



Hurricanes Laura and Sally | Update #19

REPORT TIME & DATE: 11:00 AM EDT | Tuesday, September 15, 2020

REPORT DISTRIBUTION: Public

EXECUTIVE SUMMARY

As of 8:00 AM EDT, Hurricane Sally was 65 miles east of the mouth of the Mississippi River, moving northwest at 2 MPH, with maximum sustained winds of 85 MPH. On the forecast track, the center of Sally will pass near the coast of southeastern Louisiana today, and make landfall tonight or Wednesday morning. The DOE Energy Response Center is activated to manage Emergency Support Function (ESF) #12 activities and to coordinate with industry partners.

Hurricane Laura made landfall early on August 27, near Cameron, Louisiana as a Category 4 hurricane. The system weakened as it moved inland but caused significant impacts across portions of Louisiana and Texas.

Electricity Sector Summary

- As of 7:30 AM EDT, there were approximately 82,000 customer outages reported across Louisiana, Mississippi, and Alabama. Approximately 75,000 of these outages are customers remaining without power from Hurricane Laura.
- Restoration efforts are underway across the affected region, supported by mutual assistance, with more than 29,000 personnel from over 29 states, the District of Columbia, and Canada.
- Hurricane Laura caused significant damage to transmission infrastructure in portions of Louisiana and Texas. Restoration of transmission systems is a priority to help enable other phases of restoration. Full restorations for the most significantly damaged areas in western Louisiana will be extended, taking up to several weeks for some portions of southwest Louisiana.

Oil & Natural Gas Sector Summary

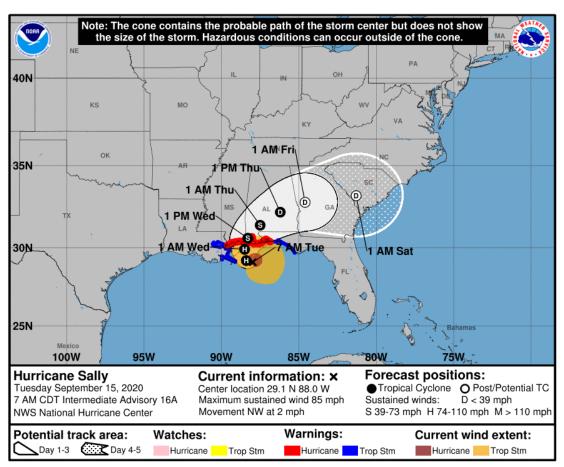
- As of 12:30 PM EDT September 14, 0.396 million barrels per day (b/d) (21.39%) of the oil production and 0.685 billion cubic feet per day (Bcf/d) (25.28%) of the natural gas production in the federally administered areas of the U.S. Gulf of Mexico have been shut-in, according to estimates by the Bureau of Safety and Environmental Enforcement (BSEE).
- The refinery and offshore platform shut-ins are not anticipated to cause immediate supply issues. For the week ending on September 4, overall U.S. stocks of gasoline and distillate were 3.0% and 20.6% above the seasonal 5-year average. Jet fuel is slightly below the average, but within the 5-year range. Across the Gulf Coast, stocks of gasoline and distillate were 11% and 37% above the 5-year average respectively. Gulf Coast stocks of crude oil were 20.1% above the 5-year average in the Gulf Coast (not including the SPR).

HURRICANE SALLY

As of 8:00 AM EDT, Hurricane Sally was 65 miles east of the mouth of the Mississippi River, moving west-northwest at 2 MPH, with maximum sustained winds of 85 MPH. Hurricane-force winds extend outward up to 45 miles from the center and tropical storm-force winds extend outward up to 125 miles. On the forecast track, the center of Sally will move near the coast of southeastern Louisiana later today and make landfall in the hurricane warning area tonight or Wednesday morning.

Through Friday, Sally is expected to produce rainfall totals of 10 to 20 inches, with isolated maximum amounts of 30 inches from the western Florida Panhandle to far southeastern Mississippi. Significant flooding is possible with life-threatening flash flooding likely through Wednesday. In addition, the significant rainfall may cause moderate to major flooding on area rivers.

A hurricane warning is in effect from east of the mouth of the Pearl River to the Navarre, Florida. A tropical storm warning is in effect from east of Navarre, Florida to Indian Pass Florida and for the mouth of the Pearl River westward to Grand Isle, Louisiana. A storm surge warning is in effect from the mouth of the Mississippi River to the Okaloosa/Walton County Line, Florida.

