

# Diesel generator sets for the Ag Market



### **Features and Benefits**

Robust product design and testing - The generator is designed to operate under extreme environmental conditions. The generator is tested and certified per the latest EPA and UL standards.

**Heavy duty engine** - Rugged 4-cycle industrial diesel delivers reliable power and fast response to load changes.

**Alternator** - Several alternator sizes offer selectable motor starting capability with low reactance 2/3 pitch windings, low waveform distortion with non-linear loads and fault clearing short-circuit capability.

**Control system** - Provides total generator set system integration including automatic remote starting/stopping, precise frequency and voltage regulation, alarm and status message display, output metering, auto-shutdown at fault detection and NFPA 110 Level 1 compliance.

**Cooling system** - Standard cooling package provides reliable running at up to 50 °C (122 °F) ambient temperature. Coolant heaters also come standard on generator sets for starting well below freezing.

**Battle Short Mode** – This mode will allow the generator to override certain faults that would normally shut the generator down.

Flexible exercise mode - The innovative, flexible exercise mode enables the generator to exercise at a time, frequency and duration that suits the customer's preference reducing unnecessary fuel consumption, emissions and noise.

Self-diagnostics and easy service - The generator is equipped with Cummins PowerCommand® electronic control to provide industry-leading self-diagnostic capabilities. In addition, critical components of the generator are designed to ensure service and preventive maintenance can be completed in a short period of time

		Standby 60 Hz		Prime 60 Hz	
Model	Model Number	kW	kVA	kW	kVA
C60 D6	A057P701	60	75	54	68
C80 D6C	A057P702	80	100	72	90
C100 D6C	A057P703	100	125	90	113
150 DSGAC	A053X164	150	188	135	169

Generator set specifications	C60 D6	C80 D6C	C100 D6C	150 DSGAC	
Controller	PowerCommand 1.1	PowerCommand 2.3		PowerCommand 1.1	
Operating temperature range	-40°F to	-0°F to		-40°F to	
Operating temperature range	+122°F	+122°F		+122°F	
Circuit Breaker	250 A	400 A	600 A	None	
Governor regulation class	ISO8528 Part 1 Class G3				
Voltage regulation, no load to full load	± 1.0%				
Random voltage variation	± 1.0%		± 0.5%		
Frequency regulation	Isochronous				
Random frequency variation	± 0.50%		± 0.25%		
Radio frequency emissions compliance	FCC code title 47 part 15 class A and B				

Engine specifications	C60 D6	C80 D6C	C100 D6C	150 DSGAC	
Design	QSB3.3	QSB5		QSB7	
Displacement	3.26 L (199 in <sup>3</sup> )	4.5 L (272 in³)		6.69 L (408 in <sup>3</sup> )	
Cylinder block		Cast iron, in-line			
Battery capacity (at ambient temperature of 0 °C (32 °F))	850 amps	850 amps		1100 amps	
Battery charging alternator	50 amps 100 amps				
Starting voltage	12 volt, negative ground				
Lube oil filter type(s)	Spin-on with relief valve				
Standard cooling system	High ambient radiator				
Rated speed	1800 rpm				

Alternator specifications	C60 D6	C80 D6C	C100 D6C	150 DSGAC
Design	Brushless, 4 pole, drip proof, revolving field			
Stator	2/3 pitch			
Rotor	Direct coupled, flexible disc			
Insulation system	Class H per NEMA MG1-1.65			
Standard temperature rise	120 °C (248 °F) Standby			
Exciter type	Torque match (shunt) with PMG as option			
Alternator cooling	Direct drive centrifugal blower			
AC waveform Total Harmonic Distortion (THDV)	< 5% no load to full linear load, < 3% for any single harmonic			
Telephone Influence Factor (TIF)	< 50 per NEMA MG1-22.43			
Telephone Harmonic Factor (THF) < 3%				

## **Accessories**

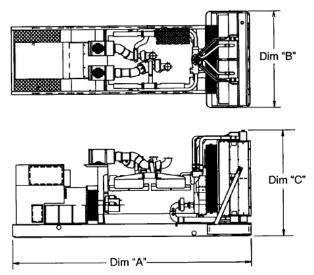
- Battery heater kit
- Engine oil heater
- Remote control displays
- Auxiliary output relays (2)
- Auxiliary configurable signal inputs (8) and relay outputs (8)
- Annunciator RS485

- Audible alarm
- Remote monitoring device PowerCommand 500/550
- Battery charger stand-alone, 12 V
- Circuit breakers
- Enclosure Sound Level 1 and Sound Level 2
- Base barrier elevated generator set
- Alternator heater

# **Transfer switch (sold separately)**

- Automatic Transfer Switches available in various amperages.
- Service Entrance models are also available, which helps reduce the installation cost.
- All models UL listed to UL 1008 standard.
- Available for both Indoor and Outdoor applications.
- Compatibility with Cummins generator set helps reduce the installation time for the complete application.

**Fuel tanks** - Dual wall sub-base fuel tanks are offered as optional features, providing economical and flexible solutions to meet extensive code requirements on diesel fuel tanks.



This outline drawing is for reference only. See respective model data sheet for specific model outline drawing number. **Do not use for installation design** 

Model	Dim "A" mm (in.)	Dim "B" mm (in.)	Dim "C" mm (in.)	Set weight*wet kg (lbs.)
C60 D6	2235 (88)	864 (34)	1118 (44)	726 (1596)
C80 D6C	2489 (98)	1016 (40)	1321 (52)	1085 (2386)
C100 D6C	2489 (98)	1016 (40)	1321 (52)	1109 (2439)
150 DSGAC	2667 (105)	1092 (43)	1549 (61)	1459 (3209)

<sup>\*</sup> Weights above are average. Actual weight varies with product configuration.

#### **Codes and standards**

Codes or standards compliance may not be available with all model configurations – consult factory for availability.

150 9001	This generator set is designed in facilities certified to ISO 9001 and manufactured in facilities certified to ISO 9001 or ISO 9002.		The generator set is available Listed to UL 2200, Stationary Engine Generator Assemblies.
PTS	The Prototype Test Support (PTS) program verifies the performance integrity of the generator set design. Cummins products bearing the PTS symbol meet the prototype test requirements of NFPA 110 for Level 1 systems.	U.S. EPA	Engine certified to U.S. EPA SI Stationary Emission Regulation 40 CFR, Part 60.

**Warning:** Back feed to a utility system can cause electrocution and/or property damage. Do not connect to any building's electrical system except through an approved device or after building main switch is open.

For more information contact your local Cummins distributor or visit power.cummins.com



