary determination to issue Air Discharge Permit 23-3606 (ADP 23-3606) in response to ADP Application CO-1079 concluded on November 11, 2023. The Southwest Clean Air Agency (SWCAA) did not receive any adverse comments from the public relative to the preliminary determination. Therefore, a final determination to issue ADP 23-3606 has been made pursuant to Section 400-110(4) of SWCAA's General Regulations for Air Pollution Sources. Electronic copies of ADP 23-3606 and the associated Technical Support Document are available for public review in the permit section of SWCAA's internet home page (http://www.swcleanair.gov/permits/adpfinal.asp). Original copies are enclosed for your files.

This Air Discharge Permit may be appealed directly to the Pollution Control Hearings Board (PCHB) within 30 days of receipt as provided in RCW 43.21B.

If you have any comments, or desire additional information, please contact me or Wess Safford at (360) 574-3058, extension 126.

Sincerely, Uri Papish

Executive Director

UP:wls

Enclosure - Air Discharge Permit 23-3606 and Technical Support Document



### **AIR DISCHARGE PERMIT** 23-3606

Issued: November 20, 2023

Steelscape, LLC 222 W. Kalama River Road, Kalama, WA 98625

SWCAA ID - 1947



**REVIEWED BY:** 

TIN

Clinton Lamoreaux, Chief Engineer

Uri Papish, Executive Director

APPROVED BY:

## **TABLE OF CONTENTS**

Section	<u>Page</u>
1. Equipment/Activity Identification	1
2. Approval Conditions	1
Emission Limits	1
Operating Limits and Requirements	5
Monitoring and Recordkeeping Requirements	7
Emission Monitoring and Testing Requirements	9
Reporting Requirements	10
3. General Provisions	12

Appendix A	Emission Testing Requirements – Paint Line Thermal Oxidizer
Appendix B	Emission Testing Requirements – Process Boilers A and B
Appendix C	Emission Testing Requirements – General Equipment
Appendix D	Emission Monitoring Requirements – Paint Line Thermal Oxidizer

## 1. Equipment/Activity Identification

ID No.	Equipment/Activity	Control Measure/Equipment
1	Pickle Line	Wet Scrubber
2	Cold Rolling Mill	Mist Eliminator
3	Roll Texturing Operation	Fabric Filtration
4	Process Boiler - A	Low Emission Burner w/FGR, Low Sulfur Fuel (Nat Gas)
5	Process Boiler - B	Low Emission Burner w/FGR Low Sulfur Fuel (Nat Gas)
6	Metal Coating Line Cleaning Equipment	Wet Scrubber
7	Metal Coating Line Furnace	Oxygen Deficient Combustion
8	Metal Coating Line Launder Heater	N/A
10	Metal Coating Line Roll Coaters A and B	Low VOC Coatings, Mist Eliminator, HEPA filtration
11	Paint Line Cleaning System	Wet Scrubber
12	Paint Line Pretreatment Process	Mist Eliminator
13	Paint Line Coating Rooms/Curing Ovens	Regenerative Thermal Oxidizer
14	Electrostatic Oiler System	N/A
15	Ink Branding	N/A
16	Emergency Generator	Low Sulfur Diesel / Limited Operation
17	Paint Mixing Station	N/A
18	Solvent Recycling System	Process Enclosure, Condenser

## 2. Approval Conditions

The following tables detail the specific requirements of this Permit. In addition to the requirements listed below, equipment at this facility may be subject to other federal, state, and local regulations. The permit requirement number is identified in the left-hand column. The text of the permit requirement is contained in the middle column. The emission unit, equipment, or activity to which the permit requirement applies is listed in the right-hand column.

ADP 23-3606 supersedes ADP 13-3070 in its entirety.

#### **Emission Limits**

Req. No.	Emission Limits	Equipment/ Activity ID No.
1.	Facility-wide HAP emissions must not individually exceed 9.5 tpy, nor collectively exceed 24.5 tpy. Compliance with this emission limit must be determined by summing total emissions for successive 12 consecutive month periods rolled in monthly increments.	1-8, 10-18

Req. No.	Emission Limits	Equipment/ Activity ID No.
2.	Emissions from the Pickle Line Scrubber (S1) must not exceed:PollutantEmissionsPM0.61 tpyPM100.58 tpyPM2.50.48 tpyHCl0.61 tpy, 0.14 lb/hr (1-hr avg)	1
3.	Emissions from the Cold Rolling Mill Mist Eliminator (S3) must not exceed:PollutantEmissionsPM $8.41$ tpy, $1.92$ lb/hr (1-hr avg)PM10 $7.91$ tpyPM2.5 $6.56$ tpy	2
4.	PM emissions from the Roll Texturing Baghouse (I1) must not exceed 0.03 tpy.PollutantEmissionsPM/PM100.03 tpyPM2.50.02 tpyAnnual emissions must be calculated using actual hours of operation consistent with Section 6 of the Technical Support Document for this Permit.	3
5.	Combined emissions from Process Boilers A and B (S4) must not exceed:PollutantEmissionsNOx8.62 tpy, 30 ppmvd @ 3% O2 (1 hr avg)CO8.62 tpy, 50 ppmvd @ 3% O2 (1 hr avg)PM/PM10/PM2.51.64 tpyVOC1.19 tpyAnnual emissions must be calculated from actual fuel consumption and applicableemissions factors consistent with Section 6 of the Technical Support Document forthis Permit. Emission factors for NOx, CO and PM must be derived from the mostrecent emission test data.	4-5
6.	Emissions from the Metal Coating Line Cleaning Scrubber (S5) must not exceed:PollutantEmissions $PM/PM_{10}$ 0.13 tpy $PM_{2.5}$ 0.10 tpy $NaOH$ 0.13 tpyAnnual emissions must be calculated using the most recent emission test data and actual hours of operation.	6

