

# Fact Sheet



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

This Fact Sheet serves to address the changes specific to this Significant Modification, and shall be considered a supplement to the Fact Sheet corresponding with the Title V operating permit issued on October 17, 2013.

Permit Number: **R30-06700095-2013**  
Application Received: **September 18, 2017**  
Plant Identification Number: **067-00095**  
Permittee: **JELD-WEN, Inc. D.B.A. JELD-WEN**  
Facility Name: **JELD-WEN, Wood Fiber Division**  
Mailing Address: **500 Jeld-Wen Road; Craigsville, WV 26205**

Permit Action Number: *SM01*      Revised: *January 17, 2018*

---

Physical Location:	Craigsville, Nicholas County, West Virginia
UTM Coordinates:	529.8 km Easting • 4243.8 km Northing • Zone 17
Directions:	From Rt. 19 North of Summersville, take Rt. 41 North to Rt. 55 East, facility is approximately five miles and on the left.

---

### Facility Description

The Wood Fiber Division – West Virginia facility operates under the primary SIC Code 2493 and the secondary SIC Code 2851. The facility manufactures door skins in a process similar to the hardboard manufacturing process. The fiber-containing material, or furnish, consists of green poplar chips. The furnish is mechanically separated into fiber by the refiner and is then dried in a tube dryer. Next, the fiber is blended with a “no added formaldehyde” resin, and a fiber mat is formed. The mat continues into a cold pre-compressor, which is followed by trimming operations. The mat is then consolidated in a steam-heated press. After the press, the door skins are cut to the final dimensions and painted with waterborne primer.

A wood-fired boiler burns residuals from the production process, as well as purchased hogged-fuel, to generate steam. Additional combustion sources include a natural gas-fired back-up boiler and natural gas heated ovens associated with the priming operations. The fiber dryer is heated by both steam and natural gas (direct-fired).

This modification is to incorporate a variance allowing the permittee to initially startup a boiler built to burn biomass by using a propane torch/wand. Applicable portions of 40CFR63, Subpart DDDDD were also added to this permit.

### Emissions Summary

There are no changes to this facility's potential emissions.

### Title V Program Applicability Basis

With the proposed changes associated with this modification, this facility maintains the potential to emit 101.7 TPY of CO, 166.5 TPY of NO<sub>x</sub>, 143.9 TPY of VOCs, and 27.6 TPY of total HAPs. Due to this facility's potential to emit over 100 tons per year of criteria pollutant and over 25 tons per year of aggregate HAPs, JELD-WEN 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.

The modification to this facility has been found to be subject to the following applicable rules:

Federal and State:	45CSR30	Operating permit requirement.
	45CSR34	Emission Standards for Hazardous Air Pollutants
	40CFR63, Subpart DDDDD	Boiler MACT

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.

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

The following permits are associated with this modification:

Permit or Consent Order Number	Date of Issuance	Permit Determinations or Amendments That Affect the Permit ( <i>if any</i> )
N/A	N/A	

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

### 40CFR63, Subpart DDDDD: Boiler MACT

Two units at this facility are subject to the Boiler MACT:

- A hogged fuel-fired boiler rated at 62.5 MMBtu/hr installed in 1998 (E5)
- A natural gas-fired boiler rated at 37.7 MMBtu/hr installed in 1998 (E6)

E5 is designed to burn only biomass. It is subject to various emission limits and related testing, and monitoring requirements from the Boiler MACT. The facility has requested a variance allowing it to be assisted during start-up with a propane torch/wand. E5 is subject to HCl, mercury, CO, and PM emission limits; to comply with these limits an ESP and oxygen trim system will be used. Site specific operating limits for opacity, steam (operating load), and oxygen content were derived from performance testing. There must be an annual tune-up on E5, and a one-time energy assessment must be performed. The facility is required to conduct annual performance testing; this frequency may be reduced based on the test results.

E6 is designed to burn only natural gas. Therefore, tune-up requirements from the Boiler MACT apply. There must be an annual tune-up on E6, and a one-time energy assessment must be performed.

