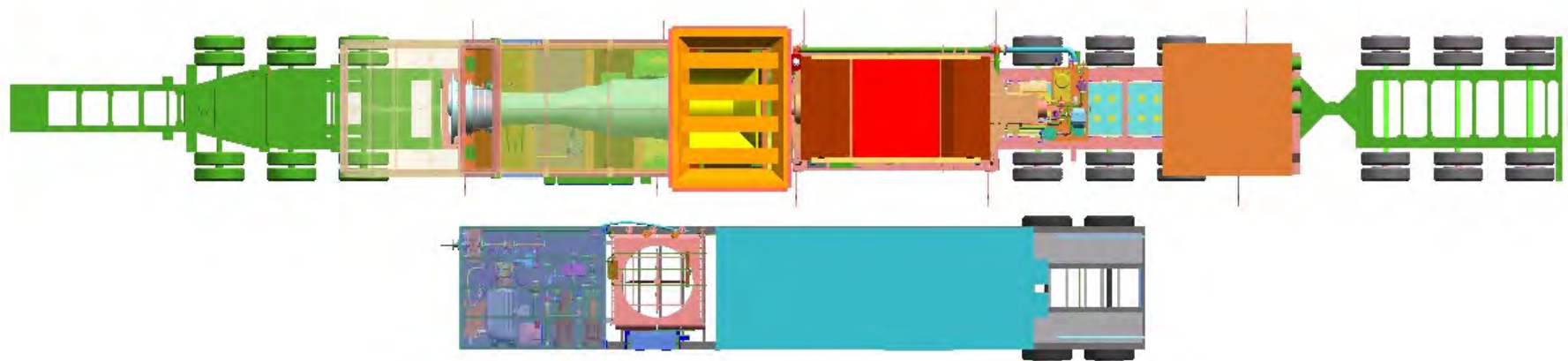
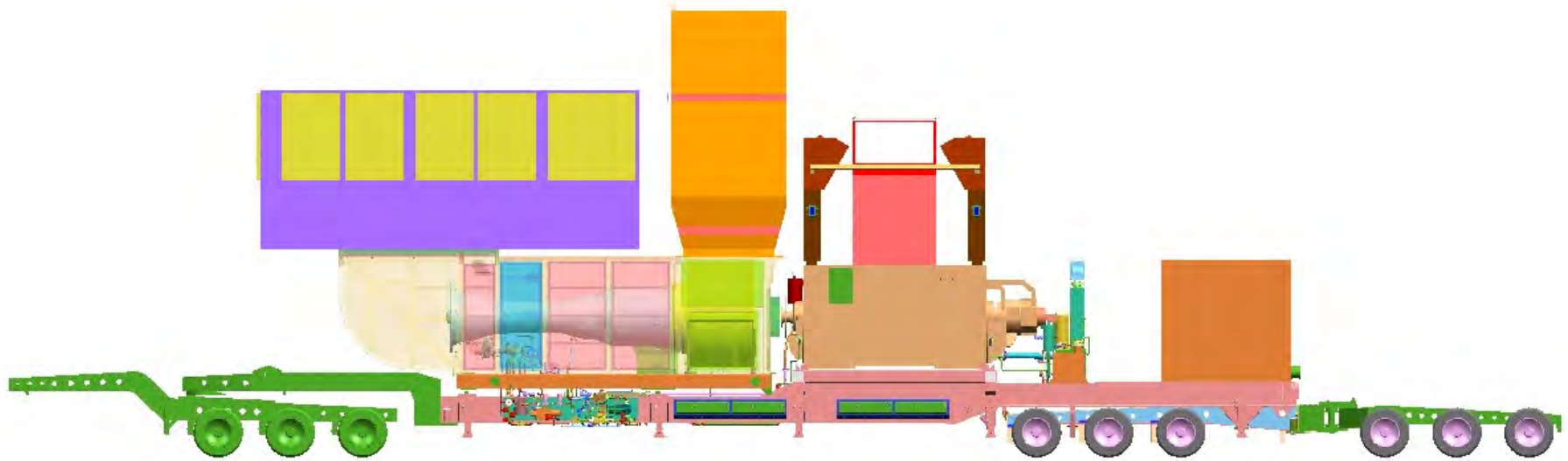