Req. No.	Emission Limits	Equipment/ Activity ID No.
7.	Emissions from the Metal Coating Line Furnace (S6) must not exceed:PollutantEmissions $NO_X$ 17.46 tpy, 106 ppmvd @ 3% O2 $CO$ 7.81 tpy, 78 ppmvd @ 3% O2 $PM/PM_{10}/PM_{2.5}$ 2.40 tpy, 0.005 gr/dscf $VOC$ 0.42 tpy $SO_2$ 0.09 tpy	7
8.	Emissions from the Metal Coating Line Launder Heater (R1) must not exceed:         Pollutant       Emissions         NOx       0.20 tpy         CO       0.15 tpy         PM/PM10/PM2.5       0.02 tpy         Annual emissions must be calculated using actual fuel consumption consistent with Section 6 of the Technical Support Document for this Permit.	8
9.	Emissions from the Metal Coating Line Roll Coater Mist Eliminator (S8) must not exceed:         Pollutant       Emissions         VOC       8.50 tpy         HAPs (combined)       6.10 tpy         Chromium (Cr[VI])       0.087 lb/yr, 9.9x10 <sup>-6</sup> lb/hr         Annual emissions of VOC and HAPs must be calculated via material balance based on coating chemical content and actual coating consumption. Annual emissions of Cr[VI] must be calculated using the most recent emission test results and actual hours of operation.	10
10.	Emissions from the Paint Line Cleaning Scrubber (S9a) must not exceed:         Pollutant       Emissions         PM       0.22 tpy         PM10       0.21 tpy         PM2.5       0.17 tpy         KOH       0.07 tpy         Annual emissions must be calculated using the most recent emission test results and actual hours of operation.	11

Req. No.	Emission Limits	Equipment/ Activity ID No.
11.	Emissions from the Roll-on Pretreatment Mist Eliminator (S9b) must not exceed:         Pollutant       Emissions         NOx       0.54 tpy         CO       0.91 tpy         PM/PM <sub>10</sub> /PM <sub>2.5</sub> 0.44 tpy, 0.10 lb/hr (1-hr avg)         Chromium (Cr[VI])       0.108 lb/yr, 1.23 x 10 <sup>-5</sup> lb/hr (1-hr avg)         Annual emissions of PM and Cr[VI] must be calculated using the most recent emission test results and actual hours of operation. Annual emissions of NOx, CO and VOC must be calculated using emission factors from actual fuel consumption consistent with Section 6 of the Technical Support Document for this Permit.	12
12.	Emissions from the Paint Line Thermal Oxidizer (S10) must not exceed:         Pollutant       Emissions         NOx       39.0 tpy, 8.9 lb/hr (1-hr avg)         CO       11.0 tpy, 2.5 lb/hr (1-hr avg)         PM/PM10/PM2.5       2.1 tpy         VOCtotal       25.0 tpy         Formaldehyde       100 lb/yr         Annual emissions from natural gas combustion must be calculated using actual fuel consumption consistent with the methodology in Section 6 of the Technical Support Document for this Permit. Annual emissions of total PM must be calculated using emission test results dated January 19, 2000 and actual hours of operation. Annual emissions of VOC, HAPs and TAPs from coating application must be calculated via material balance using the most recently tested destruction efficiency, coating VOC content and actual coating consumption.	13
13.	VOC emissions from the Electrostatic Oiler System must not exceed 1.50 tpy. Annual emissions must be calculated via material balance from actual oil consumption consistent with Section 6 of the Technical Support Document for this Permit.	14
14.	Combined VOC emissions from ink brander operation must not exceed 0.74 tpy. Annual emissions must be calculated via material balance from actual ink consumption consistent with Section 6 of the Technical Support Document for this Permit.	15
15.	Emissions from the Emergency Generator must not exceed:PollutantEmissions $NO_X$ $5.14$ tpy $CO$ $0.24$ tpy $PM/PM_{10}/PM_{2.5}$ $0.03$ tpyAnnual emissions must be calculated using applicable emission factors and actual hours of operation consistent with Section 6 of the Technical Support Document for this Permit.	16
16.	VOC emissions from paint mixing operations must not exceed 0.40 tpy.	17

Req. No.	Emission Limits	Equipment/ Activity ID No.
17.	VOC emissions from operation of the Solvent Recycling System must not exceed 0.15 tpy.	18
18.	Visible emissions from all emission points except the Cold Rolling Mill Mist Eliminator (S3) and Emergency Generator must not exceed 0% opacity for more than 3 minutes in any one hour period as determined by a Certified Observer certified in accordance with SWCAA Method 9 "Visible Opacity Determination Method" (SWCAA 400 Appendix A).	1, 3-8, 10-15, 17-18
19.	Visible emissions from the Cold Rolling Mill Mist Eliminator (S3) must not exceed 20% opacity for more than 3 minutes in any one hour period as determined by a Certified Observer certified in accordance with SWCAA Method 9 "Visible Opacity Determination Method" (SWCAA 400 Appendix A).	2
20.	Visible emissions from the Emergency Generator must not exceed the values listed below for more than 3 minutes in any one hour period as determined by a Certified Observer in accordance with SWCAA Method 9.         Operating Mode       Opacity Limit         Regular Operation       5%         Cold Start-up       20%	16
	Cold start-up is defined as the time it takes the engine to attain normal operating temperature or 15 minutes from initial start-up, whichever is less.	

