



***Selecting the Right
D-Subminiature Connector
for your Application!***

Market Areas

- Communications
- Instrumentation
- Medical
- Computer / Peripherals
- Commercial Industry
- Test Labs
- Gaming Industry

D-Subminiature Categories

- **Cable Mount**
- **Board Mount**

Cable Mount D-Subminiature Connectors

Cable Mount Connectors are:

- Sold in Standard and High Density styles.
- Shielded for EMI/RFI (Electromagnetic & Radio Frequency Interference).
- Available in “Stamped/Formed” low cost contacts.
- Available in “Machined” high quality contacts in all styles except IDC.
- Available in two different shell plating's:
 - Tin for ease of soldering.
 - Nickel for more corrosive environments.
- Available with various hardware options.
- Available in standard 230 degree material since not exposed to higher soldering temperatures – allowing for lower cost material to be utilized.

Cable Mount Termination Types

Crimp & Load



Solder Cup



IDC



Crimp & Load - Cable Mount Connectors



- Connectors are not supplied with Contacts
- Contacts must be purchased separately and are sold on reels of 10,000 pcs. (stamped/formed) or loose in bags of 500 pcs. (machined).
- Loose piece contacts can be terminated with a hand tool purchased separately.

Contacts for Crimp & Load Connectors

Available in stamped/formed and machined



Stamped/Formed:

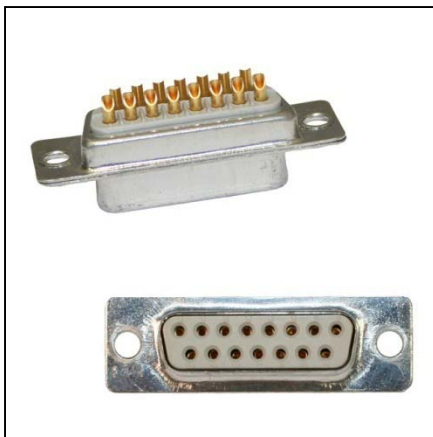
- Produced out of a flat piece of metal that is stamped and formed into the contact and can be plated with different materials at different thickness
- Compatible with most industry standard termination presses.
- Loose piece contacts can be terminated with a hand tool purchased separately.



Machined:

- Solid piece of metal that is precision cut and barrel plated.
- Higher reliability/quality contact.
- Different plating thickness available.
- Loose piece contacts can be terminated with a hand tool purchased separately.

Solder Cup- Cable Mount Connectors



- Contacts are pre-loaded into the connector.
- Contacts can be stamped/formed or machined.
- Does not require the purchase of any special termination equipment.
- Can be labor intensive as wires have to be stripped and soldered by hand to the contacts.

“C” Filtered Solder Cup- Connectors

- Capable of filtering each signal.
- Available with machined contacts only.
- Contacts are pre-loaded.
- Does not require the purchase of any special termination equipment.
- Can be labor intensive as wires have to be stripped and soldered by hand to the contacts.

IDC (Insulation Displacement Contacts) - Connectors



- For use with “Flat Ribbon” cable.
- Contacts are pre-loaded into connector.
- Contacts are stamped/formed.
- Mass termination with standard “Flat Rock” tooling keeps labor cost down.
- Supplied with Strain Relief

Board Mount D-Subminiature Connectors

Board Mount Connectors are:

- Sold in Standard and High Density styles.
- Available with stamped/formed and machined contacts.
- Available with special contact plating's with minimum order quantities.
- Shielded for EMI/RFI (Electromagnetic & Radio Frequency Interference).
- Available in various styles – Vertical, Right Angle, SMT...
- Available with Nickel Plated Shells
- Standard High Temperature Material allows for wave solder process, reflow process, and hand soldering for lower volume applications
- Available with various standard hardware options

Board Mount Termination Types

Vertical Through Hole



Right Angle Through Hole



Straddle Mount



Right Angle Surface Mount



Vertical Through Hole - Board Mount Connectors



- Available with Stamped/Formed & Machined Contacts
- Available in both High & Low Profile
- Supplied with contacts pre-loaded into connector.
- Various standard hardware options available
- Special contact lengths and plating options available with minimum order quantities
- Special hardware designs available with minimum order quantities

Wire Wrap - Vertical Board Mount Connectors



- Standard Density Only.
- Available with Machined Contacts.
- Technician can wrap individual conductors from the longer contact tails to other devices that can provide programming to other electrical components.
- Supplied with contacts pre-loaded into connector.
- Various standard hardware options available.
- Special hardware designs available with minimum order quantities.

Right Angle (90°) Through Hole - Board Mount Connectors



- Available in Standard & High Density versions.
- Available with Stamped/Formed & Machined Contacts.
- Supplied with contacts pre-loaded into connector.
- Various standard hardware options available.
- Special hardware designs available with minimum order quantities.

