

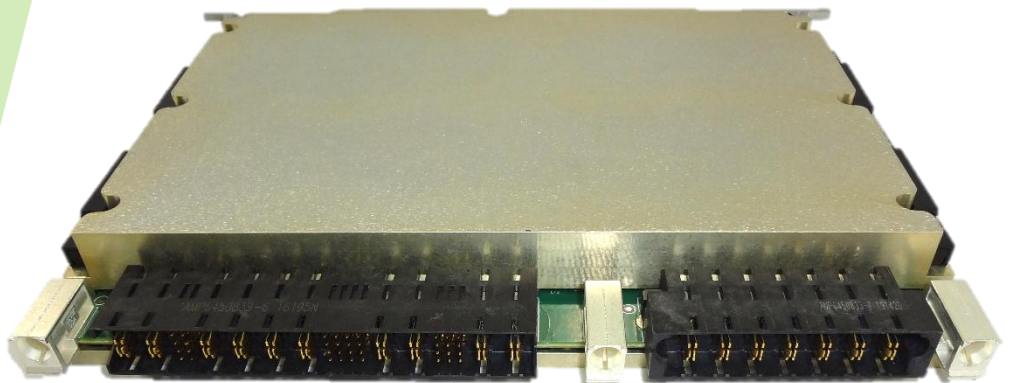


OHM
POWER
SOLUTIONS

VITA 6U700

700Watt

Quad Output Isolated
DC/DC Converter





Features:

- Designed to meet MIL-STD-704A
- High Efficiency – up to 88%
- Fully protected for Over Load/Short, Over-voltage and Over-Temperature
- Quad output isolated
- Base Plate cooling
- No external EMI filter needed

Typical applications:

- Military
- Ruggedized
- Telecom
- Industrial



General specification				
DC Input				
Input voltage range	18-32V _{DC}			
Dual 28V input	28VDC_Main /28VDC_Sec			
Input Per MIL-STD-704A	(Including 80V for 100ms – Full operational)			
Protection	Reverse Polarity Protection			
DC Output				
Output voltage / Current	See table below			
Line Load & Temperature regulation	< +/-2%			
Current limit on each output	125% - 140% of rated current			
OVP	Over-Voltage on each output - two levels			
Turn on Transient	No turn on transient			
Isolation				
Input to Output:	500 V _{DC}			
Input to Case:	500 V _{DC}			
Output to Case:	100 V _{DC}			
Interface				
Control Signals	- I²C Bus - TTL logic enable			
Inhibit Signals	PWR_ENABLE	PWR_INHIBIT	+3.3 VDC AUX	+28 VDC Fan, 5 VDC, +12 VDC
	High	High	OFF	OFF
	High	Low	OFF	OFF
	Low	High	ON	ON
	Low	Low	ON	OFF
Signals	PSM_THERMAL_OVERRIDE			
	PWR_INHIBIT			
	PWR_ENABLE			
	SYS_RESET			
	VGOOD			
	PFINT			
	TEMP_WARNING			
	WARM_START			
Environmental				
Operating Temperature	–40°C to +85°C Base plate			
Over-Temperature protection	to +100°C with auto recovery at +90°C			
Shock & Vibration	per MIL-STD-810G			
EMI-RFI	per MIL-STD-461E			
Mechanical				
Size L x H x W (mm)	168.3 x 28 x 235.5			
Weight (<i>grams</i>)	2200 MAX			
Cooling	Base plate			
Input / Output connector	INPUT - 7 PIN TE P/N 6450833-7 / OUTPUT - 46 PIN TE P/N 6450839-6 or Eq.			

Ordering Information

MODEL #	OUTPUT #	INPUT Voltage (V)	OUTPUT Voltage (V)	OUTPUT Current (A)	POWER (W)	POWER TOTAL (W)	R&N (mV)
VITA 6U600	1	28	3.3	5	16.5	691.5	100
	2		12	42	504		50
	3		5	4	20		50
	4		28	5.4	151.2		100

