### West Virginia Department of Environmental Protection Division of Air Quality

## **Fact Sheet**



# For Final Renewal Permitting Action Under 45CSR30 and Title V of the Clean Air Act

Permit Number: **R30-03500043-2023**Applications Received: **April 14, 2023**Plant Identification Number: **03-54-035-00043** 

Permittee: Constellium Rolled Products Ravenswood, LLC Mailing Address: P.O. Box 68, Ravenswood, WV 26164

Physical Location: Ravenswood, Jackson County, West Virginia

UTM Coordinates: 428.30 km Easting • 4,308.60 km Northing • Zone 17

Directions: Located along Century Road off of WV State Route 2 just south of Ravenswood.

#### **Facility Description**

Constellium Rolled Products Ravenswood, LLC (CRP) is a secondary aluminum operation covered under SIC code 3353. This facility melts aluminum in furnaces in the cast house. The metal is cast into ingot for further processing. From the cast house the aluminum is sent to the fabrication plant, which consists of hot rolling, cold rolling, plate, and general finishing. In fabrication, the metal is reheated to give it particular characteristics and rolled on one of the facility's hot or cold mills. After the metal has been finished into coil or plate it is warehoused and prepared for shipping to the customer.

This renewal permit also incorporates NSR permit determination PD19-052, off-permit change OP01, minor modification MM02 and minor modification MM03. The purpose of NSR permit determination PD19-052 was to install a Generac Guardian Series G007003 15 HP natural gas fired Emergency Generator. The purpose of off-permit change OP01 was to install a 22 MMBtu/hr natural gas fired SOW Dryer; this addition was proposed in NSR permit determination PD22-062 and a no-permit-needed (NPN) determination was issued on May 26, 2022. The purpose of MM02 is to increase the annual emissions for the Preheat Furnace and Heat Treat Addition; these changes were previously proposed and changed in NSR permit R13-2376E, which was approved on May 1, 2020, but were mistakenly omitted from the Title V

revision R30-03500043-2018 (SM01 and MM01) issued on July 20, 2020. The purpose of MM03 is to update the annual natural gas usage limits to better reflect the facility's processes moving forward by decreasing the Rotary Furnace from 67,331,764 ft<sup>3</sup>/yr to 31,057,093 ft<sup>3</sup>/yr while increasing the Aging Furnace from 8,800,000 ft<sup>3</sup>/yr to 36,000,000 ft<sup>3</sup>/yr; these updated natural gas usage limits were changed in NSR permit R13-2376F, which was approved on November 28, 2023.

#### **Emissions Summary**

Plantwide Emissions Summary [Tons per Year]				
Regulated Pollutants	<b>Potential Emissions</b>	2022 Actual Emissions		
Carbon Monoxide (CO)	479.11	82.53		
Nitrogen Oxides (NO <sub>X</sub> )	725.23	137.55		
Particulate Matter (PM <sub>2.5</sub> )	485.75	19.33		
Particulate Matter (PM <sub>10</sub> )	485.75	19.33		
Total Particulate Matter (TSP)	701.75	52.25		
Sulfur Dioxide (SO <sub>2</sub> )	4.28	0.59		
Volatile Organic Compounds (VOC)	333.8	133.56		

 $PM_{10}$  is a component of TSP.

Hazardous Air Pollutants	<b>Potential Emissions</b>	2022 Actual Emissions
Hydrochloric Acid (HCl)	399.3	21.71
Chlorine (Cl <sub>2</sub> )	0.1	0
Hydrofluoric Acid (HF)	0.7	0

Some of the above HAPs may be counted as PM or VOCs.

#### **Title V Program Applicability Basis**

This facility has the potential to emit over 100 tons per year of CO, NO<sub>X</sub>, PM<sub>10</sub>, and VOC; over 10 tons per year of HCl; and over 25 tons per year of aggregate HAPs (HCl, Cl<sub>2</sub>, and HF). Due to this facility's potential to emit over 100 tons per year of a criteria pollutant, over 10 tons per year of a single HAP, and over 25 tons per year of aggregate HAPs, Constellium Rolled Products is required to have an operating permit pursuant to Title V of the Federal Clean Air Act as amended and 45CSR30.

