



ViconNet/Kollektor RAID Storage System

- Preconfigured for RAID level 5, supports RAID levels 0, 1, 3, 5, 10, 30, 50, NRAID and JBOD
- Preconfigured for 1.7 to 7.1 TB of usable storage in 8 or 16 HDD bays
- Supports hot swapping of failed drives or hot spares
- Rack-mountable
- External SCSI interface
- Firmware-based setup utility

The Vicon RAID systems are intelligent data storage units suitable for any Kollektor Digital Video Recording System or ViconNet workstation. Their compact size and rack mounting capability make them suitable for any Kollektor installation that requires high-capacity storage in a small space. They are available in a variety of storage sizes preconfigured for RAID 5 level. Refer to Table 1 for specific model information.

The VN-RAID units are comprised of 8 or 16 Serial ATA (SATA) channel hard drive slots with a 400 MHz RISC processor and dual-redundant power supplies, all housed in a rugged enclosure that is rack-mountable in a standard 19-in. (483 mm) EIA rack. The front panel features an LCD screen with pushbuttons and LED status indicators. The LCD offers full access to configurations and monitoring. An audible alarm announces when an active device on the system fails or a threshold value is violated (a Mute button is provided) and a message appears on the LCD. The back panel provides all connections to network, peripheral devices and power.

The VN-RAID units support a universal power input of 90 – 260 VAC, 50/60 Hz and comes equipped ready to connect to the digital recorder with all necessary hardware and documentation.


Vicon requires the use of line conditioners, voltage regulators and uninterruptible power supply (UPS) systems in the electrical power service. Failure to comply voids the unit warranty.

ASSOCIATED EQUIPMENT AND ACCESSORIES

Uninterruptible Power Supply: 725VA unit with DB9 (RS-232) and USB ports; 120 VAC input/output. Product Specification V147.

Table 1: Models and Descriptions

Model Number	Product Code	Description
VN-RAIDA-8-250-R5	8484-35	ViconNet RAID Storage; includes eight 250 GB hot swappable drives (1.7 TB usable storage) configured to RAID 5
VN-RAIDA-8-400-R5	8484-45	ViconNet RAID Storage; includes eight 400 GB hot swappable drives (2.6 TB usable storage) configured to RAID 5
VN-RAIDA-16-250-R5	8485-20	ViconNet RAID Storage; includes sixteen 250 GB hot swappable drives (3.5 TB usable storage) configured to RAID 5
VN-RAIDA-16-400-R5	8485-35	ViconNet RAID Storage; includes sixteen 400 GB hot swappable drives (5.7 TB usable storage) configured to RAID 5
VN-RAIDA-16-500-R5	8485-45	ViconNet RAID Storage; includes sixteen 500 GB hot swappable drives (7.1 TB usable storage) configured to RAID 5

Vicon Product Facts		Model No:	Product Code:	SEC: 1	SPEC: V133-12	REV: 806
		See Table 1	See Table 1			

ELECTRICAL

Input Voltage: 90 - 260 VAC, 50/60 Hz.
Current: 8 A @ 90 VAC; 4 A @ 260 VAC.

Power Consumption: 8-Bay Unit: 350 W.
 16-Bay Units: 460 W.

Heat Equivalent: 8-Bay Unit: 19.9 btu/min (5.0 kg-cal/min).
 16-Bay Unit: 26.2 btu/min (6.6 kg-cal/min).
 Note: These figures represent the conversion of 100% of the electrical energy to heat. Actual percentage of heat generated will be less and will vary from product to product. These figures are provided as an aid in determining the extent of cooling required for an installation.

Power Supplies: Dual-redundant hot-swappable internal power supplies; 8-bay is 350 W, 16-bay is 460 W.

CONTROLS AND CONNECTORS

User Controls: 4 buttons and an LCD display used to setup, maintain and monitor system.

Power: 2 buttons on rear panel for switching individual power supplies.

I/O Connectors: 2 SCSI ports for recorder connection.
 RJ-45 Ethernet port.
 RS-232C (audio jack) serial port connector (2 on 16-bay).

Power: Standard 3-conductor socket for line cord connection.

Hard Drive Bays: 8 or 16 standard 1.5 GB SATA channels; supports hot-swapping capability.

Status Indicators: LEDs for RAID controller, cooling fan module, power supply modules, drive trays and LCD panel.

OPERATION

Usable Storage Capacity: 8-Bay Units: 1.7 or 2.6 TB.
 16-Bay Units: 3.5, 5.7 or 7.1 TB.

Supported RAID Levels: RAID levels 0, 1, 3, 5, 10, 30, 50, NRAID and JBOD.

Alarms: Audible alarm signal when active device on system fails or critical operating parameters of unit are violated.

RAID Controller: Internal 400 MHZ RISC processor with 256 KB of embedded L2 cache. Also features proprietary ASIC 133 with XOR engines and 128 MB to 1 GB SDRAM DIMM memory support.

LCD Panel Functions: Provides full access to all array configurations and monitoring.

SCSI Transfer Rate: 8-Bay: 160 MB/sec.
 16-Bay: 320 MB/sec.

MECHANICAL

Dimensions: **8-Bay:**
 Height (H): 3.5 in. (88 mm).
 Width (W): 17.5 in. (446.2 mm), excluding rack mount brackets.
 Length (L): 19.2 in. (486.5 mm).
16-Bay:
 Height (H): 5.2in. (131 mm).
 Width (W): 17.6 in. (447 mm), excluding rack mount brackets.
 Length (L): 19.7 in. (500 mm).

Weight: 8-Bay: Approx. 45 lb (20.4 kg).
 16-Bay: Approx. 48 lb (21.8 kg)..

Mounting: Desk-top or 19-in. rack mount (mounting brackets included).

ENVIRONMENTAL

Operating Temperature Range: 32 to 104° F (0 to +40° C).

Humidity: 5 to 95% relative, noncondensing.

Storage Temperature Range: -40 to 149° F (-40 to +65° C).

Technical Information