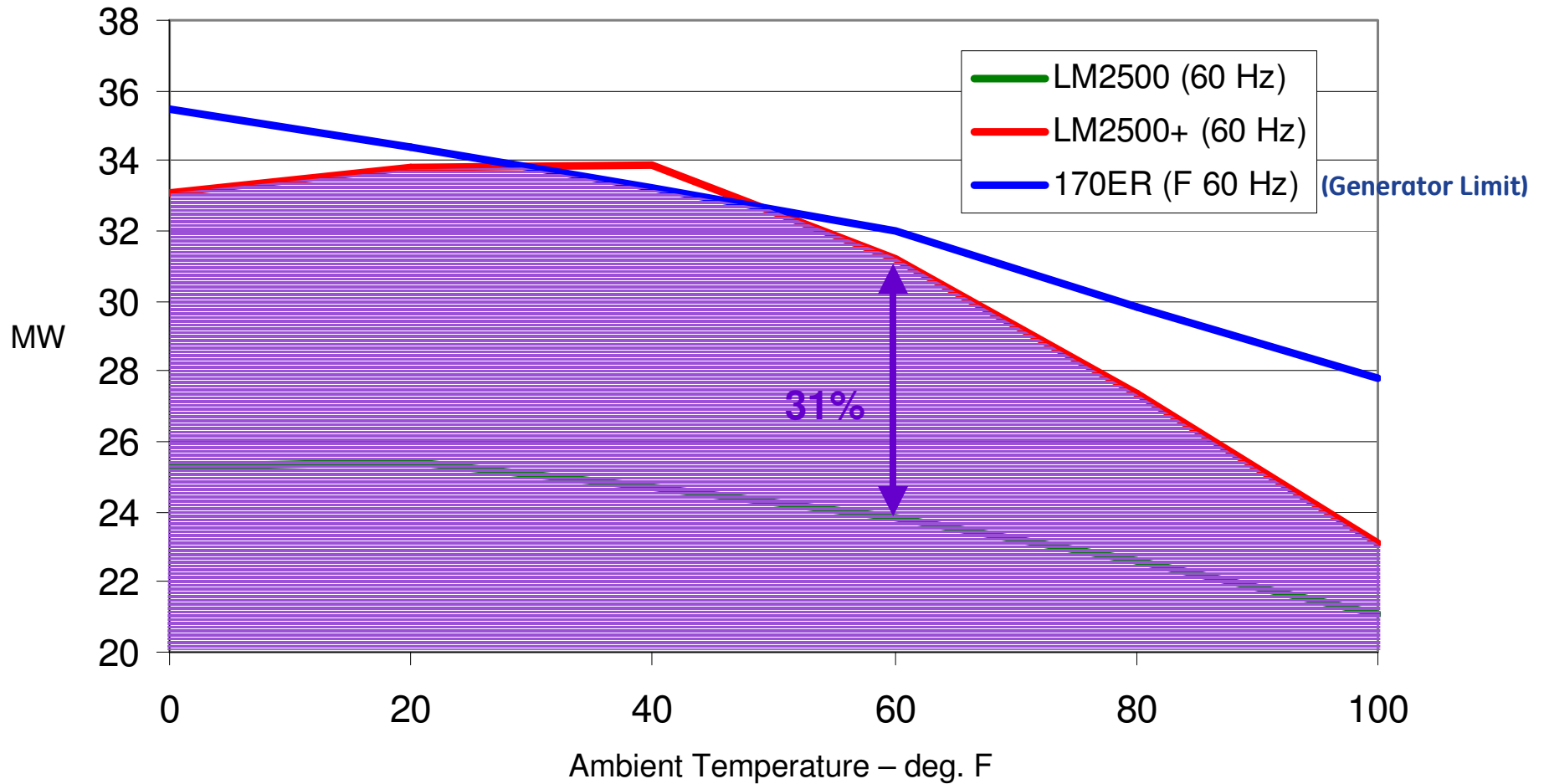
# Introducing the