#### **Operating Limits and Requirements**

Req. No.	<b>Operating Limits and Requirements</b>	Equipment/ Activity ID No.
21.	Reasonable precautions must be taken at all times to prevent and minimize fugitive emissions from plant operations.	Facility-wide
22.	The Permittee must use recognized good practice and procedures to reduce odors to a reasonable minimum.	Facility-wide
23.	Open containers for storage, transfer or disposal of VOC containing materials are prohibited. All containers for materials containing VOCs must be kept securely closed with a lid in place except when materials are being added, mixed or removed. In addition, all VOC containing materials that are used to clean and/or flush spray equipment or lines during clean up must be collected in a closed container.	Facility-wide
24.	Each pollution control device/measure must be in use whenever the associated production equipment is in operation. Control devices must be operated and maintained in accordance with the manufacturer's specifications and operated in a manner that minimizes emissions.	1-8, 10-18

Req. No.	<b>Operating Limits and Requirements</b>	Equipment/ Activity ID No.
25.	Emission units identified in this Permit must be maintained and operated in total and continuous conformity with the conditions identified in this Permit. SWCAA reserves the right to take any and all appropriate action to maintain the conditions of this Permit, including directing the facility to cease operations until corrective action can be completed.	1-8, 10-18
26.	The Pickle Line Scrubber water spray must be operated whenever steel is being cleaned or the HCl rinse station is in use.	1
27.	The oil mist elimination system must be operated whenever the Cold Rolling Mill is in operation.	2
28.	Process Boilers A and B must be fired on natural gas only.	4-5
29.	The Metal Coating Line Cleaning Scrubber must operate whenever alkali cleaning occurs or rotary brushes are in service.	6
30.	The Metal Coating Line Furnace must be fired on natural gas only.	7
31.	The exit temperature of Metal Coating Line Furnace exhaust gases must not exceed 2,150°F at 60% load.	7
32.	The Metal Coating Line Launder Heaters must be fired on natural gas only.	8
33.	The Metal Coating Line roll coaters must not be heated or air sparged.	10
34.	The VOC content of coatings used in Roll Coaters A and B must not exceed 0.28 kg/L (2.34 lb/gallon) of coating solids applied for each calendar month as specified in 40 CFR 60.462(a)(1).	10
35.	The Metal Coating Line Roll Coater Mist Eliminator must be operated whenever Roll Coaters A or B are in use.	10
36.	The interior temperature of the Metal Coating Line curing ovens must not exceed 300°F.	10
37.	The Paint Line Cleaning Scrubber must be operated whenever alkali mist solution is sprayed on steel coil.	11
38.	The Roll-on Pretreatment Mist Eliminator must be operated whenever the roll-on pretreatment process is in service.	12
39.	The Roll-on Pretreatment Oven must be fired on natural gas only.	12
40.	The Paint Line Thermal Oxidizer must be operated whenever the paint line is in use. All exhaust gases from the paint rooms and curing ovens must be routed through the thermal oxidizer prior to ambient discharge.	13
41.	The VOC destruction efficiency of the Paint Line Thermal Oxidizer must not be less than 90% calculated in accordance with 40 CFR 60.463(c)(2).	13
42.	Supplemental fuel for the Paint Line Thermal Oxidizer must be natural gas only.	13
43.	Combustion dwell chamber temperature in the Paint Line Thermal Oxidizer must be maintained at 1,400°F or greater while in regular operation.	13

Req. No.	Operating Limits and Re	quirements	Equipment/ Activity ID No.
44.	The Paint Line primer and finish coating roll coater	s must not be heated or air sparged.	13
45.	Oil usage in the Electrostatic Oiler must not exceed	d 6,800 gal/yr.	14
46.	Combined ink consumption in ink branding operat	ions must not exceed 225 gal/yr.	15
47.	The Emergency Generator must only be fired on # 0.0015% by weight or less.	2 distillate oil with a sulfur content	16
48.	Operation of the Emergency Generator Engine checks, readiness testing, and as necessary to pro- of the Emergency Generator Engine for mainter must not exceed 100 hours per year. Emerge generator engine is not limited. A nonresettable t used to measure the number of hours the engine of	vide emergency power. Operation hance checks and readiness testing ncy operation of the emergency ime totalizer must be installed and	16
49.	The Solvent Recycling System must be operated in accordance with manufacturer's specifications.		18
50.	Exhaust gases from all emission points must be vertically oriented. Rain protection caps which inhibit the vertical discharge of air contaminants are prohibited. The vertical orientation requirement does not apply to fugitive emission points.		1-8, 10-13
51.	Exhaust gases from the emission points identified above, the specified height. <u>Emission Point</u> Pickle Line Scrubber (S1) Cold Rolling Mill Mist Eliminator (S3) Process Boilers A and B (S4) Metal Coating Line Cleaning Scrubber (S5) Metal Coating Line Furnace (S6) Metal Coating Line Launder Heater (R1) Roll Coater Mist Eliminator (S8) Paint Line Cleaning Scrubber (S9a) Roll-on Pretreatment Mist Eliminator (S9b) Paint Line Thermal Oxidizer (S10)	d below must be discharged at, or <u>Minimum Discharge Height</u> 100' above ground level 89.6' above ground level 46' above ground level 109' above ground level 111' above ground level 110' above ground level 3' above modeled roof height 100' above ground level 100' above ground level 100' above ground level 100' above ground level	1-8, 10-13

