
6-slot, C-size VXI mainframe HP E1421B

Technical Specifications

- **Compact size, low cost**
- **Portable or rack-mount**
- **Ultra-reliable power supply**
- **Power supply serviceable through the rear panel**
- **Pressurized air channel cooling**



Description

The HP E1421B **C-size, 6-slot VXI mainframe** is a compact, cost-effective solution for configurations requiring fewer slots than the 13-slot HP E1401B C-size mainframe.

The smaller size and weight of the HP E1421B make it an excellent choice for either portable or rack-mount applications. The HP E1421B complies with the VXIbus Specification by providing injector surface rails used by the new HP QUIC easy module insertion and extraction system.

HP has incorporated its industry-leading Pressurized Air Channel cooling system into the design of the HP E1421B. It ensures clean, uniform airflow to each module. For greater air flow and power supply serviceability, power input and cooling air intake is through the rear of the mainframe.

General Characteristics

Airflow and Power Supply Serviceability

- Power input through the rear
- Power supply serviceable through the rear panel
- Cooling air enters through right side and exhausts through the left side
- No air filters

Backplane

- High performance
- Monolithic
- 6 slots
- VXI P1 and P2 connectors

The backplane features solid state automatic daisy-chain jumpering for the VMEbus grant and interrupt acknowledge lines, eliminating the need for hand selection of switch settings. The HP E1421B backplane is compatible with the HP backplane connector shield kit, P/N E1400-80920.

Specifications

Mechanical Specifications

	mm	inches
Height without bottom feet:	221.5	8.72
Height with bottom feet:		
Width without side feet:	431.8	17.00
Width with side feet:	439.7	17.31
Depth without rear feet:	508.0	20.00
Depth with rear feet:	530.2	20.88
Weight:	13.9 kg / 30.6 lbs	

Power Specifications

Power output:

The power supply generates backplane logic signals ACFAIL* and SYSRESET* in full compliance with the VXI Specification, Revision 1.4.

DC Output Voltage	Pk Current at 55 °C I_{MP}	Dynamic Current I_{MD}
+5 V	45 A	5 A
+12 V	8 A	2.5 A
-12 V	8 A	2.5 A
+24 V	8 A	4 A
-24 V	8 A	4 A
-5.2 V	40 A	5 A
-2 V	15 A	3.5 A

Usable power: 450 W maximum at 55 °C

Power Supply Protection

All outputs are protected from over-temperature, over-voltage, over-current, and short-to-ground

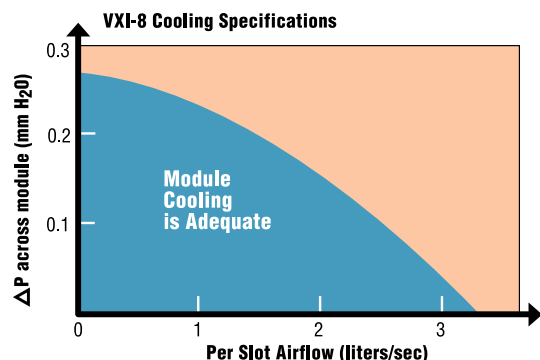
Power Input

Input voltage:	100 Vac to 264 Vac
Input frequency:	47 Hz to 66 Hz
Inrush current:	40 A max

Cooling

Temperature rise: 10 °C (through the module for a 60 W module with typical density)

9/94 5.11



Environmental and Regulatory

Acoustic Noise:

Low-speed fan:	53 dBA sound pressure (at bystander position)
High-speed fan:	59 dBA sound pressure (at bystander position)

Shielding

Intermodule:	Gasketing per VXI Rev. 1.4, B.7.2.3. is provided.
Backplane:	Backplane Connector Shields per VXI Rev. 1.4, B.7.2.3 (available as Option 918 or as a separate accessory, HP E1421-80920)
Intermodule chassis:	Intermodule chassis shields per VXI Rev 1.4, B.7.3.4 (available as a separate product, HP E1409B)

Electromagnetic Compliance

To ensure compliance with RFI levels specified in standards EN55011 and CISPR11, the Backplane Connector shields must be installed in the mainframe. Order Option 918 to get shields factory installed.

VXI Characteristics

VXI device type:	mainframe
Data transfer bus:	all per VXIbus Specification, Rev. 1.4
Size:	C
Slots:	6
Connectors:	P1/2
Shared memory:	n/a
VXI busses:	All per VXIbus Specification, Rev. 1.4

Available Current

	I_{PM}	I_{DM}
+5 V:	60.00	9.00
+12 V:	12.00	2.50
-12 V:	12.00	2.50
+24 V:	12.00	5.00
-24 V:	10.00	5.00
-5.2 V:	60.00	8.50
-2 V:	30.00	4.50