TM2500+



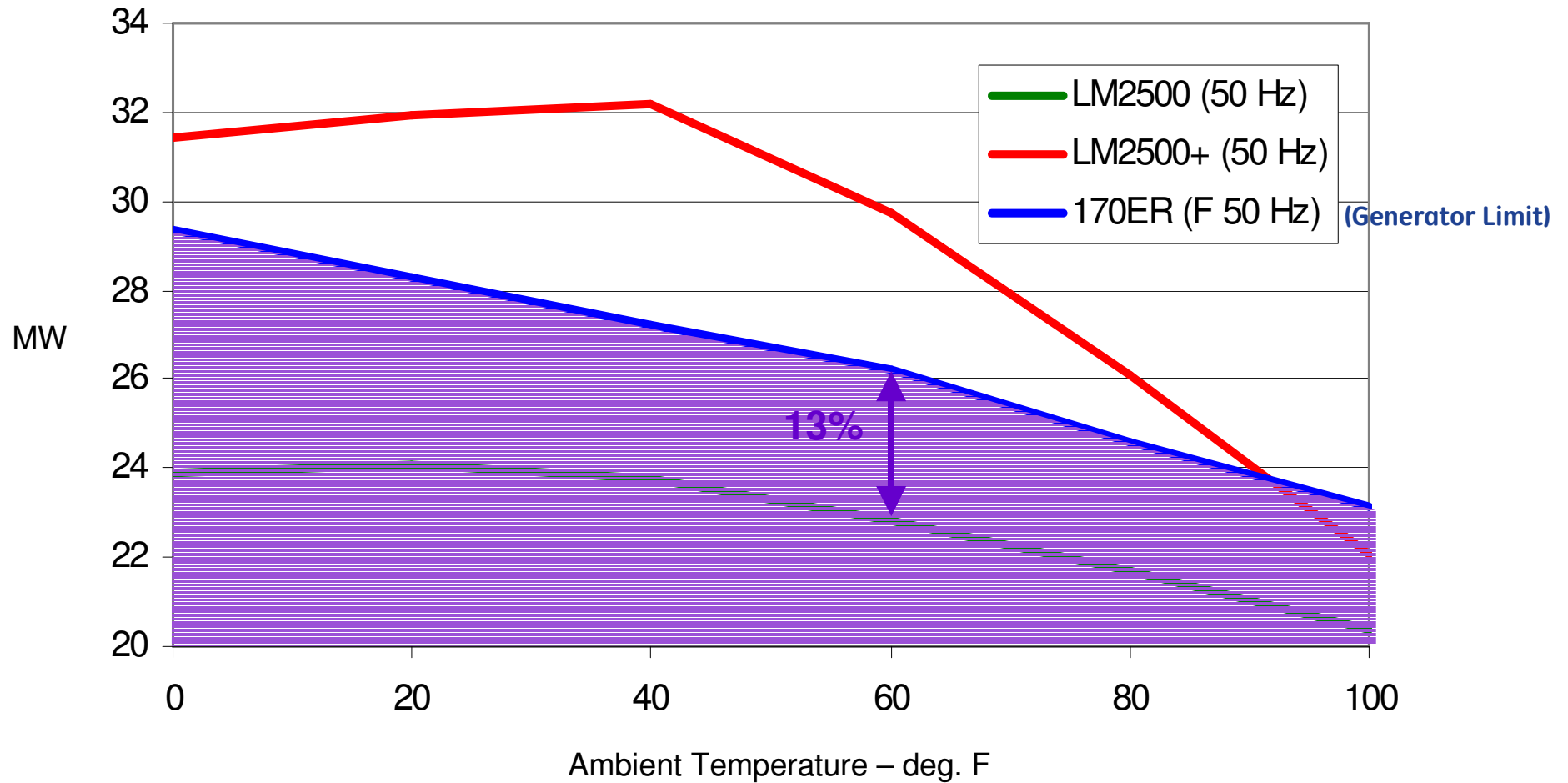
# What's New?