## Monitoring and Recordkeeping Requirements

Req. No.	Monitoring and Recordkeeping Requirements	Equipment/ Activity ID No.
52.	All air quality related complaints, including odor complaints, received by the Permittee and the results of any subsequent investigation or corrective action must be recorded for each occurrence.	Facility-wide
53.	With the exception of data logged by a computerized data acquisition system, each record required by this Permit must include the date and the name of the person making the record entry. If a control device or process is not operating during a specific time period, a record must be made to that effect.	1-8, 10-18

Req. No.	Monitoring and Recordkeeping Requirements	Equipment/ Activity ID No.
54.	All records required by this Permit must be kept for a minimum period of no less than five years and must be maintained in a form readily available for inspection by SWCAA representatives.	1-8, 10-18
55.	Excess emissions and upset conditions must be recorded for each occurrence.	1-8, 10-18
56.	<ul> <li>Pickle line scrubber operation must be monitored and recorded as follows:</li> <li>(a) Differential pressure across all sieve plates must be monitored continuously and recorded for each stage daily; and</li> <li>(b) Flow rate of scrubber water must be monitored continuously and recorded daily.</li> </ul>	1
57.	Differential pressure across the cold rolling mill mist eliminator must be monitored continuously and recorded daily.	2
58.	Hours of operation for the Roll Texturing Baghouse must be recorded semi-annually by March 15 and September 15 for the previous six month periods from July through December and January through June, respectively.	3
59.	Natural gas consumption by Process Boilers A and B must be recorded monthly for each unit.       4-4	
60.	Operation of the Metal Coating Line Cleaning Scrubber must be monitored and recorded as follows:       6         (a) Differential pressure across the scrubber must be monitored continuously and recorded daily; and       6         (b) Scrubber water flowrate must be monitored continuously and recorded daily.       6	
61.	Natural gas consumption by the Metal Coating Line Furnace must be recorded monthly.	7
62.	Natural gas consumption by the Metal Coating Line Launder Heater must be recorded monthly.	8
63.	<ul> <li>Operation of Roll Coaters A and B must be monitored and recorded as follows:</li> <li>(a) Coating consumption by the roll coaters must be recorded monthly as specified in 40 CFR 60.463(c)(1);</li> <li>(b) Chromic acid consumption by the roll coaters must be recorded quarterly; and</li> <li>(c) Volume-weighted average VOC emissions per unit volume of coating solids applied from roll coaters A and B must be calculated and recorded monthly in accordance with 40 CFR 60.463(c)(1) for each month in which VOC containing coatings are applied.</li> </ul>	10
64.	Operation of the Paint Line Cleaning Scrubber must be monitored and recorded as follows: (a) Differential pressure must be monitored continuously and recorded daily; and (b) Scrubber water flowrate must be monitored continuously and recorded daily.	11

Req. No.	Monitoring and Recordkeeping Requirements	Equipment/ Activity ID No.
65.	<ul> <li>Operation of the Roll-on Pretreatment process must be monitored and recorded as follows:</li> <li>(a) Natural gas consumption in the Roll-on Pretreatment Oven must be recorded monthly;</li> <li>(b) Differential pressure across the Roll-on Pretreatment Mist Eliminator must be monitored continuously and recorded daily; and</li> <li>(c) Chromic acid consumption in the Roll-on Pretreatment process must be recorded quarterly.</li> </ul>	12
66.	<ul> <li>Operation of the Paint Line must be monitored and recorded as follows:</li> <li>(a) Natural gas consumption by the Paint Line curing ovens and thermal oxidizer must be recorded monthly; and</li> <li>(b) Thermal oxidizer combustion dwell chamber temperature must be monitored continuously and recorded daily.</li> </ul>	13
67.	The quantity and type of coatings consumed in the Paint Line must be recorded monthly. Purchase receipts and Material Safety Data Sheets (MSDS) for all coatings that contain VOC, TAPs, and/or HAPs must be maintained onsite.	13
68.	Oil usage in the Electrostatic Oiler System must be recorded semi-annually.	14
69.	Ink consumption in coil branding processes must be recorded semi-annually.	15
70.	Emergency Generator hours of operation must be recorded semi-annually.	16
71.	Material throughput in the paint mixing station must be recorded semi-annually.	17
72.	The quantity and type of waste material processed in the Solvent Recycling System must be recorded monthly.	18

## **Emission Monitoring and Testing Requirements**

Req. No.	Emission Monitoring and Testing Requirements	Equipment/ Activity ID No.
73.	Emission testing of the Paint Line Thermal Oxidizer (S10) must be conducted no later than the end of March 2012. Subsequent emission testing must be conducted every (2) years thereafter, no later than the end of March of the year in which testing is due. All emission testing must be conducted in accordance with Appendix A of this Permit.	13
74.	Emission monitoring of the Paint Line Thermal Oxidizer (S10) must be conducted on a monthly basis. Emission evaluations must be conducted in accordance with Appendix D of this Permit.	13
75.	Emission testing of Process Boilers A and B at the common exhaust stack (S4) must be conducted no later than the end of March 2028. Subsequent emission testing must be conducted every (5) years thereafter, no later than the end of March of the year in which testing is due. All emission testing must be conducted in accordance with Appendix B of this Permit.	4-5

