Based on proven aeroderivative gas turbine technology, the SGT-A45 mobile unit is an outstanding solution for fast power. With up to 44 MW of electrical output, it offers significantly more power and higher fuel efficiency than any other mobile gas turbine.

Features
- The world’s most powerful mobile gas turbine (up to 44 MWe)
- Fast deployment solution for urgent power needs
- Trailer-mounted modules with few, fast interconnections
- Each unit precommissioned and tested at the factory
- Core engine modules from SGT-A65 (Industrial Trent 60) matched to a proven free power turbine
- Proven, highly efficient aeroderivative turbomachinery

- Compact footprint
- Uses liquid or gas fuel, with flexibility to switch over at any time in operation
- Optional water injection for low NOx and instant power boost
- Dual-frequency package with simple configuration change
- Designed for integration in complete power solution
- Transportable by road, air, or sea

Benefits
- Mobile solution up to 44 MW(e), with outstanding power density
- Fast, flexible power on delivery with fewer units and lower $/kW
- Site installation and commissioning in less than 2 weeks
- Fast start (8 minutes or less) and flexible operation
- Easy transport to site and relocation
- High fuel efficiency
- Performance optimized for hot climates
- Dual-fuel flexibility (liquid and gas)
- Low-NOx option
- Layout and installation optimized for full power plant solution
- Same maintenance interval on gas and liquid fuel
- Restart at any time – no “hot lockout” or “hot standby”
Siemens can supply the required scope of Balance of Plant (BoP) equipment, integration services, or complete power solution. Financing options available.

**Scope of supply**

**Trailer 1**
- A/C generator
- Generator lubrication and cooling systems

**Trailer 2**
- Gas turbine
- Gas turbine ancillary systems (fuel, lube oil, etc.)

**Trailer 3**
- Unit control system
- Motor control center
- Switchgear
- Air inlet and filter and exhaust stack designed for simple and quick installation on unit at site.

**Mobile unit**
- Up to 44 MW(e) (ISO)
- 50 Hz or 60 Hz
- Liquid and gas fuel
- Emissions to < 25 vppm NOₓ
- Mounted on trailers
- Highly standardized

**Optional balance of plant scope**
- Generator step-up transformers
- Liquid fuel storage and treatment
- Water demineralization plant
- Natural gas compressors and filters

**Specification**

<table>
<thead>
<tr>
<th></th>
<th>50 Hz</th>
<th>60 Hz</th>
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<tbody>
<tr>
<td></td>
<td>15°C</td>
<td>30°C</td>
</tr>
<tr>
<td></td>
<td>15°C</td>
<td>30°C</td>
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<tr>
<td>Electrical power (ISO, dry)</td>
<td>41.0 MW(e)</td>
<td>39.3 MW(e)</td>
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<td></td>
<td>44.0 MW(e)</td>
<td>39.6 MW(e)</td>
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<tr>
<td>Electrical efficiency (ISO, dry)</td>
<td>39.0%</td>
<td>38.4%</td>
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<tr>
<td></td>
<td>40.4%</td>
<td>39.5%</td>
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<tr>
<td>Fuel type</td>
<td>Dual (gas &amp; liquid)</td>
<td>Water injection</td>
</tr>
<tr>
<td>Low emissions option</td>
<td>Water injection</td>
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<tr>
<td>Low emissions – gas fuel</td>
<td>25 vppm NOₓ</td>
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<tr>
<td>Low emissions – liquid fuel</td>
<td>42 vppm NOₓ</td>
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<tr>
<td>Turbine speed</td>
<td>3,000 rpm</td>
<td>3,600 rpm</td>
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<td>Pressure ratio</td>
<td>27.7 : 1</td>
<td>26.7 : 1</td>
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<td></td>
<td>27.9 : 1</td>
<td>25.8 : 1</td>
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<td>Exhaust gas flow</td>
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<td>120 kg/s</td>
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<td></td>
<td>126 kg/s</td>
<td>116 kg/s</td>
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<tr>
<td>Exhaust gas temperature</td>
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<td>501°C</td>
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<td></td>
<td>483°C</td>
<td>498°C</td>
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45 MW class core engine derived from the SGT-A65 (Industrial Trent 60)