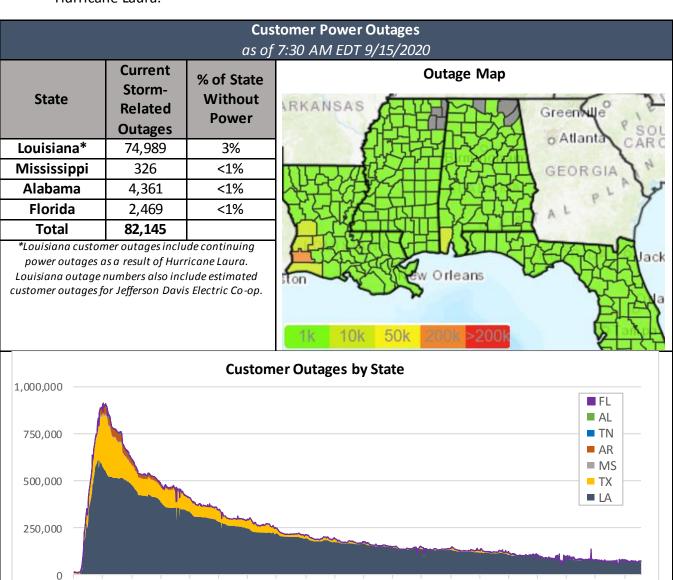




ELECTRICITY SECTOR

POWER OUTAGES

 As of 7:30 AM EDT, there are a total of 82,145 outages across Louisiana, Mississippi, Alabama, and Florida. Approximately 75,000 of these outages are customers still without power from Hurricane Laura.





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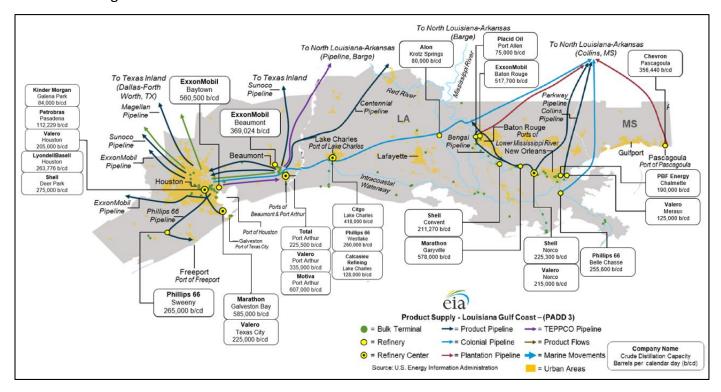
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- Restorations from Hurricane Laura continue across portions of western Louisiana. The hardest hit areas, where distribution and transmission systems need to be rebuilt, will be a multi-week effort. While full restoration in the hardest-hit areas will take several weeks, customers will be restored as repairs are complete and transmission is available. A significant number of customers may not be able to receive power at this time due to damage to customer equipment and/or damage to the customer's structure.
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- Restoration of damaged transmission segments is a key priority, especially transmission segments located around southern portions of the Texas-Louisiana border. Restoration of transmission infrastructure will further enable subsequent phases of restoration as distribution infrastructure is restored.
- Fluctuation in the outage numbers is expected and normal during large-scale restoration efforts.
- Mutual assistance networks have been activated, with more than 29,000 personnel from 29 states, the District of Columbia, and Canada supporting restoration efforts.
- Utilities follow an overall plan to restore service to customers. After power is restored to essential services and facilities critical to public health and safety, crews focus on repairing lines that will return service to the largest number of customers in the least amount of time. Power is restored systematically to neighborhoods, industries, and businesses and then to individual homes and small groups of customers.
- As utilities in less-impacted areas complete restorations, they are coordinating release of crews with neighboring utilities to support efforts in the hardest-hit areas.



OIL AND NATURAL GAS SECTOR

Just over half of total U.S. refining capacity is located in the Gulf Coast (PADD 3) region. Gulf Coast refinery production is critical for supplying fuels to markets in the high-demand East Coast (PADD 1) region. Products move out of the Gulf Coast region on the Colonial and Plantation pipeline systems to Southeast and Central Atlantic markets, and via tanker and barge to Florida. The Gulf Coast refineries export approximately 20% of production to foreign countries. This provides a significant "export buffer," allowing refiners to shift fuel production away from exports to make up for shortages in domestic markets. The map below highlights the petroleum supply chain in the Louisiana and Texas Gulf Coast regions.



PORTS

- Louisiana Offshore Oil Port (LOOP) has suspended operations at its marine terminal and stopped loading tankers on September 13. LOOP is the U.S. port capable of receiving very large crude carriers (VLCCs). LOOP's Clovelly Hub deliveries remain normal. As of 5:00 AM EDT September 15, LOOP remains partially operational and making deliveries from unaffected facilities; no delivery suspensions are anticipated.
- The U.S. Coast Guard (USCG) has set the following conditions for ports and waterways as a result of Laura and/or Sally. Listed in the table are select ports that receive petroleum products.

