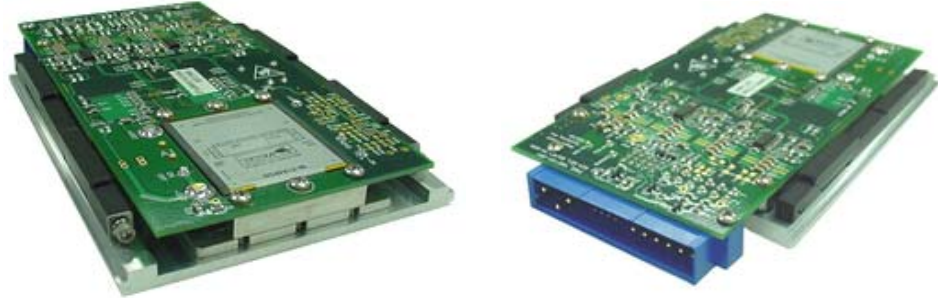


Aegis Power Solution

VME225

VME Power Converter

(Rev A03, 06/08/10)



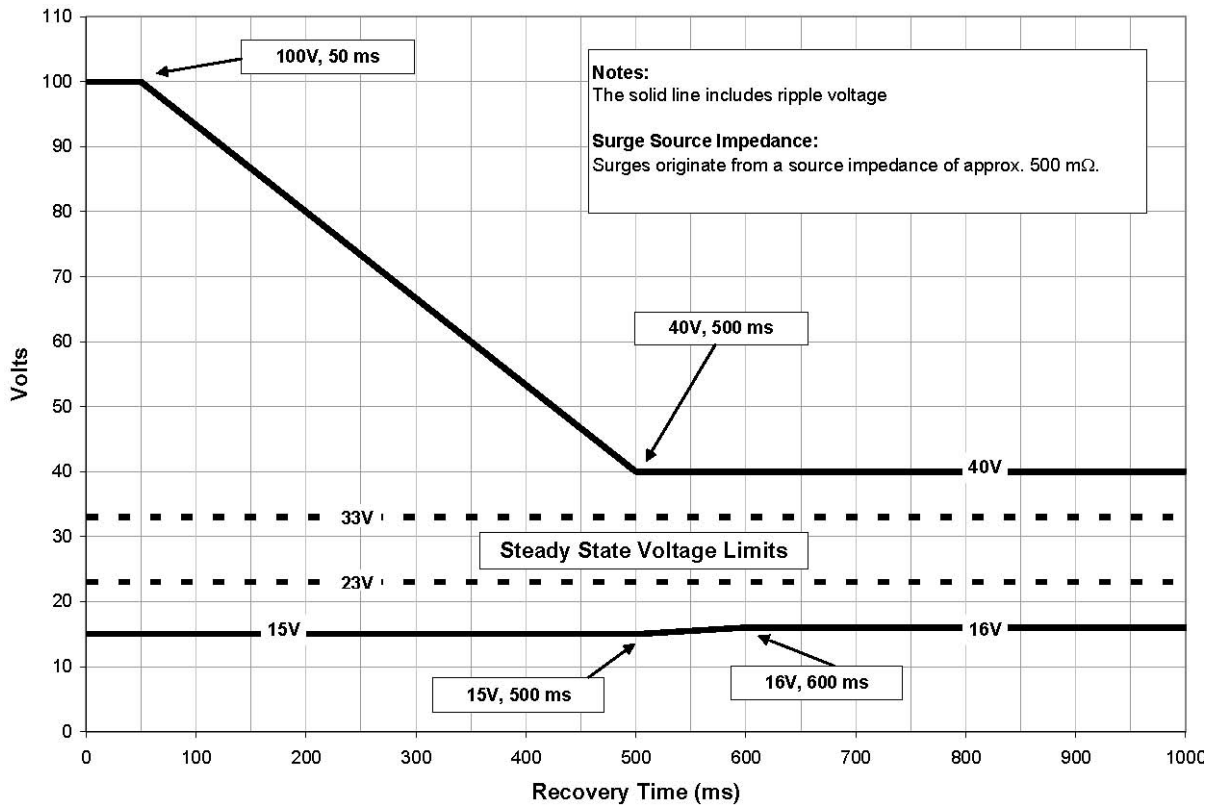
Specifications: (25°C, nominal line, 100% load unless otherwise specified).