Cooling/Slot

Watts/slot:	60 W (10 °C rise)
ΔP mm H ₂ O:	n/a
Air Flow liter/s:	n/a

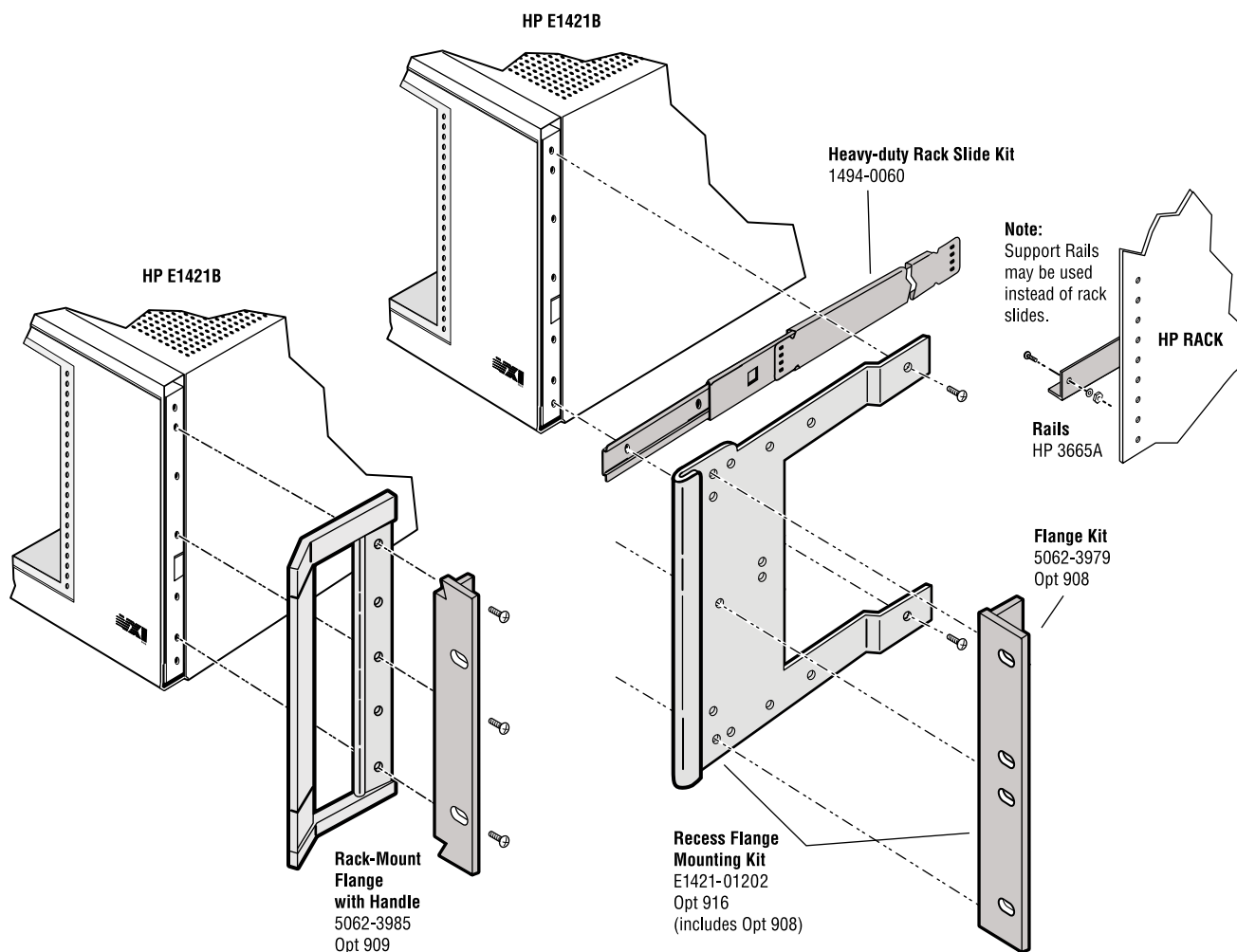
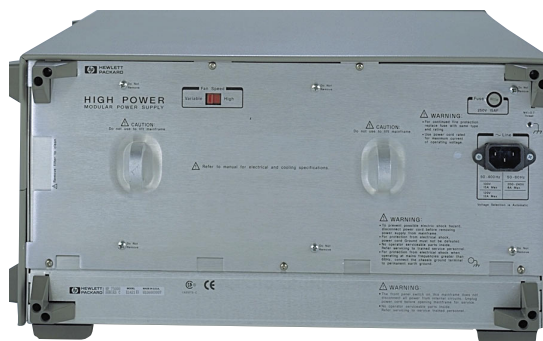
Ordering Information

Description

6-slot, C-size VXI mainframe
 VXI module installation w/std. address
 Flange kit
 Handle and flange kit
 VXI backplane connector shield kit
 3 yr. retn. to HP to 1 yr. OnSite warr.
 SHIELD, BACKPLANE CONN
 FILLER PANEL 1 SLOT
 ORDER E1421-65000
 ORDER E1421-65001
 FLUSH RACK FLANGE KIT
 Recess flange mounting kit

Product No.

HP E1421B
 HP E1421B 500
 HP E1421B 908
 HP E1421B 909
 HP E1421B 918
 HP E1421B W01
 HP E1400-80920
 HP E1400-60202
 HP E1421-61200
 HP E1421-61201
 HP E1421-65000
 HP E1421-80916



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