- **LM2500 PLUS gas turbine**
  - **Up to 30% more power!**
- Two-trailer design
  - 75% reduction in footprint
- Improved interconnection design
  - Faster installation and set-up

# 31% More Power at 60 Hz !



# 13% More Power at 50 Hz !

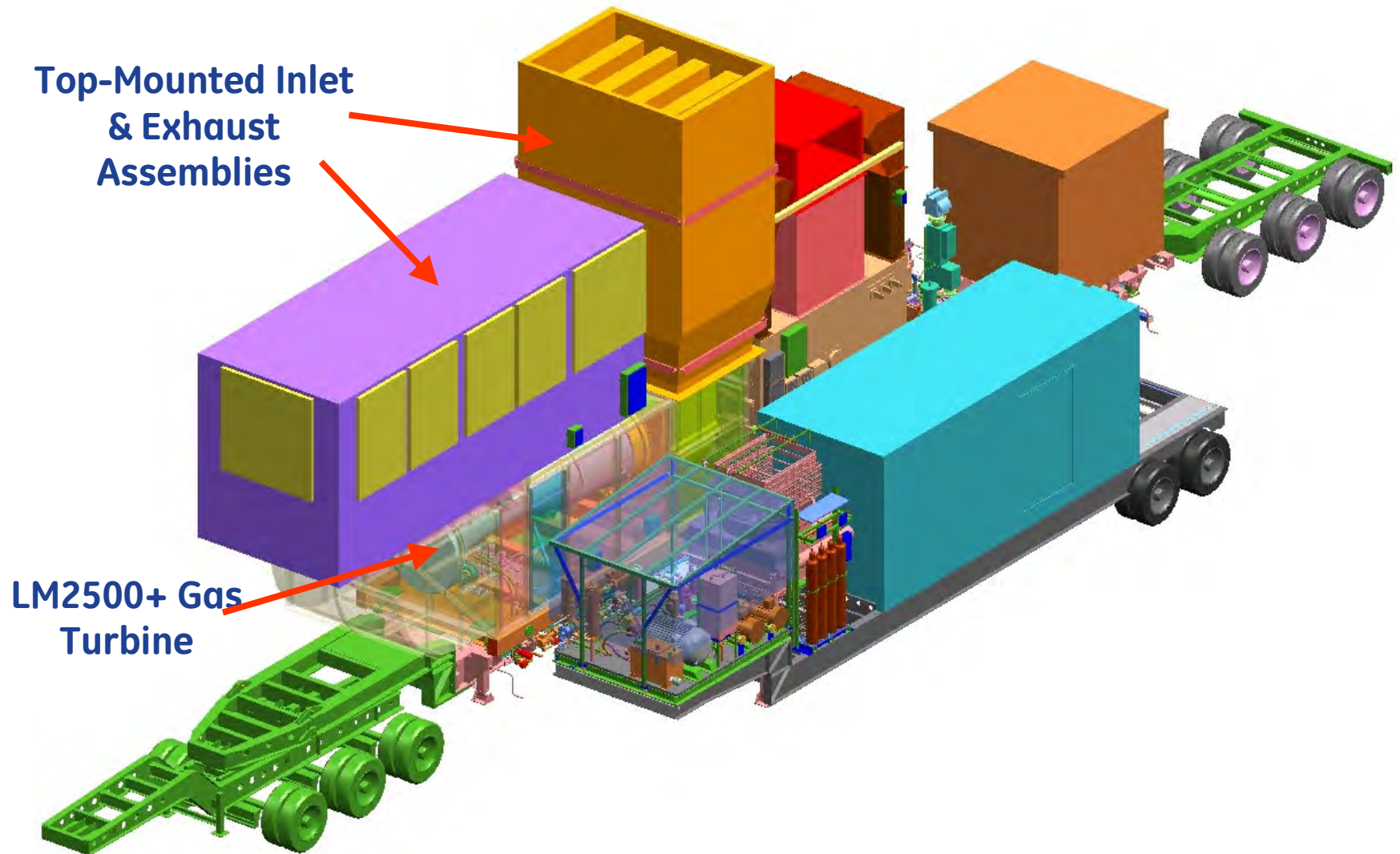


50 Hz Performance

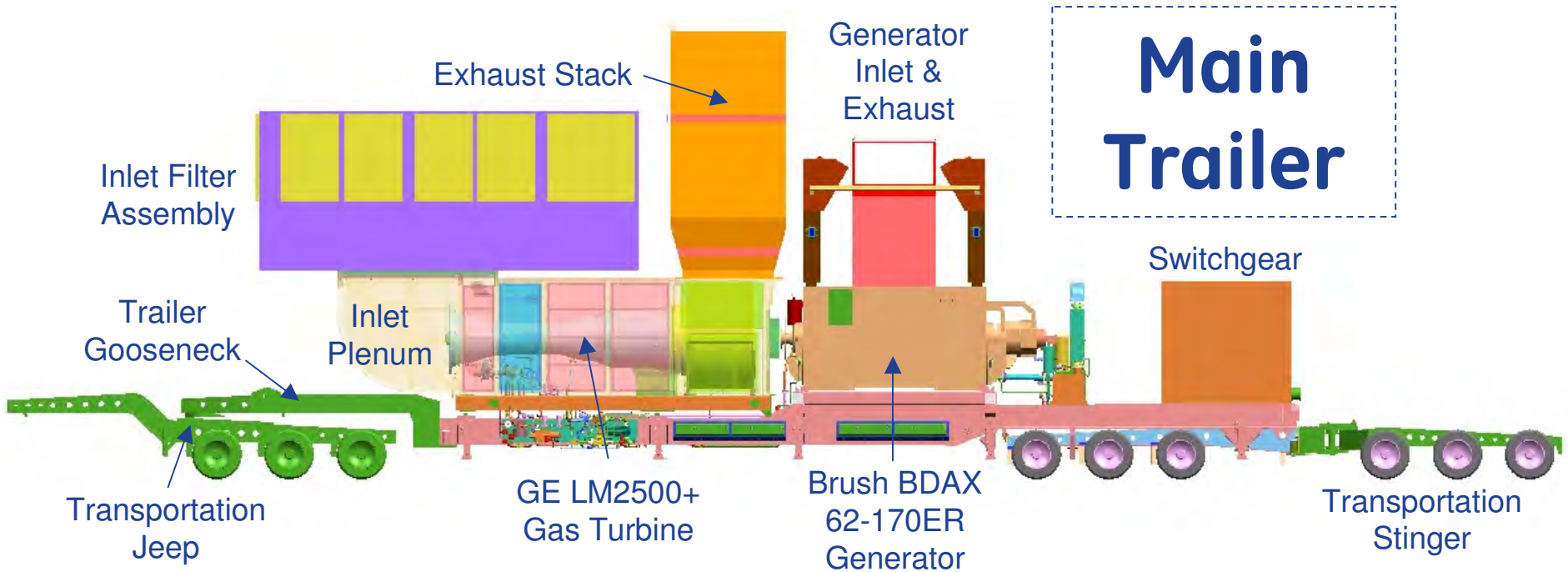
# What's New?

- LM2500 PLUS gas turbine
  - Up to 31% more power!
- **Two-trailer design**
  - **Smaller footprint**
- Improved interconnection design
  - Faster installation and set-up