| | |
|---|---|
| <u>DC Input Voltage:</u> | 18VDC to 36VDC Operating Range. Meets Mil-Std-704A/E/F and Mil-Std-1275D Continuous. 22VDC to 36VDC, 28VDC nominal. 100VDC 50msec transient, see attached transient Curve. |
| <u>DC Input Line Current:</u> | 12.4A Max @ 22VDC. 9.7A typical @ 28VDC input. |
| <u>Input Power:</u> | 271W Maximum. |
| <u>Output Power:</u> | 225W Maximum. All outputs combined. |
| <u>Output Voltages:</u> | See Table 1 next page. |
| <u>Efficiency:</u> | 83% Typical. |
| <u>Startup Time:</u> | 500 millisecond Maximum. |
| <u>Voltage Setpoint, Line/Load Regulation:</u> | +/- 2%. |
| <u>Output Ripple:</u> | 50mV pk-pk 5V, 3.3V; 150mV pk-pk 12V Max. (20MHz BW). |
| <u>Current Limit:</u> | Short Circuit protected, automatic recovery. |
| <u>Temperature:</u> | -40°C to +75°C Operating baseplate wedgelocks 4 output. -40°C to +85°C Operating baseplate wedgelocks 1 or 2 output. -40°C to +100°C Non-operating. |
| <u>Size:</u> | 3U x 160mm x 4hp (0.8"). |
| <u>Weight:</u> | 1.2 lb. |
| <u>Connector:</u> | 1ea Positronics PCIM30W15M400A1 or equivalent. |
| <u>Vibration:</u> | Mil-Std-810 Method 5.14 Procedure 1. |
| <u>Shock:</u> | Mil-Std-810 Method 5.16 Procedure 1. |
| <u>Humidity:</u> | 0-95% non-condensing. |
| <u>EMI:</u> | Mil-Std-461E/F CE102, CS101. |

Table 1

| Part Order Number | # Out | Output V1 | Output V2 | Output V3 | Output V4 | Max Power |
|-------------------|-------|-------------|-------------|-----------|-----------|-----------|
| VME225-001 | 2 | 5VDC 112W | 3.3VDC 112W | | | 225W 85°C |
| VME225-002 | 2 | +12VDC 112W | -12VDC 112W | | | 225W 85°C |
| VME225-003 | 4 | 5VDC 112W | 3.3VDC 82W | +12VDC 4W | -12VDC 4W | 202W 75°C |
| VME225-004 | 4 | 3.3VDC 112W | 5VDC 100W | +12VDC 4W | -12VDC 4W | 220W 75°C |
| VME225-005 | 1 | 5VDC 224W | | | | 225W 85°C |
| VME225-006 | 1 | 3.3VDC 224W | | | | 225W 85°C |

Transient Immunity



Unit ride through 15V, 500ms @ 225W max. output power
Unit shut down below 15V input, automatic restart

