



Jetpower® III 270 VDC Ground Power Unit

Supports you on the ground to keep you in the air

One JBT: Driving for customer success!



Jetpower® III 270 VDC Technical Specifications

Design Elements

As one of the world's leading suppliers of solid state frequency converters for the past 30 years, JBT Aerotech, Jetway Systems®, now offers a Jetpower® 270 VDC ground power unit for the F-22 Raptor and the JSF F-35. The Jetpower® 270 VDC unit takes from over 10 years of proven Jetpower® PWM experience and incorporates the industry leading reliability and diagnostic capabilities of the Jetpower® III 400 Hz ground power unit. The unit meets or exceeds all the requirements of MIL-STD-704F, is ETL listed to UL standard UL1012, and includes a three line LCD readout that reports critical operating parameters. Today's ground power needs are vast and complex, thus the Jetpower® 270 VDC has been designed to withstand extreme outdoor and indoor environments.

Capacity

72 kW (continuous)

Maximum Input Current

Input Volts	Current
380 Volts	126 Amps
400 Volts	120 Amps
415 Volts	116 Amps
480 Volts	100 Amps

Dimensions

Width	38 in (965 mm)
Height	73 in (1854 mm)
Depth	32 in (813 mm)

Weight (approximate)

1800 lbs (816 kg)

Housing

NEMA 4 (IP44) steel enclosure painted with blue polyurethane paint and epoxy primer. Custom colors are available.

Environmental Conditions

Capable of normal operation from -40°F to +131°F (-40°C to +55°C).

Noise

Not greater than 70 dBA at 1.5 m height, 1 m distance.

Maintenance

- No preventative maintenance required. Mean Time To Repair (MTTR) 30 minutes at module level.

Input

- AC Power: 380-480 Volt, 3 phase, 50/60 Hertz, at -15% to +10% of nominal voltage rating. Unit is phase rotation independent.
- Starting Current: Starting inrush not to exceed 100% current required when operating at rated output.
- Power Factor: From 25% to 100% rated load, input power factor is greater than 0.95.
- Input Current Distortion: 8% or less input current distortion from the mains with the standard 12 step rectifier system.
- Efficiency: Greater than 92% at any load above 50% of rated load.

Output Voltage

- Voltage Drift: Less than 1% at constant load [ambient temperature change 131°F (55°C) in 8 hours]
- Voltage Regulations: Less than 1%
- Output Voltage Transient per MIL-STD-704F

Overloads Limits Total Current Between

- 460-490 ADC for 4 seconds (short circuit capability)
- 150% for 15 seconds
- 200% for 5 seconds
- 250% for 0.25 seconds

Controls and Indicators

- Auto/Manual Switch-Voltage Control
- Start/Stop
- Line Drop Compensation
- Regulated Voltage Supply LEDs
- DC Bus Voltage Adjustment
- 3 Line LCD Display
- LCD Display Contrast Adjustment
- Voltage Adjustment (+/- 10%)
- Hour Meter (99,999 hrs.)
- 28 VDC Interlock Output (10 Amps)

External Front Panel Lights

- Solid Red-Internal or External Fault
- Solid Yellow-Input Power Applied
- Solid Green-270 VDC Power Present

LCD Display Plain English Indicators

- Input Voltage Phase A
- Input Voltage Phase B
- Input Voltage Phase C
- Input Current (3 Phase Avg.)
- Output Voltage
- Output Current
- Output kW (total)
- +5 VDC
- +15 VDC
- +24 VDC
- Lamp Test
- Event and Fault History
- Date and Time
- Accumulated kWh



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852-3966-1360

Madrid, Spain
34-91-877-5889

This information is provided for reference only and should not be used as technical specification data. This information is subject to change without notice. Please contact a JBT AeroTech sales office for formal technical information.

Rev. 2, June 2015

Brochure Reference # 207

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