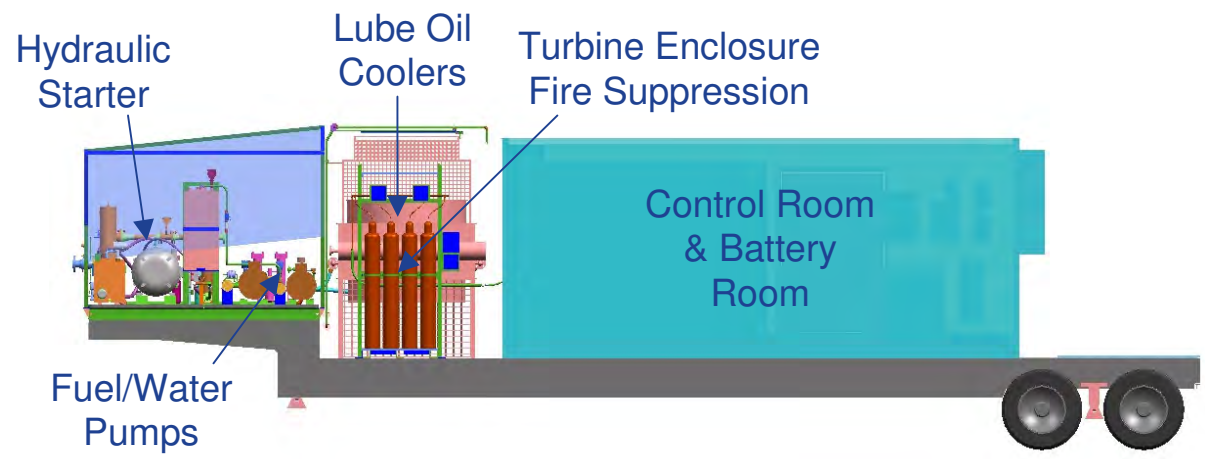
# New Two-Trailer Design



# TM2500+ General Arrangement



## Auxiliary Trailer



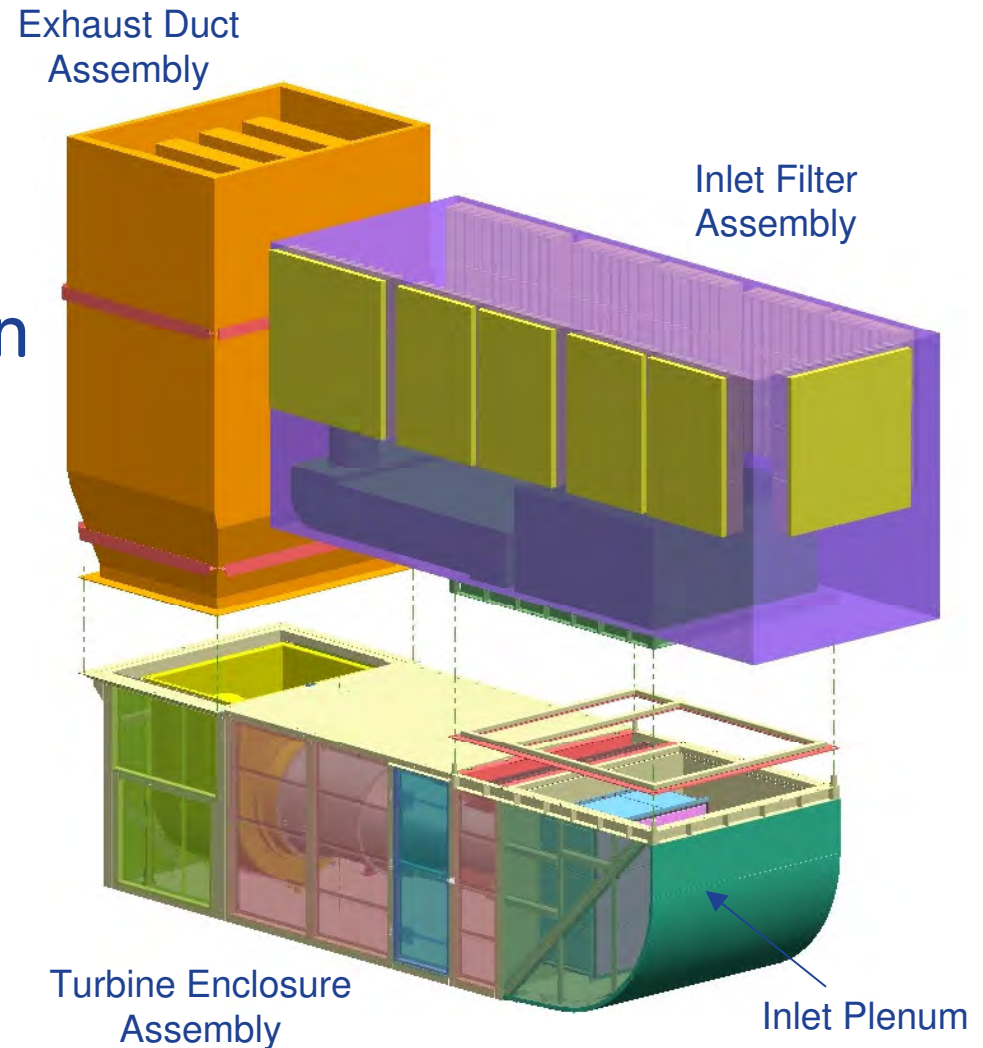


# What's New?

- LM2500 PLUS gas turbine
  - Up to 31% more power!
- Two-trailer design
  - Smaller footprint
- **Improved interconnection design**
  - **Faster installation and set-up**

