

### Description

The SNAP B-series racks are designed to work with the SNAP family of intelligent I/O processors, which Opto 22 calls brains. SNAP brains are designed to communicate with Opto 22 controllers or a host computer. SNAP B-series racks are compatible with SNAP Ultimate I/O™, SNAP Ethernet I/O™, and SNAP Simple I/O™.

Since SNAP analog, digital, serial, and special-purpose modules have the same footprint, customers using most SNAP B-series racks can mix modules on the same I/O mounting rack. SNAP B-series racks can accommodate 4, 8, 12, or 16 modules. SNAP-B4M, SNAP-B8M, SNAP-B12M, SNAP-B16M, and SNAP-D64RS racks are Factory Mutual approved.

The MC and MC-P model racks provide an auxiliary screw-type terminal strip for field wiring common connections such as loop power distribution. The MC racks use a fixed terminal strip, while the MC-P use removable connectors for easy maintenance (see enlarged view on the following page).

The digital-only SNAP-D64RS rack holds up to 16 4-channel digital SNAP I/O modules and is suitable for use with digital-only SNAP Ultimate brains, SNAP Ethernet brains, and the SNAP-PDPRS64 Profibus brain.

SNAP-M16, SNAP-M32, and SNAP-M64 racks are designed specifically for use with the SNAP-UP1-M64 Ultimate brain and the SNAP-ENET-S64 Simple I/O brain. Both of these brains support analog, digital, or serial/special-purpose modules in any module location. Digital features are limited; see Opto 22 form 1291, the SNAP Ultimate Brain data sheet, or form 1452, the SNAP Simple I/O data sheet, for more information.

Field devices are wired directly to the top-mounted removable connectors on the SNAP I/O modules plugged into each rack.

Part Number	Description
SNAP-B4M*	4-module rack
SNAP-B8M*	8-module rack
SNAP-B8MC	8-module rack with extra terminal block for field wiring
SNAP-B8MC-P	8-module rack with extra terminal block for field wiring, pluggable
SNAP-B12M*†	12-module rack
SNAP-B12MC†	12-module rack with extra terminal block for field wiring
SNAP-B12MC-P†	12-module rack with extra terminal block for field wiring, pluggable
SNAP-B16M*†	16-module rack
SNAP-B16MC†	16-module rack with extra terminal block for field wiring
SNAP-B16MC-P†	16-module rack with extra terminal block for field wiring, pluggable
SNAP-D64RS*	16-module rack for digital-only SNAP Ultimate, SNAP Ethernet, and SNAP-PDPRS64 Profibus brains
SNAP-M16	4-module rack for SNAP-UP1-M64 and SNAP-ENET-S64 brains
SNAP-M32	8-module rack for SNAP-UP1-M64 and SNAP-ENET-S64 brains
SNAP-M64	16-module rack for SNAP-UP1-M64 and SNAP-ENET-S64 brains
SNAP-FUSE4AB	4-amp fuse, 25-pack
SNAP-FUSE1AB	1-amp fuse, 25-pack
SNAP-RACKDIN	SNAP rack DIN-rail adapter clip
SNAPRACKDINB	SNAP rack DIN-rail adapter clip, 25-pack

\* Factory Mutual (FM) approved

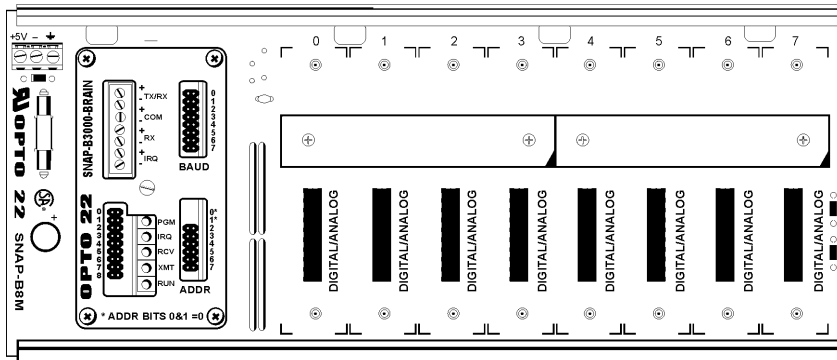
† Positions 8 and above are for analog or serial/special-purpose modules only

The module and rack design allows modules to simply “snap” on and off the mounting rack. SNAP racks use a retention rail locking system that holds modules securely to the rack.

