

## **GE's New Technical Solution for its Mobile Gas Turbines Further Reduces Emissions to Low Single Digits, Surpassing US and World Bank Emissions Standards**

- *GE's mobile aeroderivative gas turbines can now meet the most stringent emissions standard requirements*
- *First system successfully installed on four GE TM2500\* aeroderivative gas turbines in California*
- *The developed solution is now available for GE TM2500\* units globally*
- *It includes proven Selective Catalytic Reduction (SCR) technology, and effective post-combustion control systems to help lower emissions from thermal power generation*

ATLANTA, GA —December 6, 2022 — By responding to emergency needs tied to natural disasters and more needs for power to mitigate expected soaring electricity demand during the winter and summer seasons, or possible power restrictions due to the security of power supply issues, providing energy “in a pinch” is becoming increasingly important in the transition towards a lower-carbon power generation. GE (NYSE:GE) announced today GE's mobile gas power technology, typically used for emergency use, can meet not only the emissions requirements in line with World Bank Standards, but even surpass them and meet California's most stringent emissions standard requirements.

In the State of California, GE developed an innovative technical solution on four TM2500\* aeroderivative gas turbines deployed at the Department of Water Resources' (DWR) sites in Yuba City and Roseville. The solution reduced nitrogen oxide (NOx) and carbon monoxide (CO) emissions by over 90%, surpassing World Bank Emissions Standards. It marked the world's first of a kind solution on a GE mobile TM2500. The technology helped lower emissions while supporting the statewide energy grid during extreme climate-driven events including drought or wildfires.



“GE’s aeroderivative mobile technology, typically used for emergency power, represents a perfect complement to renewable energy and peaking power use cases worldwide,” said Clive Nickolay, CEO of GE Gas Power’s Aeroderivative business line. “We’re excited about GE’s efforts to provide power plant operators with a technical solution that will allow them to quickly install peak power when needed, while drastically reducing NOx and CO emissions levels to low single digits.”

The technical solution includes engineering studies for the integration and installation of a Selective Catalytic Reduction (SCR) technology system—a proven and effective solution to limit post-combustion emissions. The technology works by removing common emissions through a catalytic converter transforming the nitrogen oxides contained in the exhaust gas into water vapor and nitrogen. The new solution unlocks dramatic enhancements to emissions performance while ensuring the TM2500 can provide reliable, affordable, and lower carbon electricity to the grid.

At Yuba and Roseville, GE worked with the engineering, procurement, and construction company Kiewit Power Constructors Co. to install this world’s first of this kind solution on a GE mobile gas power turbine to solve DWR’s emissions challenge. The emissions control solution includes 11-meter-high modules and a 22-meter-high stack. Each of the four TM2500 can produce up to 34 megawatts (MW) of electricity for a total of 136 MW and is now equipped with a system to reduce pollutants to 2.5 parts per million, the legal limit set by the state of California.

A key feature of the TM2500 units is its fast start ability providing full power in five minutes. This provides utilities and grid operators like California Independent System Operator (CAISO) or the Western Area Power Authority (WAPA) the ability to quickly support the grid in case of emergencies or loss of intermittent power. The quick start capability was successfully put to use when the units were brought online to support a strained statewide energy grid during California’s extreme heat wave on Sept 6, 2022.



GE's trailer-mounted TM2500 is derived from jet-engine technology powering the world's airlines and is mounted on a wheeled trailer for ultimate mobility. With more than 20 years of experience and over 300 units installed around the world, GE's TM2500 is a proven solution for providing a baseload bridge to permanent power installations, or for generating backup/peak power in the wake of natural disasters, plant shutdowns, grid instability or in isolated locations.

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### **About GE Gas Power**

GE Gas Power is a world leader in natural gas power technology, services, and solutions. Through relentless innovation and continuous collaboration with our customers, we are providing more advanced, cleaner, and efficient power that people depend on today and building the energy technologies of the future. With the world's largest installed base of gas turbines and more than 670 million operating hours across GE's installed fleet, we offer advanced technology and a level of experience that's unmatched in the industry to build, operate, and maintain leading gas power plants. For more information, please visit [www.ge.com/power/gas](http://www.ge.com/power/gas) and follow GE's gas power businesses on [Twitter](#) and [LinkedIn](#).

GE Gas Power is part of GE Vernova, a dynamic accelerator comprised of our Power, Renewable Energy, Digital and Energy Financial Services businesses, focused on supporting customers' transformations during the global energy transition

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