

Electricity Emergency Response Menu

Type of Emergency	Supply or Demand Side	Measure	What it Does	Recommended Steps	Shortage Level
Electric	Supply	Participation in regional planning and transmission organizations (Southwest Power Pool).	The Southwest Power Pool has the ability to shift power from state to state within its authorized region as a means of alleviating localized outages.	SPP can see each generating unit and transmission line and monitors these 24/7/365.	1
				OCC PUD maintains staff in active communication with SPP to update on status of shortages. Utilities can also go directly to SPP.	2
					3
					4
Electric	Supply	Temporarily increase levels of coal stockpiling by electric utility companies.	Allows electric utilities to plan for predicted fuel shortages. Increasing stockpiles of necessary fuel above 45 day prepares to handle the upcoming shortage.	Utilities may increase stockpiles without OCC input.	2
				Utility notifies OCC if stockpile exceeds 45 day supply and OCC regulates how much of the cost can be passed through in rate base after the fact.	3
					4
Electric	Supply	Temporarily substitute Oklahoma coal for Wyoming coal in coal-fired power plants.	In the event of a WY coal shortage, Oklahoma coal could be used to keep generation constant. OK coal is not of the same type as WY coal; therefore, waivers would be needed.	Utilities would contact DEQ and U.S. EPA to request waivers to temporarily substitute one type of coal for another.	4
Electric	Supply	Reduction of voltage in the system.	Reduction of voltage by less than five or six percent can reduce the demands on the system, with most customers not being adversely impacted. Be aware, this short-term solution should be taken only after public notice has been given, as certain sensitive electrical equipment may be adversely affected, and would need to be protected.	Utilities would notify customers in conjunction with OCC, and then utilities would perform the voltage reduction.	4

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Electric	Supply	Utilize large backup generation when mobile units are available.	Utilities and large industrial customers can install large generators that can supply from 75 to 100 megawatts of temporary diesel generation to ease electrical shortages.	OEM will facilitate communication between customers in need of backup generation and utilities that maintain lists of priority restoration.	4
				Generator owners should be prepared to mobilize generators to appropriate locations once identified. OEM should coordinate request for backup generators with FEMA and U.S. DOE, which can often provide emergency generators for critical infrastructure or fuel sites.	
Electric	Supply	Use locomotive generators for electricity generation in selected locations.	Oklahoma has more useable freight rail lines than almost any other state. By utilizing these rail lines, locomotives can be used as emergency electricity generation sources to provide electricity for critical facilities.	OEM and the National Guard also have generator staging points that can be utilized. OEM should facilitate communications with OK DOT and OCC to determine rail line locations and feasibility of placing locomotives near centers of need.	4
Electric	Demand	Activate interruptible rates/curtailment programs.	A load shedding mechanism whereby industrial customers receive a lower rate in exchange for willingness to have their service interrupted in times of high system demand.	All utilities have these programs currently in place and could activate curtailments as needed without state approval.	1
Natural Gas				Utilities must provide notice to the individual users prior to curtailing.	2

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Electric	Demand	Implement system-wide rolling blackouts.	A load shedding mechanism that allows a utility to reduce the impacts realized from extended outages.	Utility must notify customers and OCC prior to outages beginning and duration of outages must be determined by the utility. Utility must consider if any customers should be exempted from the blackouts.	4
				Coordinate with OEM and OCC to disseminate information on blackout locations and duration via media and utilize smart meters as possible to target outage locations.	
Electric	Demand	Voluntary or mandatory curtailment of public building energy use.	Load shedding mechanism that could mean reduced hours of operations to curtail energy use.	Utilities would communicate with OMES/Governor's Office regarding the need for energy reductions.	3
				Governor would issue an Executive Order closing buildings or modifying access.	4
Electric	Demand	Employ and/or expand time-of-use rates for residential and/or industrial users.	A load shedding mechanism which creates strong financial incentives for consumers to use electricity at off-peak times. Programs are most effective with smart meters in place.	Utilities with programs already in place (OG&E and PSO) can employ these programs without input from state officials.	1
					2
					3
					4
Electric	Demand	Utilize capacity at sites with fuel switching or co-generation capabilities.	A load shedding mechanism that can reduce electric demand on the grid.	Utility will contact co-generation site to request that the co-generation capacity be utilized to reduce their electric demand.	3
					4

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Electric	Demand	Conduct a public information program on home energy assessments.	An assessment will show the problems that can, when corrected, increase residential energy efficiency, thus reducing electricity demand.	Utilities administer these programs and are responsible for promoting them.	1
				Utilities could be encouraged by OCC to more widely publicize the programs.	2
Electric	Demand	Implement a public information or incentive program that encourages Oklahomans to purchase more efficient appliances, add insulation, or change lighting.	A mechanism to reduce energy consumption.	Utilities currently offer these incentives.	1
				State agencies including OCC and ODOC also promote these incentives to the public. Consider increasing publicity/visibility in times of shortage.	2
Electric	Demand	Conduct public information campaign that includes a variety of electricity saving tips.	Encourages customers to reduce energy consumption.	Utilities currently offer these promotional materials.	1
				Consider using public figures such as OCC Commissioners or Governor for PSAs regarding electricity conservation in times of shortage.	2
					3
					4
Electric	Demand	Increase rates for customers.	Higher prices discourage consumption during shortages. This type of short-term change could only feasibly be implemented in a self-regulated co-op or municipal utility setting.	Utilities must publicize the rate increases thoroughly to realize the conservation benefits.	2
				Co-op board members or city governments must approve rate changes.	3
				The State has no authority over these changes as these are unregulated utilities.	4

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Electric	Demand	Encourage or direct government facilities to improve energy efficiency.	Reduces energy consumption.	61 Okla. St. § 213 mandates that new construction or substantial renovation projects in state buildings over 10,000 sq. ft. must meet a high-performance building standard.	1
				Shorter term measures could be coordinated through OMES and Governor (Executive Order in an emergency situation).	2
					3
					4
Electric	Demand	Encourage or direct regulated utility providers to increase and/or provide additional programs to their customers which focus on energy efficiency.	Reduces energy consumption.	OCC can encourage additional programming at any time. Directing additional programming would be accomplished through a formal rulemaking process or legislation.	1
Electric	Demand	Utilize buy-back rates that pay customers to sell excess self-generated electricity back to the grid for utility credit.	Reduces the need for utility generation.	The current state net metering policy already encourages customer self-generation but there are cost barriers to customers selling back to the grid.	1
Electric	Demand	Encourage the use of alternative fuels, such as natural gas, propane, diesel or wood as the fuel source for home heating.	Provides alternative heating sources in event of electrical outages.	Utilities, the Dept. of Health, Fire Marshall, and public figures should utilize PSAs and all media outlets to communicate the risks and benefits of safely using alternative fuels for home heating.	2
Natural Gas				3	
Propane				4	