# **BOLLARD™ MG156 Series**

156kW Marine Generator Specifications

# **156kW**





\* Drawings or pictures may show non-standard equipment

# **Features and Benefits**

### Unsurpassed Quality & Reliability

- BOLLARD™ Generators are designed and built in the USA specifically for the rugged conditions of commercial use. The expected time between overhauls on the BOLLARD™ packaged generator set is 40 to 50 thousand hours.

#### 1: High Efficiency Generators

 Heavy Duty windings engineered for 80°C rise of 40°C ambient yield extended insulation service life, high electrical efficiency for maximum fuel economy, and superior motor starting at all voltages. PMG dedicated excitation is standard, resulting in even higher motor starting together with 300% sustained short circuit capacity along with VFD and paralleling compatibility.

#### Emissions

- The Bollard MG50 –MG 395 Gen-Sets are EPA certified Tier 3 Marine, CARB, EU, and MOC. They meet the lowest emissions levels available on the market today without exhaust after-treatment resulting in reduced maintenance and operating costs while preserving our clean air and water quality.

#### Keel Cooling, Heat Exchange, or Radiator Compatibility

#### **Premium Marine Grade Protection**

 Bollard generators feature Imron<sup>™</sup> 2 part marine epoxy overcoats on the engine, generator, and baseframe. Accessory brackets are typically powder coated, and fasteners are primarily stainless steel to protect your investment from the harsh marine environment.

#### 2: Heavy Duty Structural Steel Base Frame & Reduced Noise

- For ease of installation, added structural integrity, safety and durability. Superior vibration and noise dampening with a high mass flywheel, polyurethane vibration isolators, mass loaded & stiffened baseframe, and de-noised engine.

#### 3: Heavy Duty Air Intake Filtration & Silencing

- For increased performance, extended engine life, and quiet operation

#### Controls, Gauges, & Instrumentation

- Standard enclosed prewired J1939 digital control panel with key start/stop and run/idle switch. Safety shutdowns are programmed for high water temp, low oil pressure, and over-speed. Included are LED readout of all J1939 trouble codes and diagnostics. Custom panels offer, auto-start/stop function for inverter or paralleling interface, load sharing, digital generator output LEDs and full function electrical distribution switchboards.

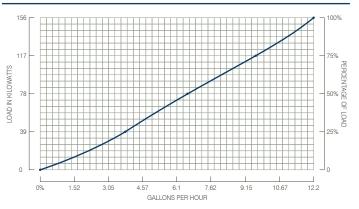
#### Optional SEADRIVE<sup>™</sup> Front Power Take Off System

- Compact heavy duty housing, pre aligned, easy to install, service friendly, integrated torsional coupling, and available with or without a clutch.

#### **General Specifications**

| Engine Model                     | 6068AFM85                                 |
|----------------------------------|---|
| Engine Type                      | In-Line   6 Cylinder   Diesel             |
| Displacement - L (cu.in)         | 6.8 (414.96)                              |
| Bore x Stroke - mm (in)          | 107 (4.21) x 127 (5.00)                   |
| Aspiration                       | Turbocharged - Air-to-Coolant Aftercooled |
| Oil Sump Capacity - qts (L)      | 20.07 (19)                                |
| Emission Regulation              | EPA Commercial Marine Tier 3              |
| Prime - 60hz, 1800RPM (HP)       | 156 kW (209)                              |
| Standby - 60Hz, 1800RPM (HP)     | 171kW (229)                               |
| Motor Starting Range - HP        | 114 (Code G Motor @ 208VAC)               |
| Voltage Regulation               | +/25%                                     |
| Starter                          | 12v   4.5 kW                              |
| Alternator                       | 12v   120 Amp                             |
| Operating Angle                  | 20° (Constant)   30° (Intermittent)       |
| Dry Weight - Ibs                 | 3439 (engine, 431 gen, skid)              |
| Length x Width x Height - inches | (see back for details)                    |

#### **Fuel Performance**

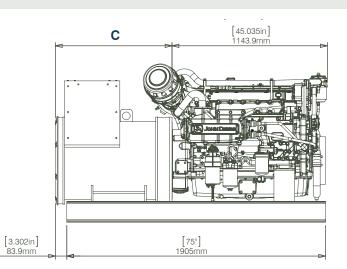




**Alternate Dimensions** 

431-6206

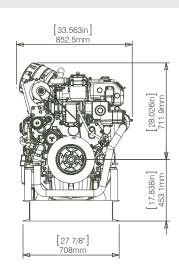
UCI274H



C - Length - In

33.89" (38.49" w/ PMG)

37.95" (40.45" w/ PMG)



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\* Dimensions are subject to change without notice and or with the use of alternate generators and cooling systems.