Status of Gulf Coast Ports as of 8:30 AM EDT 09/15/2020								
Port Sector	Port	Inbound Petroleum* (b/d)	Status	Date Stamp				
Port Arthur and Lake Charles	Lake Charles, LA	394,000	Open with restrictions.	9/7				
New Orleans	New Orleans, LA	201,000	Port Status Zulu. Open with restrictions. Northbound movement for safe refuge only.					
	Baton Rouge, LA	83,000	Port Status Zulu. Closed.					
	Gramercy, LA	110,000	Port Status Zulu. Closed.	9/14				
Mobile	Pascagoula, MS	131,000	Port Status Zulu. Closed.	9/14				
	Mobile, AL	191,000	Port Status Zulu. Closed.	9/14				
	Pensacola, FL	10,000	Port Status Zulu. Closed.	9/14				

*Crude oil and product foreign imports and domestic movements in 2018.

Source: Receipt data from EIA Company Level Imports, U. S. Army Corps of Engineers Waterborne Commerce Statistics Center

• As of September 10, Port Condition Recovery remains in effect for the Calcasieu Waterway. Shoaling in the Calcasieu Bar and River is restricting the draft of transiting vessels. Two swing bridges east of the Calcasieu Lock are open from 6 PM to 7 AM daily to allow inland traffic until normal operations are restored.

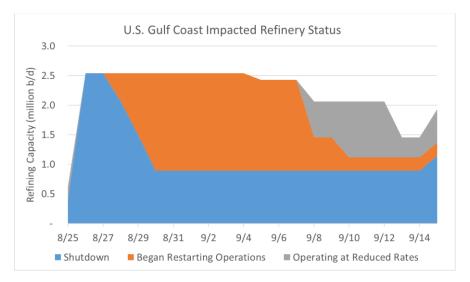
OFFSHORE PRODUCTION

- As of 12:30 PM EDT September 14, 0.396 million barrels per day (b/d) (21.39%) of the oil production and 0.685 billion cubic feet per day (Bcf/d) (25.28%) of the natural gas production in the federally administered areas of the U.S. Gulf of Mexico have been shut-in, according to estimates by the Bureau of Safety and Environmental Enforcement (BSEE).
- In addition, BSEE reports that 147 out of 643 manned platforms have been evacuated; 3 out of 12 non-dynamically positioned rigs have been evacuated; and 2 out of 17 dynamically positioned rigs have moved out of Sally's path as a precaution.
- During Hurricane Laura, peak shut-in in the Gulf of Mexico reached 84% of oil production and 61% of natural gas production when Laura made landfall, although most of this was restored prior to Hurricane Sally.



PETROLEUM REFINERIES

- As of 9:00 AM EDT September 15, five refineries in the Gulf Coast region were shut down, according to public reports. These refineries have a combined refining capacity of 1.1 million b/d, equal to 12% of total Gulf Coast (PADD 3) refining capacity and 6% of total U.S. refining capacity.
- Another two refineries are in the process of restarting after being shut down. Restart may take several days. The restarting refineries have a combined capacity of 0.56 million b/d, equal to 6% of total Gulf Coast (PADD 3) refining capacity and 3% of total U.S. refining capacity.



The above chart summarizes impacts to Gulf Coast refining capacity as a result of Hurricane Laura and Hurricane Sally over time, as reported in DOE's Situation Reports. Impacted refining capacity is aggregated into three categories: 1) shutdown refineries (blue), 2) refineries that were shut down and have begun restarting (orange), and refineries that are operating at reduced rates (gray). Refinery statuses are updated based on various news outlets and company websites.

STRATEGIC PETROLEUM RESERVE (SPR) SITES

• As of September 14, assessment, cleanup, and recovery efforts are underway at West Hackberry.

Status of SPR Sites as of 11:00 AM EDT 09/14/2020							
Site	Location	Hurricane Alert Level	Drawdown Capability				
New Orleans Office	New Orleans, LA	Level 4	N/A				
Bayou Choctaw	Plaquemine, LA	Level 4	Drawdown Ready				
West Hackberry	Hackberry, LA	Re-Entry & Reconstitution	Pending Reconstitution				
Big Hill	Winnie, TX	Normal Operations	Drawdown Ready				
Bryan Mound	Freeport, TX	Normal Operations	Drawdown Ready				

