VTX982

One Slot 3U VPX Benchtop Development Chassis with RTM (P2 with VITA 67.2)



Key Features

- One slot benchtop 3U VPX development platform
- P2 with VITA 67.2 connector option
- Support for conduction cooled modules
- Variable fan speed control for front and rear
- Removable panels for ease of access for probing
- Support for Rear Transition Modules (RTMs)
- Allows for a shelf manager to do health monitoring
- JTAG connector
- User setting of SYSRESET, NVMRO, etc.
- Onboard battery pack to provide the VBAT
- Vertical or Horizontal positioning on bench

Benefits

- Optional shelf manager supporting Tier 2 Health Management
- 750W AC Power supply

OpenVP

- Ease of access to board under development
- Electrical, mechanical, software, and system-level expertise in house
- Full system supply from industry leader
- AS9100 and ISO9001 certified company



VTX982

The VTX982 is a single slot 3U VPX chassis for board bring-up and testing of 3U VPX modules. The chassis can accept a front and a rear module (5 HP or 10 HP). The panels on both the front and rear slots are removable for ease of probing and debugging. The P2 connector location is populated with a 4-position VITA 67.2 coaxial/RF module. <u>The VTX982 can support</u> <u>conduction cooled modules per VITA 48.</u>

The VTX982 can be placed on bench in both horizontal and vertical positioning for ease of access.

Power Supply

The VTX982 Universal AC power supply provides 750W to the chassis. The chassis supplies all the necessary power (+12V, -12V, +5V, etc.) to the module in accordance with VITA 46 specifications.

The unit also comes with a battery pack which provides the VBAT to the module. The VTX982 allows the power to VBAT to be switched between the onboard battery pack and the power supply. A sense resistor is fitted to each rail so that a voltmeter can measure power consumption.

Cooling

Variable speed fans provide front and rear cooling to the module.

Backplane

The backplane provides all the necessary VITA 46 signals set by the user (NVMRO, SYSRESET, SYS_CON, driver the dual clock, etc.). All the connectors are installed P0 thru P2 and are routed from the front to the rear.

Health Monitoring

The dual IPMI bus is routed to an external VT007 bench-top shelf manager that monitors the VPX board sensors in compliance to VITA 46.11. The VT007 supports Tier 2 Health Management and can be ordered separately or as an option with VTX982.

JTAG

The backplane breaks-out the JTAG signals via a header connector to enable external connection of a JTAG probe.



Figure 1: VTX982 Chassis Front View



Figure 2: VTX982 Chassis Rear View

Chassis Layout





Figure 3: Chassis Layout - Front



Figure 5: Chassis Layout – Front Vertical





Figure 4: Chassis Layout - Rear



Figure 6: Chassis Layout – Rear Vertical

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Specifications

Architecture		
Physical	Dimensions	Height: 3U
Standards		
VPX	Туре	VITA 46.0 and VITA 67.2
Configuration		
Power	VTX982	750W AC universal
Environmental		See Ordering Options
Cooling		Right to left
Other		
MTBF	MIL Hand book 217-F@	TBD hrs
Certifications	Designed to meet FCC, C	E and UL certifications, where applicable
Standards	VadaTech is certified to b	oth the ISO9001:2015 and AS9100D standards
Warranty	One (1) year, see VadaTe	ech Terms and Conditions

INTEGRATION SERVICES AND APPLICATION-READY PLATFORMS

VadaTech has a full ecosystem of OpenVPX, ATCA and MTCA products including chassis platforms, shelf managers, AMC modules, Switch and Payload Boards, Rear Transition Modules (RTMs), Power Modules, and more. The company also offers integration services as well as preconfigured Application-Ready Platforms. Please contact VadaTech Sales for more information.

Ordering Options

VTX982 - ABC-D00-0HJ

A = Power Supply	D = Card guide type*	
0 = 750W (AC)	0 = Standard (air cooled) 1 = Conduction cooled	
B = Shelf Manager (health monitoring)		H = Environmental
0 = No VT007 1 = VT007		See Environmental Specification
C = VPX Connector Type		J = Conformal Coating
0 = Standard 50u Gold Rugged 1 = KVPX Connectors		0 = No coating 1 = Humiseal 1A33 polyurethane 2 = Humiseal 1B31 acrylic

Notes: *Applies only to the VPX modules, RTM card guide is always standard/air-cooled

Environmental Specification*

Option H	H = 0
Operating Temperature	-5°C to +55°C
Storage Temperature	-40°C to +85°C
Operating Vibration	0.04 g2/Hz max
Storage Vibration	20g
Humidity	95% non-condensing

*Please contact VadaTech Sales for other specification

Related Products





- Dual Kintex UltraScale™ XCKU115
- 16 GB of 64-bit wide DDR4 Memory to each FPGA
- Rear fibre I/O via VITA 66.5

VPX645



- 3U VPX NVMe Host Bus Adapter with Full support for RAID
- Dual Core ARM A15 RAID on Chip (ROC)
- Onboard 8 GB of DDR4 Memory with ECC

VPX752



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- 6U VPX module Intel 5th Generation Xeon-D SoC
- PCle Gen3 x16 (dual x8 or quad x4)
- Quad 10GbE XAUI

Contact

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