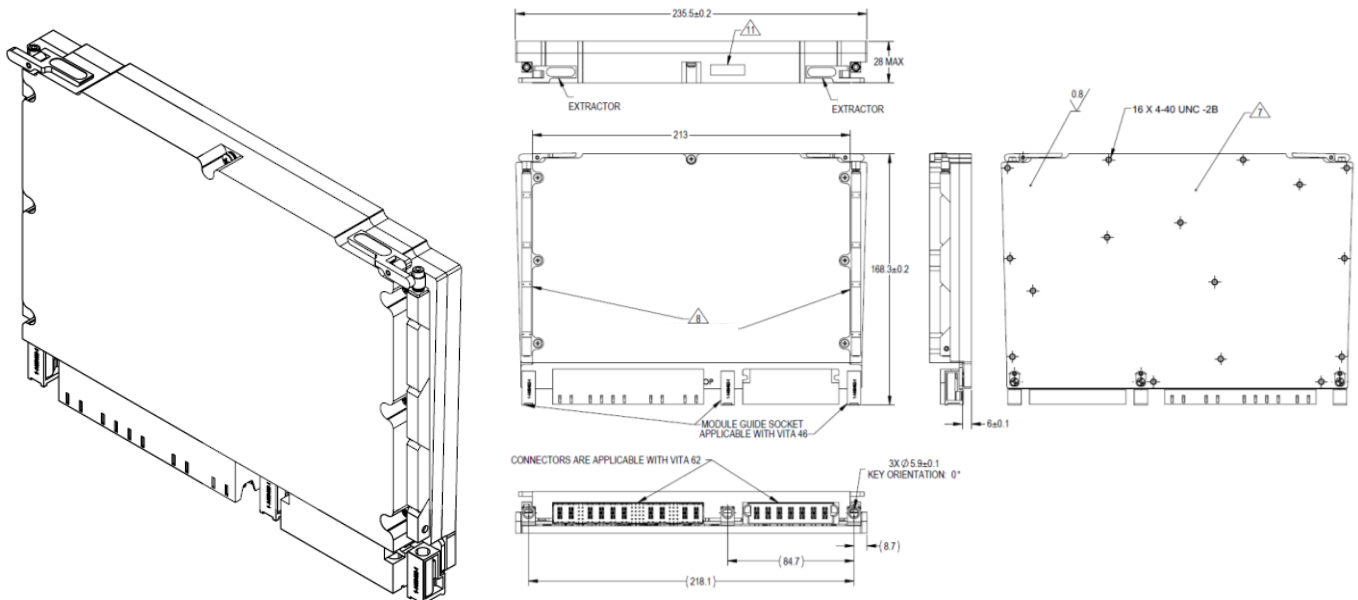
PIN – INPUT Assignment

PIN #	PIN Function
P7	+DC_IN1
P6	+DC_IN1
P5	-DC_IN
P4	-DC_IN
P3	+DC_IN2
P2	+DC_IN2
P1	CHASSIS

PIN – OUTPUT Assignment

PIN #	PIN Function	PIN #	PIN Function	PIN #	PIN Function
P10	+5 VDC	A6	SWIM_MASTER	P6	+12VDC
P9	28VDC_FAN	B6	SWIM_SLAVE	P5	+12VDC
A9	+5 VDC_sense	C6	N/U	P4	+12VDC_RTN
B9	N/U	D6	SYS_RESET	P3	+12VDC_RTN
C9	+12VDC_sense	A5	N/U	A2	N/U
D9	PWR_PRG	B5	N/U	B2	VGOOD
A8	+5 VDC_RTN_sense	C5	I2C_SCL	C2	PWR_INHIBIT
B8	N/U	D5	I2C_SDA	D2	PWR_ENABLE
C8	+12VDC_RTN_sense	A4	N/U	A1	3.3V_AUX_sense
D8	MASTER_PRG_EN	B4	N/U	B1	3.3V_AUX_RTN_sense
A7	N/U	C4	N/U	C1	PSM_THERMAL_OVERRIDE
B7	N/U	D4	SLAVE_PRG_ENABLE	D1	PFINT
C7	N/U	A3	TEMP_WARNING	P2	+3.3V_AUX
D7	SIGNAL_RETURN	B3	N/U	P1	+3.3V_AUX_RTN
P8	+5 VDC_RTN	C3	N/U		
P7	28VDC_FAN_RTN	D3	WARM_START		

Outline Drawing



Note: Specifications are subject to change without prior notice by the manufacturer.
Additional configurations and modifications available. Contact us for more details.