#### **Legal and Factual Basis for Permit Conditions**

The State and Federally-enforceable conditions of the Title V Operating Permits are based upon the requirements of the State of West Virginia Operating Permit Rule 45CSR30 for the purposes of Title V of the Federal Clean Air Act and the underlying applicable requirements in other state and federal rules.

This facility has been found to be subject to the following applicable rules:

45CSR6	Open burning prohibited
45CSR7	PM and Opacity limits for manufacturing
	sources
45CSR11	Standby plans for emergency episodes
45CSR13	Preconstruction permits
	45CSR7 45CSR11

45CSR16	Standards of Performance for New Stationary Sources
WV Code § 22-5-4(a)(14)	The Secretary can request any pertinent information such as annual emission inventory reporting
45CSR30	Operating permit requirement
45CSR34	Emission Standards for HAPs pursuant to 40 CFR 63
40 CFR Part 61	Asbestos inspection and removal
40 CFR 60 Subpart IIII	Stationary CI Internal Combustion Engine NSPS
40 CFR 60 Subpart JJJJ	Stationary SI Internal Combustion Engine NSPS
40 CFR 63 Subpart RRR	Secondary Aluminum MACT
40 CFR 63 Subpart ZZZZ	Reciprocating Internal Combustion Engine MACT
40 CFR 63 Subpart DDDDD	Boiler and Process Heater MACT
40 CFR Part 82, Subpart F	Ozone depleting substances
45CSR4	No objectionable odors.

Each State and Federally-enforceable condition of the Title V Operating Permit references the specific relevant requirements of 45CSR30 or the applicable requirement upon which it is based. Any condition of the Title V permit that is enforceable by the State but is not Federally-enforceable is identified in the Title

V permit as such.

State Only:

The Secretary's authority to require standards under 40 C.F.R. Part 60 (NSPS), 40 C.F.R. Part 61 (NESHAPs), and 40 C.F.R. Part 63 (NESHAPs MACT) is provided in West Virginia Code §§ 22-5-1 *et seq.*, 45CSR16, 45CSR34 and 45CSR30.

#### **Active Permits/Consent Orders**

Permit or Consent Order Number	Date of Issuance	Permit Determinations or Amendments That Affect the Permit (if any)
R13-0017	January 10, 1974	
R13-0072	May 23, 1974	
R13-0383A	August 5, 2011	
R13-2102	July 1, 1997	
R13-2376F	November 28, 2023	
G60-C065	October 29, 2014	
G60-D106	January 10, 2020	

Conditions from this facility's Rule 13 permit(s) governing construction-related specifications and timing requirements will not be included in the Title V Operating Permit but will remain independently enforceable under the applicable Rule 13 permit(s). All other conditions from this facility's Rule 13 permit(s) governing the source's operation and compliance have been incorporated into this Title V permit in accordance with the "General Requirement Comparison Table," which may be downloaded from DAQ's website.

#### **Determinations and Justifications**

This is the fourth permit renewal for this facility. This permit renewal incorporates changes proposed in NSR permit determination PD19-052 and Title V off-permit change R30-03500043-2018 OP01 (NSR permit determination PD22-062; a no-permit-needed (NPN) determination was issued on May 26, 2022). This permit renewal also incorporates changes proposed in Title V minor modifications R30-03500043-2018 MM02 (NSR permit R13-2376E approved May 1, 2020) and MM03 (NSR permit R13-2376F approved November 28, 2023). The following changes are included in this Title V permit renewal:

