

Permit by Rule (PBR) Registration Technical Review

Company:	Georgia-Pacific Wood Products LLC	Registration No.:	177928
Nearest City:	Camden	Project No.:	381960
County:	Polk	Project Type:	Initial
Project Reviewer:	Camryn Appert	Regulated Entity No.:	RN101286227
Unit Name:	Camden Plywood & Lumber Complex	Customer Reference No.:	CN603126640
PBR No(s).:	106.261, 106.262	Project Received Date:	October 18, 2024
Physical Location:	20125 E FM 942		

Project Overview / Process Description

Georgia-Pacific Wood Products LLC (Georgia-Pacific) owns and operates a plywood and lumber manufacturing plan in Polk County, Texas. The site is currently operating under NSR permit 5628 / PSDTX905, Title V permit O982, and various Standard Permits and PBRs.

The purpose of this registration is to authorize a trial that will involve the extraction of biochar (portion of ash that is typically reinjected) from Boiler No. 3 (NSR permit 5628 / EPN:S-03) and the capture of the material in one or more vacuum boxes from transport off-site. The biochar will be sprayed with water mist to cool the material and minimize fugitive emissions. The vacuum truck will be used to provide a draft to pull the material into the vacuum boxes. The filter on the vacuum truck has a minimum capture efficiency of 99%. The ash will be transported off-site in the vacuum boxes, vacuum truck, or transferred to the on-site ash storage for transport off-site. The trial is expected to collect approximately twelve tons of biochar.

Permit by Rule Requirements - 30 TAC Chapter 106

General Requirements

Registration Fee Reference No.:	Application fee: 726663 / 582EA000630392
Is this registration certified?	No
Is planned MSS included in the registration?	No
Are there affected NSR or Title V authorizations for the project?	No
If there are affected Title V authorizations, is monitoring being submitted as part of this registration?	No
Are there any upstream or downstream affects associated with this registration?	No
Are associated upstream/downstream emissions either included in the registration OR within current permitted limits with no changes to underlying air authorizations for the applicable units regarding BACT, health and environmental impacts, or other representations.	NA
Are emissions for each PBR authorized facility less than the § 106.4(a)(1) limits?	Yes
Are total emissions from all sitewide PBR authorized facilities less than the § 106.4(a)(4) limits, OR has the site been subject to public notice requirements? NSR permit 5628 has been to public notice.	Yes
Are there permit limits on using PBRs at the site?	No
Is the facility in compliance with all other applicable rules and regulations?	Yes
Does the registration include an appropriate PBR workbook, and has the workbook been verified?	Yes

Federal Applicability

Does this project trigger a PSD or Nonattainment review?	No
Does the Major NSR applicability analysis include all associated upstream and/or downstream emissions?	NA
Are there any applicable standards under NSPS, NESHAP, or NESHAP for source categories (MACT)?	No

Permit by Rule Requirements - Compliance Demonstrations

PBR 106.261/262 Facilities (Emission Limitations / Emission and Distance Limitations)

- The emission point(s) associated with the facilities or changes to facilities are located (**Actual: 1,324 ft**) from the nearest off-site receptor.
- The total new or increase emissions will comply with the applicable hourly and annual emission limits as represented in the

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table below.

- N/A – There are no PBR 106.262(a)(4) chemicals being handled.
- There are no changes to or addition of any pollution abatement equipment.
- Visible emissions to the atmosphere, from any point or fugitive source, do not exceed 5.0 percent opacity in any six-minute period.
- This registration does not authorize construction or changes to a facility authorized under another section of this chapter or under standard permit.

Compliance History and Site Review

In accordance with 30 TAC Chapter 60, a compliance history report was reviewed on: **October 23, 2024**
 Site rating / classification: **0.00 / High** Company rating / classification: **0.55 / Satisfactory**
 Has any action occurred on the basis of the compliance history or rating? **No**
 Did the Regional Office provide site approval and confirm distances? **NA**

106.261(a)(2) Emissions

Chemical	Criteria Pollutant Designation	CAS No. (optional input)	Emission Threshold (lb/hr)	Emission Threshold (tpy)	Hourly Emissions (lb/hr)	Annual Emissions (tpy)	Meets Threshold?
Calcium Carbonate	PM	471-34-1	6	10	5.39E-06	5.39E-08	Yes