# Interconnection Improvements for Faster Set-up

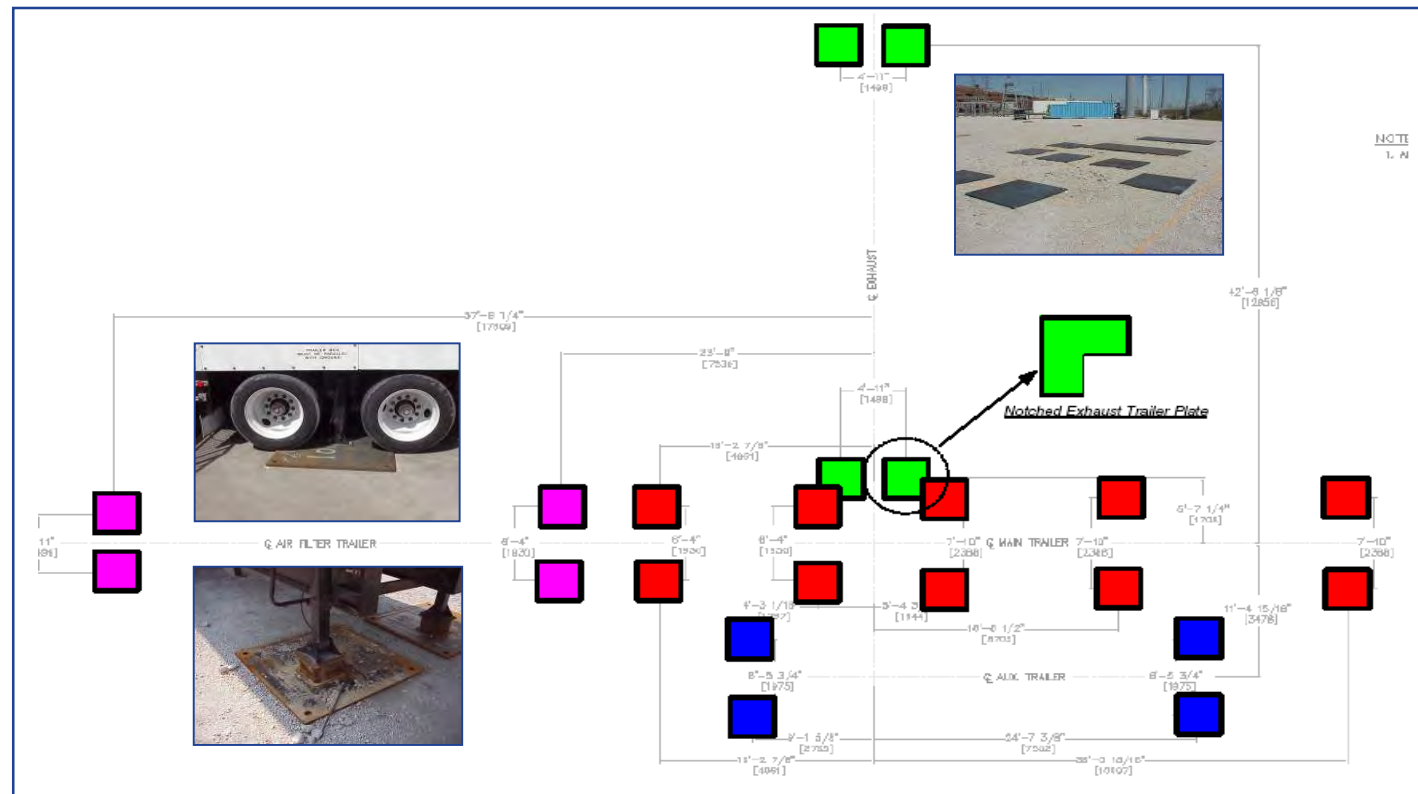
- Improved inlet & exhaust connections for quicker installation & set-up
- Can be set up in 24 hours



# Back-up

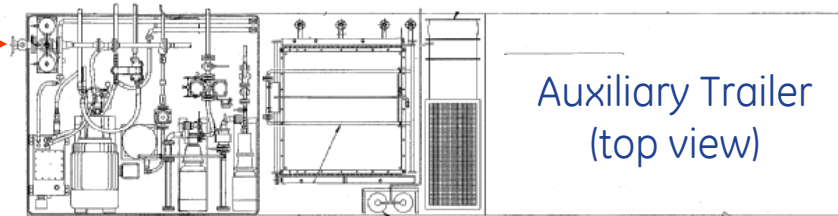
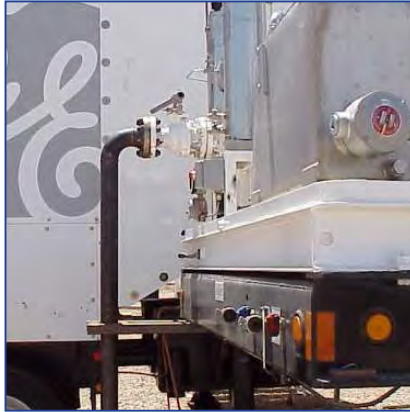
# Site Preparation / Foundation

- Level within 6 inches per 100 feet
- Solid crushed gravel with 1" steel plates
- Adequate access / space, well-lit, secure



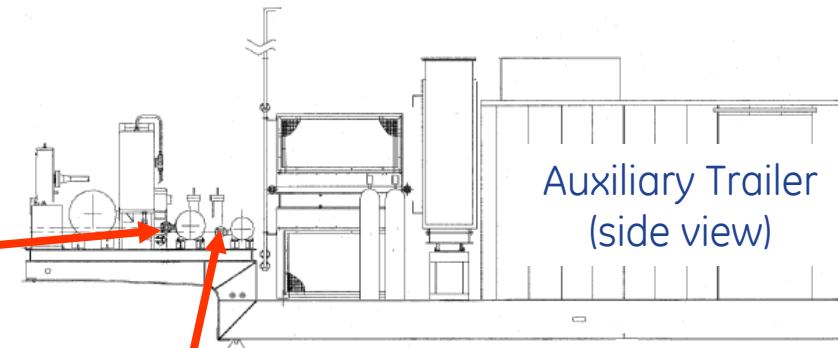
# Fuel / Water Connections

Natural Gas  
Supply (3" pipe)



Auxiliary Trailer  
(top view)

Liquid Fuel  
Supply (2" pipe)



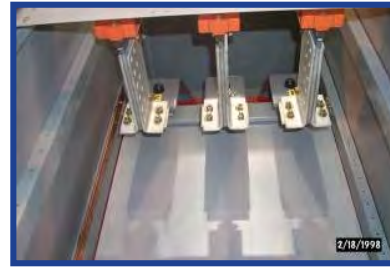
Auxiliary Trailer  
(side view)