Req. No.	Emission Monitoring and Testing Requirements	Equipment/ Activity ID No.
76.	Emission testing of the Pickle Line Scrubber (S1) must be conducted upon installation and every (5) years thereafter. All emission testing must be conducted in accordance with Appendix C of this Permit.	1
77.	<ul> <li>Emission testing of the units specified below must be conducted upon installation and every (10) years thereafter. All emission testing must be conducted in accordance with Appendix C of this Permit.</li> <li>(a) Cold Rolling Mill Mist Eliminator (S3);</li> <li>(b) Metal Coating Line Cleaning Scrubber (S5);</li> <li>(c) Metal Coating Line Furnace (S6);</li> <li>(d) Metal Coating Line Roll Coater Mist Eliminator (S8);</li> <li>(e) Paint Line Cleaning Scrubber (S9a); and</li> <li>(f) Roll-on Pretreatment Mist Eliminator (S9b).</li> </ul>	2, 6-7, 10-12

## **Reporting Requirements**

Req. No.	Reporting Requirements	Equipment/ Activity ID No.
78.	<ul> <li>All air quality related complaints received by the Permittee must be reported to SWCAA within three days of receipt. Complaint reports must include the following information:</li> <li>(a) Date and time of the complaint;</li> <li>(b) Name of the complainant;</li> <li>(c) Nature of the complaint; and</li> <li>(d) Description of corrective action taken in response to complaint (if any).</li> </ul>	Facility-wide
79.	<ul> <li>The Permittee must notify SWCAA at least seven calendar days in advance of the use of any new material, which results in the emission of toxic or hazardous air pollutants not previously permitted. In response to the notification, SWCAA may require that a written report be submitted with the following: <ul> <li>(a) A description of the proposed change(s) in materials with an SDS for each new material,</li> <li>(b) The date the change(s) is (are) to be made,</li> <li>(c) The change(s) in emissions of VOCs, TAPs, or HAPs occurring as a result of the change, and</li> <li>(d) A summary of any applicable requirement(s) that would apply as a result of the change(s).</li> </ul> </li> <li>If the proposed emission rate of a new TAP exceeds the applicable SQER and/or other emission limits established by this Permit or otherwise circumvents an applicable requirement, New Source Review may be required prior to making the proposed change.</li> </ul>	Facility-wide
80.	Upset conditions must be reported to SWCAA as soon as possible after discovery. The Permittee may provide notification to SWCAA via telephone. A message may be left on the answering machine for upset conditions that occur outside of normal business hours.	1-8, 10-18

Req. No.	Reporting Requirements	Equipment/ Activity ID No.
81.	<ul> <li>Excess emissions must be reported to SWCAA as follows:</li> <li>(a) As soon as possible, but no later than 12 hours after discovery for emissions that represent a potential threat to human health or safety;</li> <li>(b) As soon as possible, but no later than 48 hours after discovery for emissions which the Permittee wishes to claim as unavoidable pursuant to SWCAA 400-107; and</li> <li>(c) No later than 30 days after the end of the month of discovery for all other excess emissions.</li> </ul>	1-8, 10-18
82.	An annual emissions inventory report must be submitted by March 15 in accordance with SWCAA 400-105(1).	1-8, 10-18
83.	A summary of facility-wide emissions and all supporting calculations must be reported to SWCAA semi-annually by March 15 and September 15 for the previous six month periods from July through December and January through June, respectively.	1-8, 10-18
84.	Facility-wide consumption of coating products that contain VOC, TAPs or HAPs must be reported to SWCAA semi-annually by September 15 and March 15 for the previous six month period January through June and July through December, respectively.	1-8, 10-18
85.	Pursuant to 40 CFR 60.465(c), the Permittee must report quarterly to EPA Region X and SWCAA each instance in which volume-weighted average VOC emissions from the metal coating line roll coater exceed 0.28 kg/L (2.34 lb/gallon). Quarterly reports are due within 30 days of the end of each calendar quarter. If no such instance occurred, this fact must be reported semi-annually to EPA Region X and SWCAA. Semi-annual reports are due by March 15 and September 15 for the previous six month periods from July through December and January through June, respectively.	10
86.	Pursuant to 40 CFR 60.465(d), the Permittee must report semi-annually to EPA Region X Administrator and SWCAA each instance, in excess of three hours, when the paint line thermal oxidizer combustion temperature remains more than 50°F below the temperature at which compliance was demonstrated. If no such instance occurred, this fact must be stated in the report. Semi-annual reports are due by March 15 and September 15 for the previous six month periods from July through December and January through June, respectively.	13
87.	Emission test results must be reported to SWCAA in writing within 45 days of test completion.	1-2, 4-7, 10-13
88.	Emission monitoring results must be reported to SWCAA by March 15 and September 15 for the previous six month periods from July through December and January through June, respectively.	13