Source: DOE Office of Petroleum Reserves

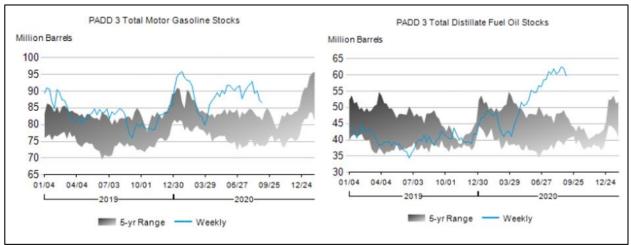


GAS STATIONS

- Many retail fuel stations are unavailable in the impacted area due to power outages and/or damage. As of September 2, the Louisiana Oil Marketers and Convenience Store Association reports that there are no supply issues (gasoline or diesel) at this time.
- Due to limited number of retail stations with power and fuel, lines have been reported at available stations in the Lake Charles area.
- The state of Louisiana has deployed some generators to gas stations that are operational. ExxonMobil has reported providing generators to distributors in Louisiana without power.

FUEL STOCKS

• For the week ending on September 4, 2020, the Gulf Coast (PADD 3) had 86.6 million barrels of total gasoline stocks (down 0.6 million barrels from last week), according to the Energy Information Administration (EIA). This is 11% higher than the 5-year average for this time of year. For the week ending on September 4, the Gulf Coast had 59.7 million barrels of total distillate stocks (down 2.3 million barrels from last week), according to EIA. This is 37% higher than the 5-year average for this time of year.



 Overall U.S. stocks for transportation fuels (gasoline, jet fuel, and diesel) stood at 446.6 million barrels for the week ending September 4, 2020, approximately 8.0% above the 5-year average for the time of year. Gasoline and distillate stocks are 3.0% and 20.6%, above their respective seasonal 5-year averages, while jet fuel stocks are 9.1% below its respective 5-year average, but within the 5-year range.



EMERGENCY DECLARATIONS & WAIVERS

EMERGENCY DECLARATIONS

To provide vital supplies and transportation services to a disaster area in the United States, emergency declarations may be issued by the President, Governors of States, or Federal Motor Carrier Safety Administration (FMCSA). These declarations trigger the temporary suspension of certain Federal safety regulations, including Hours of Service, for motor carriers and drivers engaged in specific aspects of the emergency relief effort. See 49 CFR 390.23 for the actual emergency regulation.

Emergency Declarations and HOS Waivers as of 8:30 AM EDT 09/15/2020							
State /Tarritary	Details	Effective Dates		Status			
State/Territory	Details		End				
AL, AR, LA, MS, MO, OK, TN, TX	FMCSA Hours of Service Waiver	8/27	9/23	Active			
Arkansas	State of Emergency	8/26	Until rescinded	Active			
Aikaiisas	Presidential Emergency Declaration	8/27	Until rescinded	Active			
Kentucky	State Emergency Declaration	8/27	9/10	Inactive			
Puerto Rico	Presidential Emergency Declaration	8/21	Until rescinded	Active			
Puerto Rico	State of Emergency	8/21	Until rescinded	Active			
Alabama	State of Emergency (Sally)	9/14	Until rescinded	Active			
Florida	State of Emergency (Sally)	9/14	Sixty days unless extended	Active			
	State of Emergency (Sally)	9/13	Until rescinded	Active			
Mississippi	State of Emergency (Laura)	8/22	Until rescinded	Active			
	Presidential Emergency Declaration	8/22	Until rescinded	Active			
	State of Emergency (Sally)	9/12	10/11	Active			
Louisiana	State of Emergency (Laura)	8/21	9/20	Active			
Louisiana	Presidential Emergency Declaration	8/23	Until rescinded	Active			
	Presidential Disaster Declaration	8/28	Until rescinded	Active			
Texas	State of Disaster Declaration	8/23	Until rescinded	Active			
1EXd5	Presidential Emergency Declaration	8/23	Until rescinded	Active			

Sources: State government, White House, and Federal Motor Carrier Safety Administration websites.



WAIVERS

- On August 26, the Texas Department of Environmental Quality requested and received approval for the <u>suspension</u> of various air quality and other environmental rules during the storm response. The rules cover air emissions from power plants, refineries, and vehicles, in addition to other sources of pollution.
- On August 26, the Pipeline and Hazardous Materials Safety Administration (PHMSA) issued an emergency waiver <u>order</u> declaring an emergency in Louisiana, Mississippi, and Texas and suspending certain requirements for the transportation of hazardous materials. The waiver is intended to support the U.S. Coast Guard and EPA in their response to Laura.
- On August 27, the Secretary of Energy used his authorities under section 202(c) of the Federal Power Act to issue an emergency <u>order</u> authorizing and directing CenterPoint Energy Houston Electric (CEHE) to operate an existing, permanent tie-line to assist in electricity restoration of power to Entergy Texas, Inc. and electric cooperatives and municipal customers within the State of Texas as a result of the outages caused by Hurricane Laura.