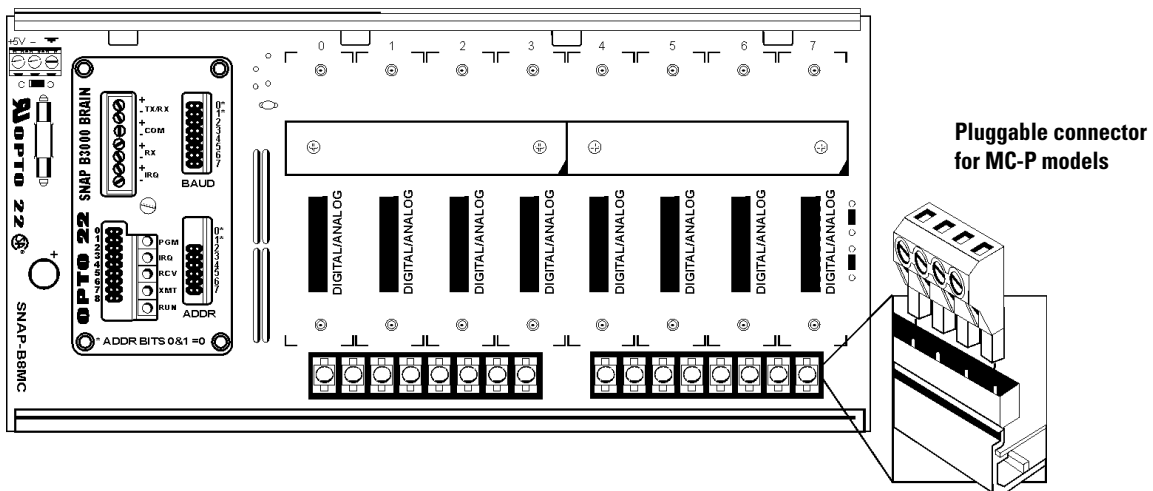
Normally, a hold-down screw is not required. However, for applications that require additional module security, SNAP racks have provisions for two 4-40 by ½-inch standard machine screws to hold each module in position. All SNAP racks offer panel mounting and the option of DIN-rail mounting. SNAP racks require a 5 VDC power source.

### Description (continued)

SNAP-B8M 8-Module Position I/O Mounting Rack  
Shown with SNAP-B3000 Brain (purchased separately)



SNAP-B8MC 8-Module Position I/O Mounting Rack  
Shown with SNAP-B3000 Brain (purchased separately)



### Specifications

Part Number	Description	Power Requirements*	Brain Compatibility	Replacement Fuse	Operating Temperature	Relative Humidity
SNAP-B4M	4-module mixed	5.0 VDC ± 0.1 @ 1.8 Amps max	SNAP-UP1-ADS SNAP-B3000-ENET SNAP-ENET-RTC SNAP-WLAN-FH-ADS B3000 SNAP-B4 SNAP-B6 SNAP-HA SNAP-BRS SNAP-BRS-HA SNAP-BRS-HA-J SNAP-B3000-MODBUS	SNAP-FUSE4A or Bel 5HF4†	0° to 70° C	95%, non-condensing
SNAP-B8M	8-module mixed	5.0 VDC ± 0.1 @ 2.6 Amps max				
SNAP-B8MC	8-module mixed, terminal block					
SNAP-B8MC-P	8-module mixed, pluggable terminal block					
SNAP-B12M	12-module mixed (digital in positions 0–7 only)	5.0 VDC ± 0.1 @ 3.4 Amps max				
SNAP-B12MC	12-module mixed (digital in positions 0–7 only), terminal block					
SNAP-B12MC-P	12-module mixed (digital in positions 0–7 only), pluggable terminal block					
SNAP-B16M	16-module mixed (digital in positions 0–7 only)	5.0 VDC ± 0.1 @ 4.2 Amps max				
SNAP-B16MC	16-module mixed (digital in positions 0–7 only), terminal block					
SNAP-B16MC-P	16-module mixed (digital in positions 0–7 only), pluggable terminal block					
SNAP-M16	4-module mixed (limited digital functions)	5.0 VDC ± 0.1 @ 4.2 Amps max	SNAP-UP1-M64 SNAP-ENET-S64	Littelfuse 297 07.5†		
SNAP-M32	8-module mixed (limited digital functions)					
SNAP-M64	16-module mixed (limited digital functions)					
SNAP-D64RS	16-module digital only (limited digital functions)	5.0 VDC ± 0.1 @ 1.8 Amps max	SNAP-UP1-D64 SNAP-ENET-D64 SNAP-PDPRS64	SNAP-FUSE1A or Buss GDC1A†		

\* Power requirements shown are for a rack, a brain, and a full load of analog modules (for the SNAP-D64RS, a full load of digital modules). Power requirements for SNAP serial and special-purpose modules are higher. See module data sheets for more information.

† Manufacturer's part number (not available through Opto 22).