# 3. General Provisions

Req. No.	General Provisions
A.	For the purpose of ensuring compliance with this Permit, duly authorized representatives of the Southwest Clean Air Agency must be permitted access to the Permittee's premises and the facilities being constructed, owned, operated and/or maintained by the Permittee for the purpose of inspecting said facilities. These inspections are required to determine the status of compliance with this Permit and applicable regulations and to perform or require such tests as may be deemed necessary.
B.	The provisions, terms, and conditions of this Permit bind the Permittee, its officers, directors, agents, servants, employees, successors and assigns, and all persons, firms, and corporations acting under or for the Permittee.
C.	The requirements of this Permit survive any transfer of ownership of the source or any portion thereof.
D.	This Permit must be posted conspicuously at or be readily available near the source.
E.	This Permit will be invalidated, in whole or in part, if construction or installation of any new or modified equipment has not commenced within eighteen (18) months from date of issuance, if construction is discontinued for a period of eighteen (18) months or more without prior SWCAA approval, or if construction is not completed within a reasonable time.
F.	This Permit does not supersede requirements of other agencies with jurisdiction and further, this Permit does not relieve the Permittee of any requirements of any other governmental agency. In addition to this Permit, the Permittee may be required to obtain permits or approvals from other agencies with jurisdiction.
G.	Compliance with the terms of this Permit does not relieve the Permittee from the responsibility of compliance with SWCAA General Regulations for Air Pollution Sources, previously issued Regulatory Orders, RCW 70A.15, Title 173 WAC or any other applicable emission control requirements, nor from the resulting liabilities and/or legal remedies for failure to comply.
Н.	If any provision of this Permit is held to be invalid, all unaffected provisions of the Permit will remain in effect and be enforceable.
I.	No change in this Permit will be made or be effective except as may be specifically set forth by written order of the Southwest Clean Air Agency upon written application by the Permittee for the relief sought.
J.	The Southwest Clean Air Agency may, in accordance with RCW 70A.15, impose such conditions as are reasonably necessary to assure the maintenance of compliance with the terms of this Permit, the Washington Clean Air Act, and the applicable rules and regulations adopted under the Washington Clean Air Act.

## Appendix A Emission Testing Requirements Paint Line Thermal Oxidizer

#### 1. Introduction:

The purpose of this testing is to quantify emissions from the Paint Line Thermal Oxidizer, and demonstrate compliance with the requirements of this Permit and applicable air quality regulations.

#### 2. Testing Requirements:

- a. **Test plan.** A comprehensive test plan shall be submitted to SWCAA for review and approval at least 10 business days prior to each test. SWCAA personnel shall be informed at least five business days prior to testing so that a representative may be present during testing.
- b. **Testing schedule.** Emission testing shall be conducted no later than March 2012. Subsequent emission tests shall be conducted every (2) years thereafter, no later than the end of March of the year in which testing is due.
- c. **Process points to be tested.** Emission testing shall be conducted at the following process points:
  - (1) Exhaust stack of the thermal oxidizer (S10) for all constituents; and
  - (2) Inlet plenum of the thermal oxidizer for flowrate, temperature, moisture content, O<sub>2</sub> and CO<sub>2</sub> content, and VOC.
- d. **Test runs/Reference test methods.** A minimum of three (3) test runs shall be performed for each constituent to ensure the data are representative. Compliance shall be demonstrated by averaging the results of the individual sampling runs.

<u>Constituent</u> Stack gas flowrate, temperature O <sub>2</sub> , CO <sub>2</sub> content Stack gas moisture content NO <sub>x</sub> CO	Reference Test Method EPA Methods 1 and 2 EPA Method 3 or 3A EPA Method 4 EPA Method 7E EPA Method 10	Minimum Test <u>Run Duration</u> N/A 60 minutes 60 minutes 60 minutes 60 minutes
СО	EPA Method 10	60 minutes
VOC	EPA Method 18/25A	60 minutes
Opacity	SWCAA Method 9	6 minutes <sup>*</sup>

- \* 6 minutes of opacity monitoring shall be conducted during each test run.
- e. **VOC destruction efficiency calculation.** VOC destruction efficiency for the paint line thermal oxidizer shall be calculated as follows:

[ {(lb VOC/hr<sub>inlet</sub>) - (lb VOC/hr<sub>outlet</sub>)} / (lb VOC/hr<sub>inlet</sub>) ] \* 100%

#### 3. Source Operation:

- a. **Source operations.** Source operations during the emissions test must be representative of maximum intended operating conditions.
- b. **Record of production parameters.** Production related parameters and equipment operating conditions shall be recorded during emissions testing to correlate operating conditions with emissions. Recorded parameters shall, at a minimum, include process startups and shutdowns, and plant adjustments. All recorded production parameters shall be documented in the test results report.

#### 4. Reporting Requirements:

A final emission test report shall be prepared and submitted to SWCAA within 45 calendar days of test completion and, at a minimum, shall contain the following information:

- a. A description of the source including manufacturer, model number and design capacity of the equipment, and the location of the sample ports or test locations;
- b. Time and date of the test and identification and qualifications of the personnel involved;
- c. A summary of results, reported in units and averaging periods consistent with the applicable emission standard or limit;
- d. A summary of control system or equipment operating conditions;
- e. A summary of production related parameters;
- f. A description of the test methods or procedures used including all field data, quality assurance/quality control procedures and documentation;
- g. A description of the analytical procedures used including all laboratory data, quality assurance/quality control procedures and documentation;
- h. Copies of field data and example calculations;
- i. Chain of custody information;
- j. Calibration documentation;
- k. Discussion of any abnormalities associated with the results; and
- 1. A statement signed by the senior management official of the testing firm certifying the validity of the source test report.

All reported emission test results shall be corrected to 15% excess oxygen.

#### 5. Changes to Testing Requirements:

Emission testing must be conducted as specified in the sections above. The Permittee may submit a written request to SWCAA for approval of minor modifications to the requirements above or the testing schedule. Upon review of the request and in accordance with EPA delegation, SWCAA will inform the Permittee in writing of any approved modifications.

## Appendix B Emission Testing Requirements Process Boilers A and B

#### 1. Introduction:

The purpose of this testing is to quantify emissions from process boilers A and B, and demonstrate compliance with the requirements of this Permit and applicable air quality regulations.