The following requirements from 40CFR63, Subpart DDDDD were added to this permit:

Permit Condition	40CFR63, Subpart DDDDD Requirement	Regulatory Citation
4.1.12. <sup>1,2</sup>	HCl, mercury, CO, and PM emission limits	40 CFR §63.7500(a)(1); Table 2, Items 1 and 12 of 40CFR63, Subpart DDDDD; 45CSR34
4.1.13. <sup>3</sup>	Work practice standards	40 CFR §63.7500(a)(1); Table 3, Items 3, 4, 5, and 6 of 40CFR63, Subpart DDDDD; 45CSR34
4.1.14. <sup>2</sup>	Requirements to monitor opacity, boiler operating load, and O <sub>2</sub> concentration	40 CFR §63.7500(a)(2); Table 4, Items 4, 7, and 8 of 40CFR63, Subpart DDDDD; 45CSR34
4.1.15. <sup>2</sup>	Operating limits for opacity, oxygen content, and boiler or process heater operating load	40 CFR §63.7510(a)(3); 45CSR34
4.1.16.	General requirements from 40CFR63, Subpart DDDDD	40 CFR §§63.7505(a), (c), and (d); 45CSR34
4.1.17.	Operate consistent with safety and good air pollution control practices for minimizing emissions	40 CFR §63.7500(a)(3); 45CSR34
4.1.18. <sup>2</sup>	Variance for propane assisted startup	40 CFR §§63.7555(d)(13)(i-iv); 45CSR34
4.1.19.	Standards apply at all times unit operates	40 CFR §63.7500(f); 45CSR34
4.2.4. <sup>2</sup>	Monitoring, installation, operation, and maintenance requirements	40 CFR §§63.7525(a), (c), and (d); 45CSR34
4.2.5. <sup>2</sup>	Continuous compliance for opacity, oxygen content, and boiler operating load	40 CFR §63.7540(a); Table 8, Items 1, 9, and 10 of 40CFR63, Subpart DDDDD; 45CSR34
4.2.6.	Continuous compliance: deviations of limits, fuel usage records, compliance with HCl and Mercury limits, and tune-ups	40 CFR §§63.7540(a)(1), (a)(2), (a)(4), (a)(6), (a)(10), and (a)(13)
4.3.2.	Performance testing schedule	40 CFR §§63.7515(a), (b), (c), and (d); 45CSR34
4.3.3. <sup>2</sup>	Stack tests and procedures	40 CFR §63.7520; 45CSR34
4.3.4.	Monitoring requirements	40 CFR §63.7535; 45CSR34
4.4.3.	Recordkeeping requirements	40 CFR §§63.7555(a)-(d); 45CSR34
4.4.4.	Forms of records and durations of records	40 CFR §63.7560; 45CSR34
4.5.5. <sup>2</sup>	Reporting of performance tests and fuel analyses	40 CFR §63.7515(f); 45CSR34
4.5.6. <sup>2</sup>	Energy assessment certification	40 CFR §63.7530(e); 45CSR34
4.5.7.	Deviation reporting	40 CFR §63.7540(b); 45CSR34
4.5.8.	Required notifications	40 CFR §§63.7545(a), (d), and (h); 45CSR34
4.5.9.	Procedures for submitting reports	40 CFR §§63.7550(a), (b), (c), (d), (e),

Permit Condition	40CFR63, Subpart DDDDD Requirement	Regulatory Citation
		(h)(1), and (h)(3); 45CSR34

<sup>1</sup>This condition previously contained placeholder language requiring the future addition of 40CFR63, Subpart DDDDD requirements to the permit. Since these requirements are being added, this old condition is no longer necessary.

<sup>2</sup>This condition only applies to E5.

<sup>3</sup>Items 5 and 6 only apply to E5.

### Non-Applicability Determinations

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

None

### Request for Variances or Alternatives

The permittee has requested a permanent variance in accordance with 40CFR §§63.7555(d)(13)(i-iii) to allow the boiler E5, which was designed to burn only biomass, to be assisted with a propane torch/wand during start-up. After initial ignition, the fire can be built-up with the addition of biomass, and the propane torch/wand can be removed. The boiler was not designed to use fuels other than biomass and is not equipped with burners or the fuel delivery system (piping and controls) for such burners. Additionally, installation of such burners and gas lines would cause undue hardship due to impractical expenses. The variance is necessary, because start-up of the boiler in this manner may result in instances where the opacity is above the standard during the start-up period before the ESP manufacturer recommended safe operating practices are satisfied to allow engagement of the ESP. The permittee has stated in their application that this variance will not increase any of the facility's potential emissions.

This variance was added as condition 4.1.18.

### Insignificant Activities

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

### Comment Period

Beginning Date: Thursday, December 14, 2017

Ending Date: Tuesday, January 16, 2018

### Point of Contact

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

Rex Compston, P.E.  
West Virginia Department of Environmental Protection  
Division of Air Quality  
601 57<sup>th</sup> Street SE  
Charleston, WV 25304  
Phone: 304/926-0499 ext. 1209 • Fax: 304/926-0478  
[Rex.E.Compston@wv.gov](mailto:Rex.E.Compston@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)**

Not applicable.