Right Angle (90°) Surface Mount - Board Mount Connectors



- Available in Standard & High Density versions.
- Available with Stamped/Formed Contacts.
- Supplied with contacts pre-loaded into connector.
- Board Locks supplied as standard hardware option.
- Special hardware designs available with minimum order quantities.

Straddle Mount - Board Mount Connectors



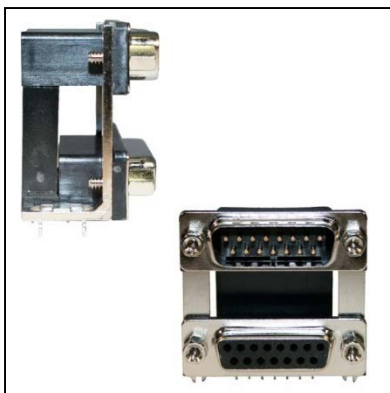
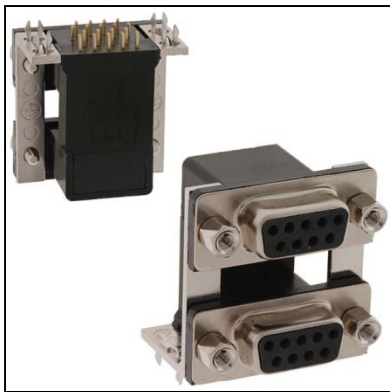
- Available in Standard D-Sub Sizes.
- Available with Stamped/Formed & Machined Contacts.
- Supplied with contacts pre-loaded into connector.
- Utilizes solder cup contact design which fits standard .063" thick PC Boards

High Profile (Vertical Through Hole)- Board Mount Connectors



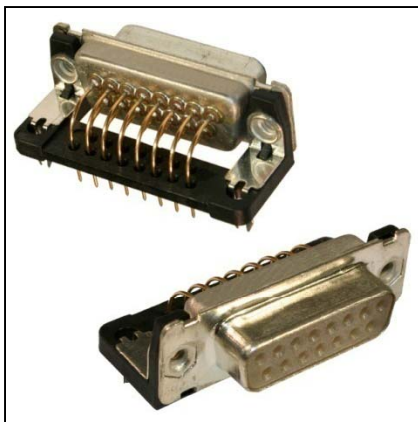
- Available in Standard D-Sub Sizes.
- Available with Machined Contacts.
- Higher Profile allows for placement of other components on PC board.
- Various standard hardware options available.
- Special hardware designs available with minimum order quantities.

Dual Ports (Dual Stack)- Board Mount Connectors



- Dual Stack design saves space (real estate) on PC boards.
- Available in Standard & High Density versions.
- Available in mixed configurations with minimum order quantities.
- Available in Stamped/Formed contacts.
- 3 Standard Height configurations available.
- Various standard hardware options available.
- Special hardware designs available with minimum order quantities.

“C” Filtered Vertical & Right Angle - Board Mount Connectors



- Available with Machined contacts only.
- Capable of filtering each signal.
- Supplied with contacts pre-loaded into connector.
- Various standard hardware options available.
- Special contact lengths and plating available with minimum order quantities.
- Special hardware designs available with minimum order quantities.



NorComp

Quick Reference Guide to D-Sub Connectors

* = Dual Port
New

Series	Application		Type			Cable Mount			PCB Mount				Hardware			Standard	High Density
	Cable Mount	PCB Mount	Machined	Stamped & Formed		Solder Cup	Crimp & Poke	IDC	Vertical	Right Angle	SMT	Press Fit	4-40 clinch nuts	Board-Locks	Other hardware types avail.	Connector Size	Connector Size
170	x		x	x			x						x			9,15,25,37,50	
171	x			x		x			x				x	x		9,15,25,37,50	
172-E	x	x	x			x			x				x	x		9,15,25,37,50	
173-E		x	x							x					x	9,15,25,37,50	
174-E		x	x							x					x	9,15,25,37,50	
* 178		x		x						x				x	x	9,15,25,37	
* 179		x		x						x				x	x	9,15,25,37	
180	x			x		x	x		x				x				15,26,44,62,78
180-M	x	x	x			x			x				x	x			15,26,44,62
181		x		x						x				x	x		15,26,44,62,78
181-M		x	x							x			x	x			15,26,44,62
182		x		x						x				x	x	9,15,25,37	
183		x		x						x				x	x	9,15,25,37	
184	x							x					x			9,15,25,37	
* 189		x		x						x				x	x	9,15,25,37	
190		x		x						x	x			x		9,25	
191		x		x				x				x	x	x		9,15,25,37	
192		x		x						x				x	x	9,15,25,37	
193		x		x						x				x	x		15
194		x		x						x				x	x		15,26,44,62
195		x		x				x					x		x		15,26,44,62,78
196		x	x					x					x		x		15,26
197		x	x					x					x		x		15,26,44,62,78
198		x		x				x					x		x		15,26
200		x		x					x	x				x			15