\* Please confirm exact configuration if dimensions are critical.

| Load Performance               | 25%   | 50%   | 75%   | 100%  |
|--------------------------------|-------|-------|-------|-------|
| Load in kW                     | 39.01 | 78.02 | 117   | 156   |
| Pounds Per Hour                | 26.98 | 46.15 | 68.16 | 86.62 |
| Gallons Per Hour               | 3.8   | 6.5   | 9.6   | 12.2  |
| kW Per Gallons Per Hour        | 10.27 | 12    | 12.19 | 12.79 |
| Pounds Per Gallon              | 7.1   | 7.1   | 7.1   | 7.1   |
| Continuous kW Output           | 156   | 156   | 156   | 156   |
| Horsepower At Load             | 55.75 | 111.5 | 167.3 | 223   |
| Horsepower Continuous          | 223   | 223   | 223   | 223   |
| Pounds Per Horsepower Per Hour | .295  | .252  | .248  | .237  |

Weight

1415

1380

## **Customizable Options and Accessories**

| Engine                                 | <b>Controls &amp; Instrumentation</b> | DC Electrical System           | Exhaust                            | Additional Options              |
|--|---------------------------------------|--------------------------------|------------------------------------|---------------------------------|
| Single Circuit Keel Cooling Package    | Control Panel                         | Battery: 12v   24v             | SS Wet Exhaust Mixing Elbow        | Sea Trial Start Up              |
| Single Circuit Heat Exchange Package   | Custom Harness Length                 | Battery Rack & Cables          | Dry Exhaust Matching Flange        | MER Site Start-Up w/ Load Bank  |
| Single Circuit Marine Radiator Package | Auxiliary Start Panel                 | Battery Isolation Switch       | SUPERFLEX™ Exhaust Bellows         | Custom Frame / Skid             |
|  | Auto Start/Stop                       |                                | Cowl & EM Exhaust Silencers        | Dual Vibration Isolation Mounts |
| Motor Starting Upgrade Options         | Pre-Alarm Senders                     | Fuel-Lube Oil System           | Heat Recovery Silencer             | Custom Sound Enclosure          |
| (Code G Motor @ 208VAC)                | AC Meter Panel                        | SCOR™ Oil Regeneration System  |                                    | Galvanized or Powder Coated     |
| Up to 1:1 HP per kW                    | Low Coolant Level Shutdown            | Oil Drain Extension W/ Valve   | Power Take Off                     | Skids & Accessories             |
|  | High Water Temp. Shutdown             | Oil Drain Pump To Engine       | SEADRIVE™ Clutched Front PTO       | Racor Fuel Water Separator      |
| Air Intake & Filtration                | Low Oil Pressure Shutdown             | Move Dipstick To Opposite Side | Clutch: Air   Oil   Electric       |                                 |
| K&N Air Filters                        | Low Oil Level Gauge/Shutdown          | High/Low Oil Level Shut Down   | SEADRIVE™ Direct Drive Front PTO   |                                 |
| Donaldson Air Silencer                 | Overspeed Shutdown                    | Custom Oil Drain Hose Length   | Aux. A/B 2 Sheave Universal Pulley |                                 |
| Closed Crank Case Vent Loop            | Paralleling & Load Share              | Single Side Service            | Aux. A/B 4 Sheave Universal Pulley |                                 |
|  | Over-Voltage Alarm                    | Lube Oil Drip Pan              | Additional Belts                   |                                 |
|  | Over-Current Alarm                    |                                |                                    |                                 |
|  | Under-Current Alarm                   |                                |                                    |                                 |
|  |                                       |                                |                                    |                                 |