#### Title V Boilerplate changes:

- ➤ Condition 2.1.3. This condition was updated to delete the word "such" which was removed from 45CSR30 effective March 31, 2023. The reference was changed from 45CSR§30-2.12 to 45CSR§30-2.39. because the definition of "Secretary" was renumbered in a previous version of 45CSR30.
- ➤ **Condition 2.11.4.** The reference notation was changed from 45CSR§30-2.39 to 45CSR§30-2.40 because this definition was renumbered in 45CSR30.
- ➤ Conditions 2.17., 3.5.7. and 3.5.8.a.1. These conditions were deleted and replaced with "Reserved" because the emergency provisions under 45CSR§30-5.7 were removed from 45CSR30 effective March 31, 2023.
- ➤ Condition 2.22.1. The reference notation was changed to delete 45CSR38 because it was repealed.
- ➤ Condition 3.5.3. The US EPA contact information and address were updated.
- ➤ Condition 3.5.4. This condition was updated because the requirement to submit a certified emissions statement was removed from 45CSR30 effective March 31, 2023.
- ➤ Condition 3.5.8.a.2. This condition was updated to replace the word "telefax" with "email" according to the change in 45CSR30 effective March 31, 2023.

<u>Changes to update regulation language</u> - There have been minor changes to 40 C.F.R. 63 Subparts DDDDD and ZZZZ and 40 C.F.R. 60 Subparts IIII and JJJJ and these changes have been included in this renewal:

- > Condition 3.1.18. This condition was amended to match the updated 40 C.F.R. 63 Subpart DDDDD. In the last sentence of the paragraph, the word "Tables" was added to the phrase "Tables 11 through 13" and then 13 was changed to 15.
- > Condition 9.1.4.c. This condition was amended to match the updated 40 C.F.R. 60 Subpart IIII.
- ➤ Condition 9.1.6. This condition was amended because the regulation was changed and now references part 1039, Appendix I Table 2 for all pollutants and the smoke standards as specified in 40 CFR 1039.105. instead of §89.112/§89.113.
- ➤ Condition 9.1.8. This condition was amended to match the updated 40 C.F.R. 60 Subpart IIII. The reference "40 CFR 80.510(b)" was changed to "40 CFR 1090.305". 90 1054
- ➤ **Condition 9.1.10.** This condition was amended to remove the references to 40 CFR 89.112 and 40 CFR 89.113 and adding references to 40 CFR 1039.115 and 40 CFR part 1039, appendix I.
- ➤ **Condition 9.1.11.** This condition was amended to match the updated 40 C.F.R. 60 Subpart IIII. The reference "40 CFR part 90" was changed to "40 CFR part 1054".

- ➤ Condition 9.2.3. This condition was amended to match the updated 40 C.F.R. 60 Subpart IIII. The reference "40 CFR parts 89, 94 and/or 1068" was changed to "40 CFR part 1068".
- ➤ Condition 9.2.5.b. This condition was amended to match the updated 40 C.F.R. 60 Subpart JJJJ. The reference "40 CFR parts 89, 94 and/or 1068" was changed to "40 CFR part 1068".
- Condition 9.3.1. This condition was amended to match the updated 40 C.F.R. 60 Subpart JJJJ.
- ➤ Condition 9.5.3. This condition was added to include the reporting requirements from 60.4214(d) for EG-1, FP001 and FP002.

#### Changes to update R13 permit references:

- Condition 3.1.17. This condition was updated to change the permit reference from R13-2376D to R13-2376F.
- ➤ **Conditions 3.4.6. and 3.4.7.** These conditions were updated to change the permit reference from R13-2376E to R13-2376F.