NOx Water  
Supply (2" pipe)

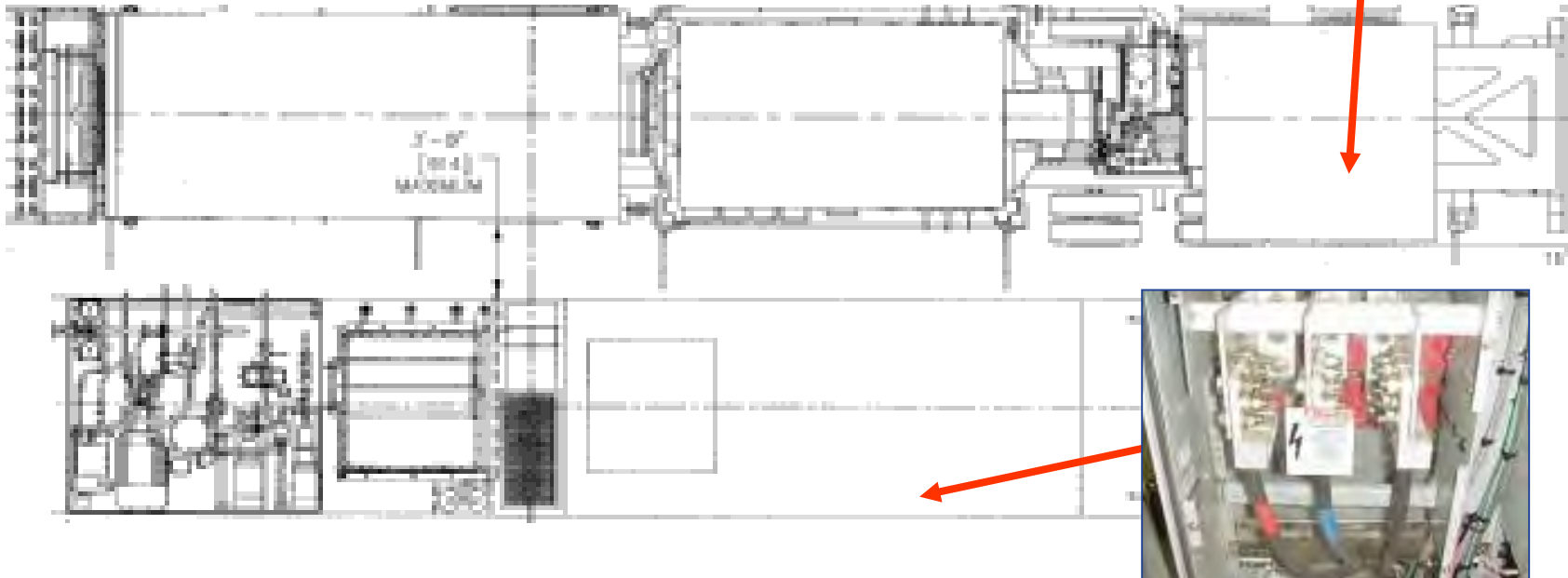


# Electrical Connections

- Generator output 13.8 kV @ 60 Hz (11.5 kV @ 50 Hz.)
- Auxiliary power requirement 480V, 60 Hz, to motor control center main circuit breaker (250 kW)

