

# Rental Power 150 kW



## **Description**

This Cummins Power Generation rental package is a fully integrated mobile power generation system, providing optimum performance, reliability, and versatility for standby and prime power applications.

#### **Features**

#### **Cummins diesel engines**

- · U.S. EPA Tier III compliant
- Rugged 4-cycle industrial diesel engine with excellent transient performance
- · Lightweight, compact and excellent fuel economy
- 2-stage spin on fuel filter w/pre-filter water separator with drain
- Equipped with heavy duty, 2-stage air cleaners with dust ejector

## **Control features**

- The most advanced, reliable and capable generator set control system on the market today
- Controls provide precise frequency and voltage regulation, alarm and status message display in one easy to operate customer interface
- Remote monitoring and operation readv
- Auto shutdown at fault detection

#### **Engine controls**

- Oil Pressure and Water Temp Gauge
- Fuel Level Gauge & Battery Voltage Gauge
- Hour meter

#### **Stamford alternators**

- 12-lead reconnectable alternators fitted with voltage selection switch
- Permanent magnet excitation for improved performance in non-linear load applications

## Rental package enclosure

- Sound attenuated, white powder coated lockable enclosure
- Roof mounted, single point lift
- Cooling system rated for 120° F (50° C) ambient
- · Complete engine fluid containment reservoir
- Shore power (120 VAC) No breakers in shore power connection.

#### Standard generator electrical features

- Single phase convenience receptacles
- Distribution panel with L1, L2, L3 neutral and ground
- Main line shunt trip type circuit breaker
- · Auto start-stop with remote contacts
- Over current sensing
- 3 available auxiliary connections

#### **Generator electrical options**

- Multiple voltage selector switch (480/277 VAC/ 3 phase or 208/120 VAC/3 phase or 240/120 VAC/ 1 phase
- 600V/480V switchable
- Barrel lug connection
- Cam lock distributionpanel
- Heated HMI

#### Additional rental package features

- · Tank style coolant heater
- · Low coolant shutdown system
- · Battery disconnect switch
- Base mount generator see Options for trailers

#### **Rental package options**

- DOT approved electric brake trailer with heavy duty center mounted jack, ball or pintle hitch
- DOT approved hydraulic brake trailer with heavy duty center mounted jack, ball or pintle hitch
- 110V, 5 Amp battery charger
- 25 hour fuel tank (100% prime) with gauge
- Transport Canada UN31A compliant fuel tank

		Standby Rating		Prime	Rating		
	W-H 00	60 Hz	50 Hz	60 Hz	50 Hz	Engine	Alternator
Model	Voltages (V)	kW (kVA)	kW (kVA)	kW (kVA)	kW (kVA)	model	model
C150D6R	208/480	<b>150</b> (188)		<b>135</b> (169)		QSB7-G3	UCI274F
	480/600 switchable	<b>150</b> (188)		<b>135</b> (169)		QSB7-G3	UCI274H

# **Engine specifications**

Engine model	QSB7-G3
Alternator data sheet	UCI274F (208/480), UCI274H (480/600 switchable)
Engine data sheet	DS-91910
Tier rating	TPEM (Tier III)
Design	4 cycle, In-Line, turbocharged and after-cooled
Bore	107 mm (4.21 in.)
Stroke	124.0 mm (4.88 in.)
Displacement	6.69 liters (408 in³)
Cylinder block	Cast iron, In-Line 6 cylinder
Battery capacity	2 x 750 cca
Battery charging alternator	100 amps
Starting voltage	12 volt, negative ground
Fuel system	Direct injection HPCR system
Fuel filter	Spin on fuel filter with water separator
Air cleaner type	2-stage, dry replaceable element with dust ejector
Lube oil filter type(s)	Single spin-on, full flow
Standard cooling system	122° F (50° C) ambient radiator

# **Alternator specifications**

Design	Brushless, 4 pole, drip proof revolving field
Stator	Double layer concentric, 2/3 winding pitch
Rotor	Singe bearing, flexible disc
	Class H per NEMA MG1-1.65 (208/480 VAC)
Insulation system	Class F per NEMA MG1-1.65 (480/600 VAC switchable)
	115/50° C prime (208/480 VAC)
Standard temperature rise	95/50° C prime (480/600 VAC switchable)
Exciter type	PMG (permanent magnet generator)
Phase rotation	A (U), B (V), C (W)
Alternator cooling	Direct drive centrifugal blower fan
AC waveform total harmonic distortion	< 1.5% no load, < 5% non-distorting balance linear load
Telephone influence factor (TIF)	< 50 per NEMA MG1-22.43
Telephone harmonic factor (THF)	< 2%

# **Power capability specifications** (Assume power factor = 0.80 for 3 phase amps)

	Standby rating			
	240 V, 1 phase Amps	208 V, 3 phase Amps	480 V, 3 phase Amps	600 V, 3 phase Amps
C150D6R	431	520	226	180

# **Electrical power panel specifications**

Model voltage	120 V duplex Model voltage receptacles		Load lug connection (stud diameter)	Load lug circuit breakers	
120/480 Volt	2 - 20 Amp GFCI	3 - 50 Amp	1/2 inch	600 Amp	
480/600 Volt switchable	0	0	1/2 inch	300 Amp	

# **Site derating factors**

Standby application: The engine may be operated at 1800 rpm up to 3,600 ft (1097 m) and 113° F (45° C) without power deration. For sustained operation above these conditions, derate by 4% per 1,000 ft (300 m), and 8% per  $18^\circ$  F ( $10^\circ$  C).