#### **Changes to correct typographical errors:**

- ➤ Condition 4.1.18.a. This condition was updated to change the reference in the first footnote L<sub>tiPM</sub> from "4.1.16.a or b" to "4.1.16.a or d".
- ➤ Condition 4.1.18.b. This condition was updated to change the reference in the first footnote L<sub>tiHCL</sub> from "4.1.16.d" to "4.1.16.c".
- ➤ Condition 4.1.18.c. This condition was updated to change the reference in the first footnote L<sub>tiD/F</sub> from "4.1.16.c" to "4.1.16.b".
- ➤ Condition 4.2.16. This condition was updated to change the reference in the last sentence from "Conditions 3.1.16, 4.1.25, 4.1.26, and 4.1.27" to "Conditions 3.1.16, 4.1.28, 4.1.29, and 4.1.30".
- ➤ Condition 4.3.18.d, This condition was updated to delete a strike through from a previous modification which changed the reference "4.1.56" to "4.1.6".
- ➤ Condition 4.4.2. This condition was updated to change the reference in the first sentence in the second paragraph from "condition 4.5.1.b." to "63.1516(b)(2)(vii)".
- ➤ **Condition 4.4.6.o.i.** This condition was updated to change the reference from "4.1.9" to "4.1.8".
- Condition 6.1.4. This condition was updated to change the reference from "4.1.14" to "4.1.15".
- ➤ Condition 6.4.3. This condition was updated to change the reference in the first sentence from "4.1.14" to "4.1.15".

#### **Changes as a result of NSR Permit Determination PD19-052:**

➤ Condition 1.1. – This condition was updated to add a Generac Guardian Series G007003 15 HP natural gas fired Emergency Generator in the Miscellaneous Sources 010 section.

➤ Conditions 9.1.11., 9.2.5. and 9.4.6. – These conditions were already included for another similarly sized Generac natural gas fired Emergency Generator. Therefore, the foot note references were changed from "Generac" to "Generacs". In accordance with 40 CFR §63.6590(c)(6) there are no specific requirements in the RICE MACT for new emergency engines less than 500 hp. The only requirement is compliance with the New Source Performance Standards (NSPS) at 40 CFR 60, Subpart JJJJ for SI engines.

#### Change as a result of R30-03500043-2018 OP01:

- ➤ Condition 1.1. This condition was updated to add the SOW dryer to the Emission Units Table in the Casting Department 005 section.
- ➤ **Note:** The SOW dryer is not subject to the following rules and regulations:
  - ➤ 45CSR7 (Prevent and Control PM from Manufacturing Processes) The only PM emissions are produced during the combustion of natural gas in the SOW Dryer. There are no process emissions.
  - ➤ 45CSR13 (Construction/Modification Permitting) The maximum potential emissions of the SOW Dryer are below the requirement threshold of 6 lbs/hr and 10 TPY for any regulated pollutant.
  - ➤ **45CSR14** (Prevention of Significant Deterioration) The increase in emissions from the SOW Dryer are below the PSD threshold triggers for all applicable pollutants.
  - ➤ **45CSR16** (Federal NSPSs, 40 CFR Part 60) The SOW Dryer is not subject to any of the 40CFR Part 60 New Source Performance Standards (NSPS) regulations.
  - ➤ 45CSR19 (New Source Review) The Constellium facility is a major source under the New Source Review (NSR) regulation. The facility is located in an attainment area for all pollutants. NSR only applies in areas of non-attainment. In areas of attainment, PSD takes precedence. Therefore, NSR is not applicable at this time.
  - ➤ 45CSR30 (Title V) The addition of the SOW dryer qualified as an off-permit change.
  - ➤ **45CSR34** (Federal NESHAPs/MACT) The SOW dryer is not covered under NESHAP Subpart RRR.

#### **Changes as a result of R30-03500043-2018 MM02:**

- Condition 5.1.4. This condition was updated to insert the correct annual emission rates for PM, PM<sub>10</sub>, CO, NO<sub>X</sub>, SO<sub>2</sub> and VOCs for the Preheat Furnace.
- ➤ **Condition 7.1.2.** This condition was updated to insert the correct annual emission rates for PM, PM<sub>10</sub>, CO, NO<sub>X</sub>, SO<sub>2</sub> and VOCs for the Heat-Treat Furnace Addition.

#### Changes as a result of R30-03500043-2018 MM03:

- Condition 4.1.3. This condition was updated to change the annual emission rates for PM, PM<sub>10</sub>, CO, NO<sub>X</sub>, SO<sub>2</sub> and VOCs for the Rotary Furnace.
- ➤ Condition 4.1.8. This condition was updated to decrease the annual amount of natural gas consumed from 67,331,764 ft³ to 31,057,093 ft³ for the Preheat Furnace.