106.261(a)(3) Emissions

Chemical	Criteria Pollutant Designation	L Value (mg/m ³)	CAS No. (optional input)	Emission Threshold (lb/hr)	Emission Threshold (tpy)	Hourly Emissions (lb/hr)	Annual Emissions (tpy)	Meets Threshold ?
Potassium oxide	PM		12136-45-7	1	4.38	1.80E-06	1.80E-08	Yes
Manganese dioxide	PM		1313-13-9	1	4.38	8.99E-07	8.99E-09	Yes
Phosphorous pentoxide	PM		1314-56-3	1	4.38	8.99E-07	8.99E-09	Yes
Sodium oxide	PM		1313-59-3	1	4.38	8.99E-07	8.99E-09	Yes
Copper oxide	PM		1317-38-0	1	4.38	1.80E-08	1.80E-10	Yes

106.262(a)(2) Distance

Distance to nearest off-plant receptor (feet):	1,324
K value:	27.52

106.262(a)(2) Emissions – Table 262

Chemical	Criteria Pollutant Designation	CAS No. (optional input)	L Value (mg/m ³)	E, maximum Hourly Emission Threshold (lb/hr)	Actual Emission Threshold (tpy)	Actual Hourly Increases (lb/hr)	Actual Annual Increase (tpy)	Meets Threshold?
Silica-amorphous-precipitated, silica gel	PM	7631-86-9	4	1.45E-01	6.37E-01	7.19E-06	7.19E-08	Yes

106.262(a)(2) Emissions – 1997 ACGIH Guide

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Chemical	Criteria Pollutant Designation	CAS No. (optional input)	L Value (mg/m ³)	E, maximum Hourly Emission Threshold (lb/hr)	Actual Emission Threshold (tpy)	Actual Hourly Increases (lb/hr)	Actual Annual Increase (tpy)	Meets Threshold?
Particulates Not Otherwise Classified - Inhalable	PM		10	3.63E-01	1.59E+00	8.50E-06	8.50E-08	Yes
Particulates Not Otherwise Classified - Respirable	PM		3	1.09E-01	4.77E-01	1.29E-06	1.29E-08	Yes
Lead - elemental and inorganic compounds	PM	7439-92-1	0.05	1.82E-03	7.96E-03	1.18E-09	1.18E-11	Yes
Mercury - Inorganic forms including metallic mercury	PM	7439-97-6	0.025	9.08E-04	3.98E-03	5.39E-12	5.39E-14	Yes
Calcium oxide	PM	1305-78-8	2	7.27E-02	3.18E-01	5.39E-06	5.39E-08	Yes
Magnesium oxide fume	PM	1309-48-4	10	3.63E-01	1.59E+00	1.80E-06	1.80E-08	Yes
Silica (Crystalline) - Quartz	PM	14808-60-7	0.1	3.63E-03	1.59E-02	8.99E-07	8.99E-09	Yes
Iron oxide dust & fume (Fe ₂ O ₃)	PM	1309-37-1	5	1.82E-01	7.96E-01	8.99E-07	8.99E-09	Yes
Titanium dioxide	PM	13463-67-7	10	3.63E-01	1.59E+00	2.70E-07	2.70E-09	Yes
Silica (Crystalline) - Cristobalite	PM	14464-46-1	0.05	1.82E-03	7.96E-03	1.80E-07	1.80E-09	Yes
Aluminium oxide	PM	1344-28-1	10	3.63E-01	1.59E+00	1.80E-06	1.80E-08	Yes

Total 106.261/262 Combined Emissions

	Total Hourly Emissions (lb/hr)	Total Annual Emissions (tpy)
Total Emissions:	3.81E-05	3.81E-07

Emission Summary

EPN / Emission Source	VOC		NOx		CO		PM		PM ₁₀		PM _{2.5}		SO ₂	
	lb/hr	tpy	lb/hr	tpy	lb/hr	tpy	lb/hr	tpy	lb/hr	tpy	lb/hr	tpy	lb/hr	tpy
Biochar / Ash Handling	--	--	--	--	--	--	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	--	--
TOTAL EMISSIONS (TPY):							<0.01		<0.01		<0.01			
MAXIMUM OPERATING SCHEDULE:			Hours/Day		Days/Week		Weeks/Year		Hours/Year		8,760			

Camryn Appert

November 6, 2024
Date

Ms. Camryn Appert
Permit Reviewer
Rule Registration Section

Michael Partee

Michael Partee, Manager
Rule Registrations Section
Air Permits Division

November 8, 2024
Date