

# Mini-SAS HD

## Product Description

Mini-SAS High Density receptacle is the next generation SAS system; the SAS 2.1 standard meets SAS-3 next generation speed and density requirements that provides faster data transmission and more bandwidth for end users. The low-profile system provides 4X and 8X cable-plug options, and the external I/O connectors includes eight sideband signals per 4X port, 1x4 configuration for up to 192 Gbps of total bandwidth. Mini-SAS HD is designed to save space with its increased density and reduced size as compared to the Mini-SAS 2.0 while following complacency with the standard. Mini-SAS HD connector system has a 2-row, right angle connector with data rates reaching 12 Gbps per channel. Mini-SAS HD can up to 24Gps per channel and can meet SAS-4 and PCIe Gen4/5.

Applications			SFF Supported Standards
RAID	Router/Switch	Blade server	Connector Cage Combo SFF-8614
Workstations	Patch panels	Servers	
Rack-mount server	Routers	Storage rack	

Product Specifications - Mini-SAS HD			
CONNECTOR		CAGE	
Materials Specifications			
Housing	Black color, Glass reinforced , Lead Free Solder Reflow, Process Compatible Thermo Plastic	PCB Thickness	3.00 mm (0.118in.) min.
Contacts Base Material	Phosphor Bronze		
Contact Normal Force	50 grams Minimum		
Plating Press-Fit Area	Matte tin or Gold flash options		
Plating Mating Area	Gold		
Operating Temperature	-40°C to +85°C		
Electrical Specifications			
Operating Voltage	30 VDC per contact		
Operating Current	0.5 A per contact		
Differential impedance	100 Ω +/- 10 Ω		
Mechanical Specifications			
Mating Force	62 N max.	Unmating Force	30 N max.
Durability	250 mating cycles		
Options			
Packaging	Tray		
Configurations	1X1, 1X2, 1X4		
Environmental Specifications Options			
RoHS	Yes		
Halogen Free	Yes		
Flammability Rating	UL 94V-0		



# Ordering Information

## Mini-SAS HD Combo (Cage/Connector)

Mini-SAS HD Combo (Cage/Connector)										U92	X	X	X	X	1	X	X	X	X	X
U92	SERIES DESIGNATION																			
A	STYLE																			
A -One Row Cage 0°																				
M - Single level 0° (24 Gbps)																				
X	NUMBER OF PORTS IN ROW																			
1 - 1x1																				
2 - 1x2																				
4 - 1x4																				
X	HEAT SINK OPTION																			
1 - No Heat Sink and No Clip																				
X	EMI SHIELDING																			
0 - Standard EMI Fingers																				
1 - Extended EMI Fingers																				
											MOUNTING SCREWS									
											0 - No Screws									
											1 - Mounting Screws (Standard Length of M2 X 0.4, 4.3 Long)									
											CONTACT PLATING									
											3 - Mating Area Plating 30 μ" (0.76 μm) Gold Over 50 μ" (1.27 μm) to 150 μ" (3.81 μm) of Nickel;Press-Fit Tail Area Plating 15 μ" (0.38 μm) to 60 μ" (1.52 μm) of Matte Tin Over 50 μ" (1.27 μm) to 150 μ" (3.81 μm) of Nickel									
											7 - Same As "3"; But with Enhanced Chicklet									
											PACKAGING									
											1 - Tray									
											T - Tape & Reel									
											A - Tray - Heat Sink & Clip or Light Pipe Ship Assembled									
											LIGHT PIPE OPTION									
											0 - No Light Pipe									
											2 - 2 Round Light Pipes per port, on Top of the Cage									
											OPTIONAL DUST COVER									
											0 - Without Dust Cover									
											D - With Dust Cover (Ship Loose)									
											PLATING									
											1 - Nickel									



### Order Information:

P: 416.291.4401 | F: 416.292.0647 | E: cages@amphenol-highspeed.com

For more information consult factory or visit [amphenol-highspeed.com](http://amphenol-highspeed.com)

Product Applications; List represents common uses for the product but is not limited to these uses.



# Mouser Electronics

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

[Amphenol:](#)

[U92-L116-1001-70](#) [U92-2100-8000-BP](#) [U92-L411-102A-70](#) [U92-L416-1001-70](#) [U92-L411-1001-70](#) [U92-L216-1001-70](#) [U92-L111-102A-70](#) [U92-L211-1001-70](#) [U92-L211-102A-70](#)