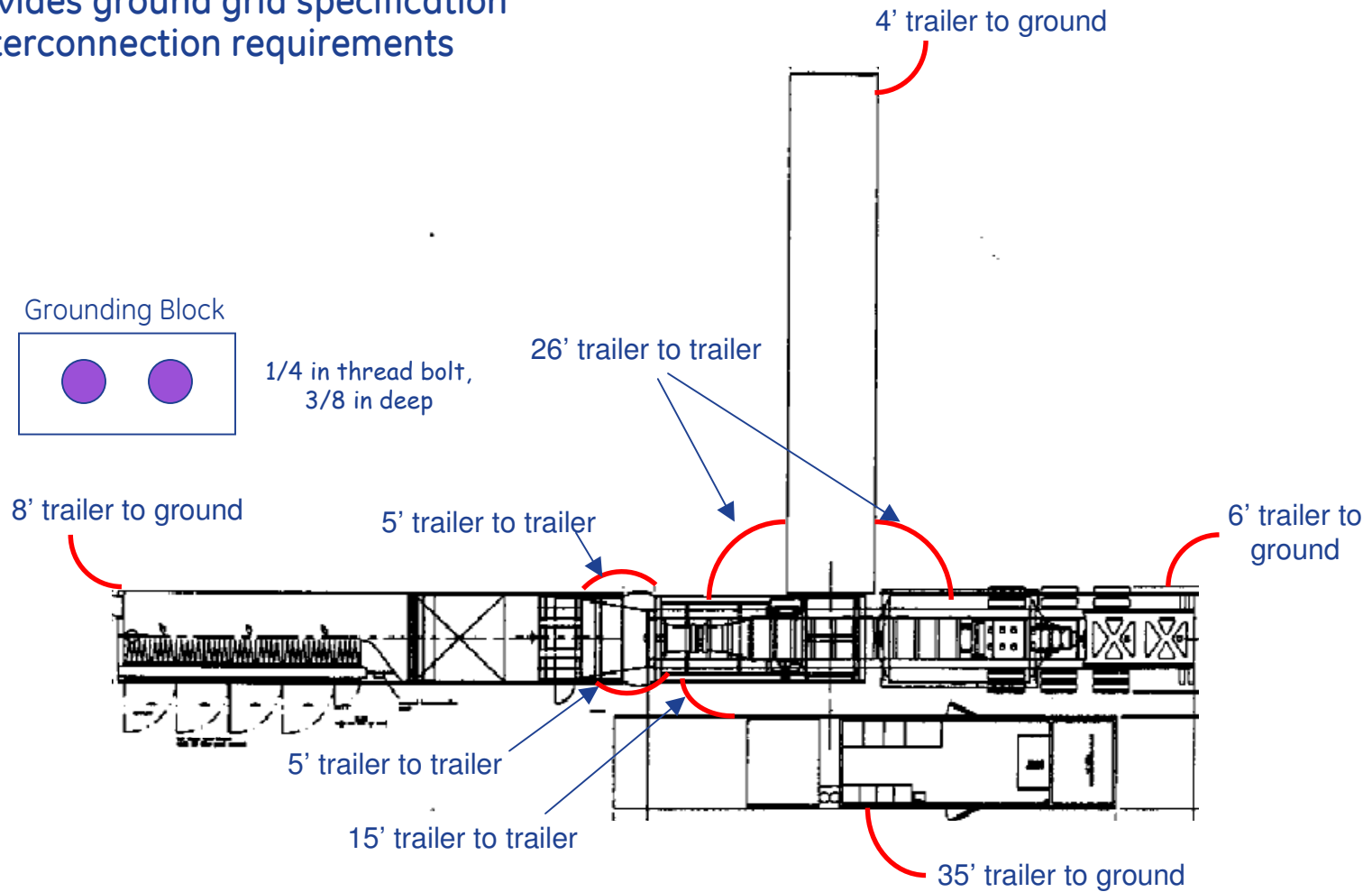


High Voltage Termination



# Grounding

- Customer furnished grounding system
- GE provides ground grid specification and interconnection requirements



# Customer Interface Details (TM2500)

## Fuel

- Gas supply pressure is 395 (+/- 20) PSIG at a rate of 12,000 pph (250 mmbtu/hr or 6 mscf/day)
- Liquid Fuel (diesel) supply pressure is 30 (+/- 10) PSIG, up to 40 GPM (max.)

## Water (for NOx suppression)

- Minimum supply pressure is 15 PSIG up to 28 GPM (max.)

## Inlet/Exhaust Air

- Nominal inlet air flow 150,000 CFM (120,000 turbine / 30,000 enclosure ventilation)
- Exhaust stack height is 20' when fully assembled
  - Flange dimensions 96" x 96"
  - Exhaust gas flow 490,000-550,000 lbs/hr

## Emissions

- Liquid Fuel: 42 ppm NOx with water injection
- Gas Fuel: 25 ppm NOx with water injection

## Noise

- Approximately 88 dBa

## Waste

- Lubricating oils (turbine & generator)
- Turbine wash detergent and rinse water



# TM2500 Unit Installation Equipment



Snorkel Lift (Telescopic Boom)



(Lull) 6,000 lb. Variable Reach Forklift



Front Loader w/forks to move sea containers



25-45 Ton Crane



**PEG**

*Power Energy Group*

## **SCOPE OF SUPPLY**

### **TM 2500+ MOBILE TURBINE GENERATOR**

- Gas Turbine
- Generator
- Unit Enclosure
- Main Trailer and Jeep
- Auxiliary Trailer
- Gas Turbine Baseplate
- Turbine Exhaust Stack
- Inlet Filter Assembly
- Fuel System
- Dematerialized Water Injection System
- Fuel Water Pumps
- Lube Oil Systems
- Switchgear
- Auxiliary Trailer
- Electro-Hydraulic Starting Module
- "Off Line" Soak Wash System
- Fire Protection System
- Fin Fan Cooler
- Turbine Ventilation Silencer
- Digital Control System
- Generator Protective Relays
- Unit Motor Control Center
- Battery and Charger System

## **Optional Equipment not included in the package**

- Absorption chiller and chilled water supply system
- Balance of plant and energy optimization controls
- Boiler feed pump and auto level control assembly
- Building, foundations, anchor bolts, embedment and grouting
- Bus bars and bus duct beyond generator line
- Cooling tower and circulating water system
- Deaeration and chemical injection equipment
- Desuperheater equipment
- Distributed plant control
- Filter house support structure, other than standard
- Field Supervision
- Fuel, fluids and chemicals
- Fuel storage tanks, forwarding equipment and primary fuel filter
- Gas compression, filtration and separation or regulation equipment
- Heat recovery boiler and blow down controls
- High voltage transformer(s), cables, switchgear and associated equipment
- Interconnecting piping, conduit, and wiring between equipment modules (site layout is unknown at this time)
- Plant utilities
- Power plant calibration tools and ordinary hand tools
- Spare parts (quoted separately)
- Steam filtration and purification equipment
- Steam turbine condenser and condensate pumping equipment
- Transportation to job site and off loading of equipment
- Water injection pressurization equipment
- Water treatment and purification equipment
- Yard light and fences