

# Product Specifications For G3520H



## Generator Set Specifications

Continuous Rating	2519 / 2500 ekW @ 1.0pf
Fuel Type	Natural Gas, Hydrogen Blend (up to 25%)
Maximum Electrical Efficiency	45.30%
Frequency	50 / 60 Hz
RPM	1500
Frequency	50/60 Hz

## Engine Specifications

Engine Model	G3520H
Displacement	5956 in <sup>3</sup>
Aspiration	TA
Bore	6.7 in
Stroke	8.5 in
Compression Ratio	12.1

## Generator Set Dimensions

Length	302 in
Width	86 in
Height	97 in
Dry Weight - Genset	54675 lb

# G3520H Standard Equipment

## Control Panel

EMCP 4.3

## Air Inlet

Two-element single-stage air cleaner with enclosure and service indicator

## Cooling

Engine driven water pumps for jacket water and aftercooler  
Jacket water and SCAC thermostats  
ANSI/DN customer flange connections for JW inlet and outlet

## Circuit Breaker

LSI Long-Time, Short-Time, Instantaneous Annunciator  
Rear-mounted  
5000A 3-Pole IEC Rated Circuit Breakers

## Exhaust

Center section cooled turbocharger with Cat flanged outlet  
Dry exhaust manifolds, insulated and shielded  
Individual exhaust port and turbocharger outlet wired to Integrated Temperature Sensing Module (ITSM) with GECM providing alarms and shutdowns

## Fuel System

Electronic fuel metering valve  
Throttle plate, 24V DC actuator, controlled by GECM

## Fuel System

Fuel system is sized for 31.5 to 47.2 MJ/NM<sup>3</sup> dry pipeline natural gas with pressure of 10.2 to 34.5KPa to the engine fuel control valve

## Ignition System

Electronic Ignition System (controlled by ADEM A4)  
Individual Cylinder Detonation Sensitive Timing (DST)

## Generator

Caterpillar's Digital Voltage Regulator (CDVR) with 3-phase sensing and KVAR/PF control  
SR4B  
Crankshaft Vibration Damper and Guard  
Busbar connections  
Paint- Caterpillar Yellow except rails gloss black  
Winding temperature detectors  
Operation and maintenance manuals  
Parts book  
Anti-condensation space heater  
RH Service  
SR5

Reactive droop

## **Governing System**

ADEM A4 4-20mA (0-5V) Speed Input

## **G3520H Optional Equipment**

### **Air Inlet**

Mounting Brackets and Piping  
Air cleaner with precleaner

### **Circuit Breaker**

MP- Frame 6 Pole Bottom Cable Entry  
4000/5000A Neutral Current Transformer Automatic Selection  
No UV trip or package mounted CB Wiring  
Frame Mounting

### **Control Panel**

16 Point/32 Light Annunciator, Shipped Loose  
Remote Communications Module (PL1000T, PL1000E)  
Remote annunciator  
Local PC Monitoring  
Discrete I/O Module, 12 Digital Inputs, 8 'Form C' Relay  
Cat Connect: Ethernet, Satellite, Cell Telematics  
Engine failure relay  
Local alarm module  
Synchronizing module  
Remote PC Monitoring

### **Cooling**

Inlet/Outlet connections  
Coolant level drain line with valves, fan with guard

### **Exhaust**

Muffler and spark-arresting muffler with companion flanges  
Flange  
Elbow  
Flexible Fitting  
Exhaust Expander

### **Fuel System**

Gas Knockdown Regulator  
Fuel filter  
Gas pressure regulator  
Gas shutoff valve 24V, ETR (Energized-To-Run)

### **Generator**

Bearing temperature detectors  
Cable access box  
Low voltage extension box  
Manual voltage control

European bus bar  
Generator air filter  
Medium and high voltage generators and attachment

## **General**

Digital diagnostic tool  
Special paint order  
Tool set  
US AID Emblem

## **Starting/Charging**

Battery with cables and rack (shipped loose)  
24V starting motors  
Jacket water heater  
60A, 24V charging alternator (requires engine driven pumps)

## **Grid Code Compliance**

60 Hz: USA  
50 Hz: Germany, Great Britain, Belgium, Romania, Italy, Ireland, Poland, Netherlands, Spain, France, and European Standard