#### 2. Testing Requirements:

- a. **Test plan.** A comprehensive test plan shall be submitted to SWCAA for review and approval at least 10 business days prior to each test. SWCAA personnel shall be informed at least five business days prior to testing so that a representative may be present during testing.
- b. **Testing schedule.** Emission testing shall be conducted at the common boiler exhaust stack (S4) no later than the end of March 2028. Subsequent emission tests shall be conducted every five years thereafter, no later than March of the year in which testing is due.
- c. **Test runs/Reference test methods.** A minimum of three (3) test runs shall be performed for each constituent to ensure the data are representative. Compliance shall be demonstrated by averaging the results of the individual sampling runs.

<u>Constituent</u>	Reference Test Method	Minimum Test
Stack gas flow rate, temperature	EPA Methods 1 and 2	<u>Run Duration</u>
O <sub>2</sub> , CO <sub>2</sub> content	EPA Method 3 or 3A	N/A
Stack gas moisture content	EPA Method 4	60 minutes
NO <sub>x</sub>	EPA Method 7E	60 minutes
CO	EPA Method 10	60 minutes
Opacity	SWCAA Method 9	60 minutes
Eval Btu value and sulfur content	Supplier cortification	6 minutes <sup>*</sup>
Fuel Btu value and sulfur content	Supplier certification	N/A

\* 6 minutes of opacity monitoring shall be conducted during each particulate test.

#### 3. Source Operation:

- a. **Source operations.** Source operations during the emissions test must be representative of maximum intended operating conditions.
- b. **Record of production parameters.** Production related parameters and equipment operating conditions shall be recorded during emissions testing to correlate operating conditions with emissions. Recorded parameters shall, at a minimum, include process startups and shutdowns, and plant adjustments. All recorded production parameters shall be documented in the test results report.

#### 4. Reporting Requirements:

A final emission test report shall be prepared and submitted to SWCAA within 45 calendar days of test completion and, at a minimum, shall contain the following information:

- a. A description of the source including manufacturer, model number and design capacity of the equipment, and the location of the sample ports or test locations;
- b. Time and date of the test and identification and qualifications of the personnel involved;
- c. A summary of results, reported in units and averaging periods consistent with the applicable emission standard or limit;
- d. A summary of control system or equipment operating conditions;
- e. A summary of production related parameters;
- f. A description of the test methods or procedures used including all field data, quality assurance/quality control procedures and documentation;
- g. A description of the analytical procedures used including all laboratory data, quality assurance/quality control procedures and documentation;
- h. Copies of field data and example calculations;
- i. Chain of custody information;
- j. Calibration documentation;
- k. Discussion of any abnormalities associated with the results; and
- 1. A statement signed by the senior management official of the testing firm certifying the validity of the source test report.

All reported emission test results shall be corrected to 3% excess oxygen.

#### 5. Changes to Testing Requirements:

Emission testing must be conducted as specified in the sections above. The Permittee may submit a written request to SWCAA for approval of minor modifications to the requirements above or the testing schedule. Upon review of the request and in accordance with EPA delegation, SWCAA will inform the Permittee in writing of any approved modifications.

## Appendix C Emission Testing Requirements General Equipment

#### 1. Introduction:

The purpose of this testing is to quantify emissions from the emission units identified below, and demonstrate compliance with the requirements of this Permit and applicable air quality regulations.

#### 2. Testing Requirements:

- a. **Test plan.** A comprehensive test plan shall be submitted to SWCAA for review and approval at least 10 business days prior to each test. SWCAA personnel shall be informed at least five business days prior to testing so that a representative may be present during testing.
- b. **Testing schedule.** Emission testing shall be conducted according to the testing schedule presented below. The test dates listed below shall serve as the reference date for use in determining when subsequent emission testing is required. Subsequent emission testing shall be conducted in the appropriate year no later than the end of the month in which the previous test was conducted.

<u>Emission point</u> Pickle Line Scrubber (S1)	Reference Test Date March 2028	<u>Test Frequency</u> Every 5 years	<u>Constituents</u> Flowrate Moisture content Hydrogen chloride Opacity
Cold Rolling Mill Mist Eliminator (S3)	March 2028	Every 10 years	Flowrate Moisture content PM (filterable) PM (condensable) Opacity
MCL Cleaning Scrubber (S5)	March 1998	Every 10 years	Flowrate Moisture content PM (filterable) Opacity NaOH
MCL Furnace (S6)	March 2028	Every 10 years	Flowrate Moisture content NO <sub>x</sub> CO VOC PM (filterable) PM (condensable) Opacity

#### 2. Testing Requirements (con't):

<u>Emission point</u> MCL Roll Coater Mist Eliminator (S8)	Reference Test Date March 2029	<u>Test Frequency</u> Every 10 years	<u>Constituents</u> Flowrate Moisture content Opacity Chromium (Cr[VI])
Paint Line Cleaning Scrubber (S9a)	March 2028	Every 10 years	Flowrate Moisture content PM (filterable) Opacity KOH
Roll-on Pretreatment Mist Eliminator (S9b)	March 2028	Every 10 years	Flowrate Moisture content PM (filterable) Opacity Chromium (Cr[VI])

- c. **Test runs.** A minimum of three (3) test runs shall be performed for each emission point/constituent combination to ensure the data are representative. Test runs for each constituent shall be a minimum of one hour in duration except for opacity. Opacity test runs shall be six minutes in length and conducted concurrently with each particulate test. Compliance shall be demonstrated by averaging the results of the individual sampling runs.
- d. **Reference test methods.** The sampling methods identified below shall be used unless alternate methods are approved in writing by SWCAA in advance of the emission testing.