- Condition 7.1.2. This condition was updated to change the annual emission rates for PM, PM10, CO, NO<sub>X</sub> and VOCs for the Aging Furnace.
- ➤ **Condition 7.1.3.** This condition was updated to increase the annual natural gas consumed limit from 8,000,000 ft³ to 36,000,000 ft³ for the Aging Furnace.

**Note:** The facility has requested the following equipment be removed from their Title V permit: Induction Furnace East (005P104), Induction Furnace West (005P105) and Rotary Furnace (005P142). However, the Induction Furnaces were permitted under R13-0017 and the Rotary Furnace was permitted under R13-2376. Therefore, these sources cannot be removed until the R13 permits are amended.

<u>CAM</u>: The Constellium facility has two demisters (007C101 and 007C102) that are potentially subject to the CAM regulation. These demisters would be potentially subject when controlling emissions from the following sources:

- 1) 007C101 controlling the 72 Inch Single Stand Cold Mill 384 (007P101)
- 2) 007C102 controlling the 72 Inch Tandem Stand Cold Mill 382 (007P102)

Presently both of the Cold Mills are not operational. Title V Permit Condition 6.1.7 requires Constellium to develop and submit a CAM plan that meets the requirements of 40 CFR Part 64 at least 90 days prior to the proposed restart date of either piece of equipment. The requirements of the CAM plan will be submitted as part of a Title V Modification and Constellium cannot restart either piece of equipment until the Title V Permit Modification has been approved.

#### **Non-Applicability Determinations**

The following requirements have been determined not to be applicable to the subject facility due to the following:

45CSR10 – "To Prevent and Control Air Pollution from the Emission of Sulfur Oxides." 45CSR\$10-4.1.e exempts manufacturing process source operations from the 45CSR\$10-4.1 sulfur dioxide concentration limit of 2,000 ppm<sub>v</sub> if the potential to emit from the manufacturing process source operation is less than 500 pounds per year of sulfur oxides. All manufacturing process source operations at the Constellium facility have the potential to emit less than 500 lbs/year of sulfur oxides.

40 CFR 60, Subpart Dc – "Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units." The facility does not operate any boilers. All steam is purchased from the adjacent facility; therefore, 40 CFR 60, Subpart Dc does not apply.

40 CFR 60, Subpart Kb – "Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced After July 23, 1984. 40 CFR 60, Subpart Kb, as amended on October 15, 2003, applies to each storage vessel with a capacity greater than or equal to 75 m³ that is used to store volatile organic liquids (VOL) for which construction, reconstruction, or modification is commenced after July 23, 1984. All tanks at this facility which store volatile organic liquid were either installed before July 23, 1984 or have a storage capacity of less than 75 m³.

40 CFR 63, Subpart LL – "National Emission Standards for Hazardous Air Pollutants for Primary Aluminum Reduction Plants." Constellium Rolled Products only has secondary aluminum operations.

#### **Request for Variances or Alternatives**

None.

#### **Insignificant Activities**

Insignificant emission unit(s) and activities are identified in the Title V application.

#### **Comment Period**

Beginning Date: February 23, 2024 Ending Date: March 25, 2024

#### **Point of Contact**

All written comments should be addressed to the following individual and office:

Dan Roberts
West Virginia Department of Environmental Protection
Division of Air Quality
601 57<sup>th</sup> Street SE
Charleston, WV 25304
304/926-0499 ext. 41902
Daniel.p.roberts@wv.gov

#### **Procedure for Requesting Public Hearing**

During the public comment period, any interested person may submit written comments on the draft permit and may request a public hearing, if no public hearing has already been scheduled. A request for public hearing shall be in writing and shall state the nature of the issues proposed to be raised in the hearing. The Secretary shall grant such a request for a hearing if he/she concludes that a public hearing is appropriate. Any public hearing shall be held in the general area in which the facility is located.

#### **Response to Comments (Statement of Basis)**

There were no comments received from EPA, the company, the consultant or the public.