# **Control system**

#### **PowerCommand control**

- Integrated automatic voltage regulator and engine speed governor
- Control components designed to withstand the vibration levels typical in generator sets

#### Standard control description

- Analog AC frequency meter
- Analog AC voltage meter
- Cycle cranking control
- Digital display panel
- Idle mode control
- Menu switch
- · Panel backlighting
- Remote starting, 12 V, 2 wire
- · Reset switch
- Run-off-auto switch
- Sealed front panel, gasketed door
- · Self diagnostics

#### Standard performance data warnings

- High coolant temperature
- High DC voltage
- · Low coolant temperature
- Low DC voltage
- · Low oil pressure
- Over current
- Weak battery
- Over speed
- Under frequency
- Intake manifold temperature OOR high/low
- Intake manifold temperature high
- Water in fuel OORH/OORL
- · General engine fault
- Coolant level OOR high/low

#### Standard protection functions

- Voltmeter/ammeter phase selector
- Warnings
- High coolant temperature
- High DC voltage
- Low coolant temperature
- · Low DC voltage
- Low oil pressure
- Over current
- Weak battery

#### **Shutdowns**

- Emergency stop local/remote
- Fail to crank
- High AC voltage
- High coolant temperature
- Low coolant level
- Low AC voltage
- Low oil pressure
- Over current
- Over speed
- Under frequency
- Intake manifold temperature high
- Fail to start/stop
- Over frequency
- Alternator reconnecting switch operated (breaker closed)

#### **Agency approvals**

- NFPA110 for Levels 1 or 2 systems
- ISO 8528-4: 1993 Compliance, Controls and Switchgear
- CE Marking
- EN 50081-1, 2 Residential/Light Industrial Emissions or Industrial Emissions
- EN 50082-1.2
- ISO 7637-2, Level 2: DC supply surge test
- Mil Std 202C, Method 101 and ASTM B117: Salt Fog Test
- Designed and manufactured in ISO 9001 certified facilities. Suitable for use on generator sets that are UL 2200 Listed



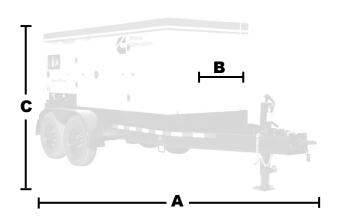
# **Ratings definitions**

#### Standby:

Applicable for supplying emergency power for the duration of normal power interruption. No sustained overload capability is available for this rating. (Equivalent to Fuel Stop Power in accordance with ISO3046, AS2789, DIN6271 and BS5514). Nominally rated.

#### Prime (unlimited running time):

Applicable for supplying power in lieu of commercially purchased power. Prime power is the maximum power available at a variable load for an unlimited number of hours. A 10% overload capability is available for limited time. (Equivalent to Prime Power in accordance with ISO8528 and Overload Power in accordance with ISO3046, AS2789, DIN6271, and BS5514).



## **Dimensions**

	Dim "A"	Dim "B"	Dim "C"	Weight w/o fuel	Weight with fuel	Fuel capacity
Model	<b>mm</b> (in.)	<b>mm</b> (in.)	<b>mm</b> (in.)	kg (lbs)	kg (lbs)	liters (gal)
C150D6R	<b>3700</b> (146)	<b>1450</b> (57)	<b>1700</b> (67)	<b>2523</b> (5563)	<b>3344</b> (7374)	965 (255)
With trailer	<b>5740</b> (226)	<b>2140</b> (84)	<b>2309</b> (91)	<b>3332</b> (7346)	<b>4153</b> (9157)	<b>965</b> (255)

## **Fuel consumption**

		Standby				Prime			
60 Hz Ratings, kW (kVA)	150 (187)			135 (168)					
	Load	1/4	1/2	3/4	Full	1/4	1/2	3/4	Full
	US Gal/hr	3.6	6.6	9.1	11.8	3.1	5.9	8	10.1
	L/hr	13.6	25	34.4	45	11.7	22.3	30.3	38.2

# **Specifications**

	Sound level a KW rating full load			Tier rating	Hours of opera	tion (75% load)
Model	Standby	Prime	dB(A) @ 7 m	Standby	Standby	Prime
C150D6R	150	135	69	Tier III	28	32

# **Trailer information**

Model	Tire size	Tire type	Load range	Number of tires per trailer	Lug pattern
C150D6R	235/85-R16	Radial	2755 lbs - each	4	8 hole

## **Certifications**

These generator sets are certified to following standards:



CAN/CSA STD C22.2 NO. 100-04 CAN/CSA STD C22.2 NO. 14-05

North America 1400 73rd Avenue N.E. Minneapolis, MN 55432 USA

Phone 763 574 5000 Fax 763 574 5298

#### Our energy working for you.™

©2014 Cummins Power Generation Inc. All rights reserved.

Cummins Power Generation and Cummins are registered trademarks of Cummins Inc. PowerCommand, AmpSentry, InPower and "Our energy working for you." are trademarks of Cummins Power Generation. Other company, product, or service names may be trademarks or service marks of others. Specifications are subject to change without notice.

S-1542f (4/14)