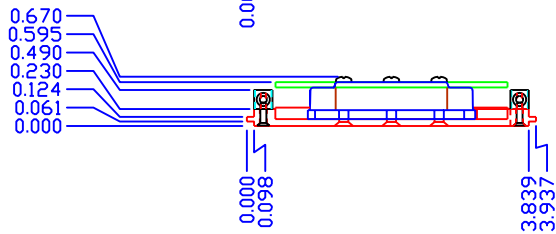
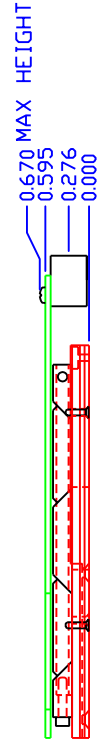
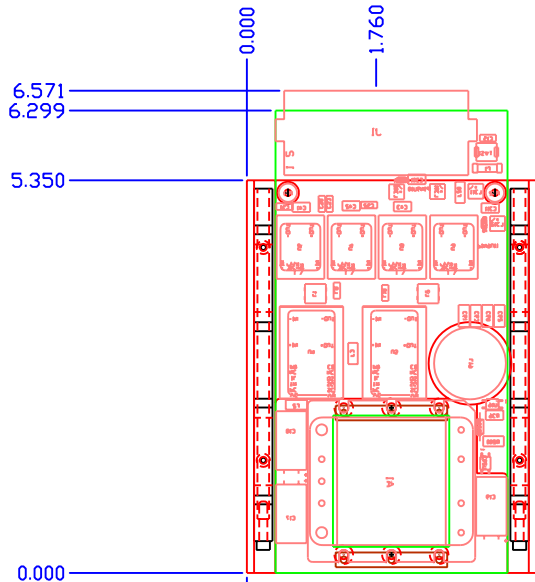
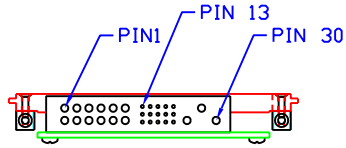
Left Blank for insertion of Voltage Table

NOTES: UNLESS OTHERWISE SPECIFIED

1. INTERPRET DIMENSIONS AND TOLERANCES PER ANSI Y14.5M-1994.
2. MATERIAL:
3. FINISH:

| BUG NO | | REV | | 1 | |
|--------|-----|-----------------|----------|----------|--|
| ZONE | REV | DESCRIPTION | DATE | APPROVED | |
| A01 | | INITIAL RELEASE | 09/12/09 | MRA | |

CAD MAINTAINED. CHANGES SHALL BE INCORPORATED BY THE DESIGN ACTIVITY.



CONNECTOR: POSITRONICS PCIM30W15M400A1 OR EQUIVALENT
 PINS 1,2: V1 OUTPUT
 PINS 3,4,5,6: COMMON RTN
 PINS 7,8: V2 OUTPUT
 PINS 9,10: COMMON RTN
 PIN 11: V3 OUTPUT
 PIN 12: V4 OUTPUT
 PINS 13,14,15,16,17,18: NC
 PIN 19: SIGNAL RTN (COMMON)
 PINS 20,21: NC
 PIN 22: INHIBIT (CONNECTED TO NEG INPUT = DISABLED)
 PINS 23,24,25,26: NC
 PIN 27: POWER OK (OPEN COLLECTOR = FAIL)
 PIN 28: CHASSIS GND
 PIN 29: POSITIVE INPUT
 PIN 30: NEGATIVE INPUT

NOTE: FOR 1 OUTPUT CARDS - PINS FOR V1 AND V2 ARE COMBINED

PAGE 3 OF 3

| | | | | | |
|--|---------|----------------------|--------------|---|-------------------|
| UNLESS OTHERWISE SPECIFIED, DIMENSIONS ARE IN INCHES FRACTIONS DECIMALS DEGREES # N/A .XX # .05 # .3 | | CONTRACT NO. | | AEGIS POWER SYSTEMS MURPHY, NORTH CAROLINA | |
| MATERIAL | | APPROVALS | DATE | TITLE | |
| SEE NOTE 2 | | MRA | 06/04/09 | VME225 MECH LAYOUT | |
| FINISH | | CHECKED | | AEGIS P/N: VME225 | |
| SEE NOTE 3 | | PROJ. ENG. | | SIZE D | |
| NEXT ASSY | USED ON | WFO | | FSO# 06ES8 | BUG NO VME225-M00 |
| APPLICATION | | DO NOT SCALE DRAWING | QUALITY | SCALE 1/1 | REV A01 |
| | | | SHEET 1 OF 1 | | |