<u>Constituent</u>	Reference Test Method
Flowrate and temperature	EPA Methods 1 & 2
$O_2$ and $CO_2$	EPA Method 3 or 3A
Moisture content	EPA Method 4
NO <sub>x</sub>	EPA Method 7E
СО	EPA Method 10
PM (filterable)	EPA Method 5
PM (condensable)	EPA Method 202
VOC	EPA Method 18/25A
Opacity	SWCAA Method 9
Hydrogen chloride (HCl)	EPA Method 26A or CARB Method 421 (modified)
Chromium (Cr[VI])	EPA Method 306, 306A, or CARB Method 425
Cobalt	EPA Method 29
Phosphoric acid	EPA Method 26A or CARB Method 421 (modified)
Potassium hydroxide (KOH)	EPA Method 5 w/impinger water analyzed for KOH
Sodium hydroxide (NaOH)	EPA Method 5 w/impinger water analyzed for NaOH

#### 3. Source Operation:

- a. **Source operations.** Source operations during the emissions test must be representative of maximum intended operating conditions.
- b. **Record of production parameters.** Production related parameters and equipment operating conditions shall be recorded during emissions testing to correlate operating conditions with emissions. Recorded parameters shall, at a minimum, include process startups and shutdowns, and plant adjustments. All recorded production parameters shall be documented in the test results report.

#### 4. Reporting Requirements:

A final emission test report shall be prepared and submitted to SWCAA within 45 calendar days of test completion and, at a minimum, shall contain the following information:

- a. A description of the source including manufacturer, model number and design capacity of the equipment, and the location of the sample ports or test locations;
- b. Time and date of the test and identification and qualifications of the personnel involved;
- c. A summary of results, reported in units and averaging periods consistent with the applicable emission standard or limit;
- d. A summary of control system or equipment operating conditions;
- e. A summary of production related parameters;
- f. A description of the test methods or procedures used including all field data, quality assurance/quality control procedures and documentation;
- g. A description of the analytical procedures used including all laboratory data, quality assurance/quality control procedures and documentation;
- h. Copies of field data and example calculations;
- i. Chain of custody information;
- j. Calibration documentation;
- k. Discussion of any abnormalities associated with the results; and
- 1. A statement signed by the senior management official of the testing firm certifying the validity of the source test report.

#### 5. Changes to Testing Requirements:

The emission test must be conducted as specified in the sections above. The Permittee may submit a written request to SWCAA for approval of minor modifications to the requirements above or to the testing schedule. Upon review of the request and in accordance with EPA delegation, SWCAA will inform the Permittee in writing of any approved modifications.

## Appendix D Emission Monitoring Requirements Paint Line Thermal Oxidizer

#### 1. Introduction:

a. The purpose of emission monitoring is to determine emission concentrations from the paint line thermal oxidizer during normal operating conditions, and assure compliance with the requirements of this Permit.

#### 2. Monitoring Procedure:

a. Monitoring of thermal oxidizer exhaust gases shall be conducted for the constituents listed below on a monthly basis. All sampling shall be performed in the exhaust stream of the thermal oxidizer.

Constituents to be Measured Carbon Monoxide (CO) Nitrogen Oxides (NO<sub>X</sub>) Oxygen (O<sub>2</sub>)

- b. Periodic monitoring may be conducted with an electrochemical cell combustion analyzer, analyzers used for reference method testing, or other analyzers pre-approved by SWCAA.
- c. Source operation during testing must be representative of maximum intended operating conditions during that year.

#### 3. Minimum Quality Assurance/Quality Control Measures:

- a. The analyzer(s) response to span gas of a known concentration shall be determined before and after testing. No more than 12 hours may elapse between span gas response checks. The results of the analyzer response shall not be valid if the pre and post response check results vary by more than 10% of the known span gas value.
- b. The CO and NO<sub>X</sub> span gas concentrations shall be no less than 50% and no more than 200% of the emission concentration corresponding to the permitted emission limit. Ambient air may be used to zero the CO and NO<sub>X</sub> cells/analyzer(s) and span the oxygen cell/analyzer.
- c. Sampling shall consist of at least 1 test consisting of at least 5 minutes of data collection following a "ramp-up phase." The "ramp-up phase" ends when analyzer readings have stabilized (less than 5% per minute change in emission concentration). Emission concentrations shall be recorded at least once every 30 seconds during the data collection phase. All test data collected following the ramp-up phase(s) shall be reported to SWCAA. A sample data sheet is attached for reference.

#### 4. Reporting Requirements:

- a. All monitoring results shall be recorded in the O/M log for the paint line thermal oxidizer. Each entry shall include the following:
  - (1) Time and date of the emissions evaluation;
  - (2) Identification of the personnel involved;
  - (3) A summary of results, reported in units consistent with the applicable emission standard or limit;
  - (4) A summary of control system or equipment operating conditions;
  - (5) A description of the evaluation methods or procedures used including all field data, quality assurance/quality control procedures and documentation; and
  - (6) Calibration documentation.
- b. Emission monitoring results shall be reported to SWCAA semi-annually by March 15 and September 15 for the previous six month period January through June and July through December, respectively.
- c. Emission monitoring results shall be corrected to  $15\% O_2$  in the exhaust gas.