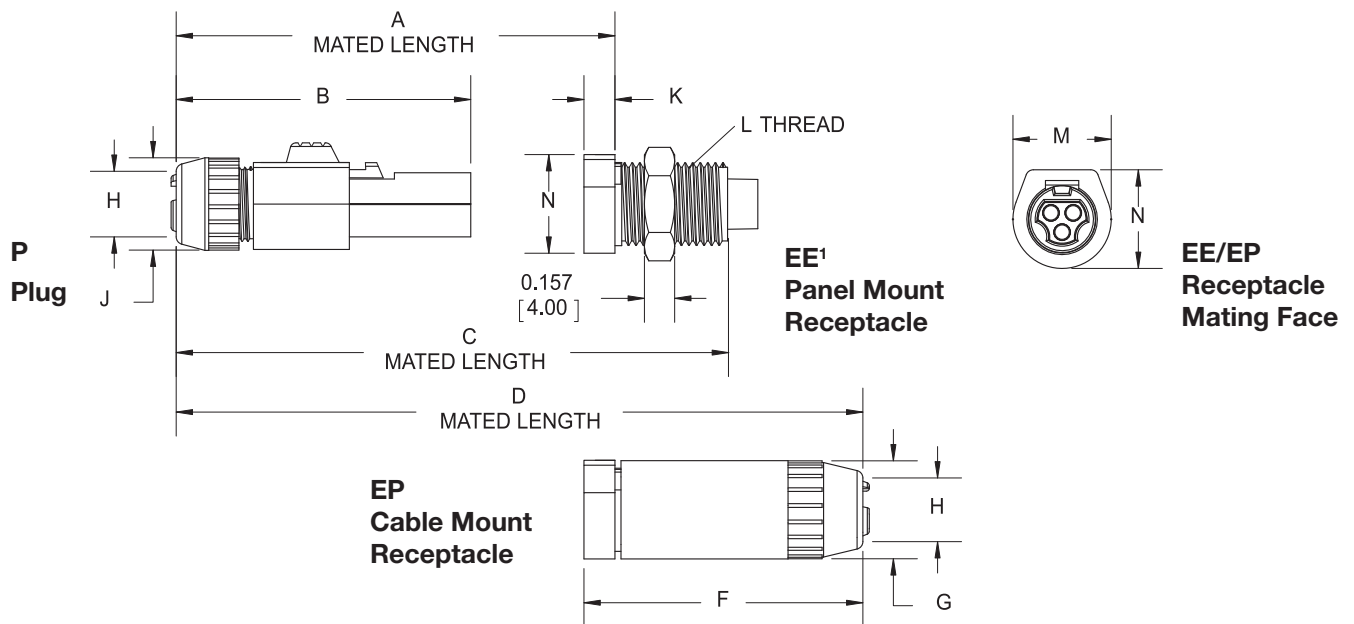




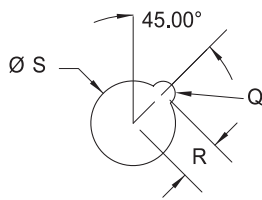
Circular Plastic Connectors

- 3, 4, 7, 9, 12 and 25 position models
- 1 to 8 Amps per contact
- Mixed signal and power or coax available
- recognized components File No. 102195
- Each connector half accepts pins or sockets
- High impact plastic body
- Quick disconnect push button release
- Alignment and polarization provided by housing
- Crimp, solder cup, and pc contacts
- Color coding available

Connector Dimensions



Mounting Dimensions



Hole Punches

Part Number	Series	Maximum Recommended Panel Thickness in Steel	Maximum Recommended Panel Thickness in Alum.
T1903	D01	0.048 [1.25]	0.075 [1.90]
T1904	D02	0.062 [1.60]	0.094 [2.40]

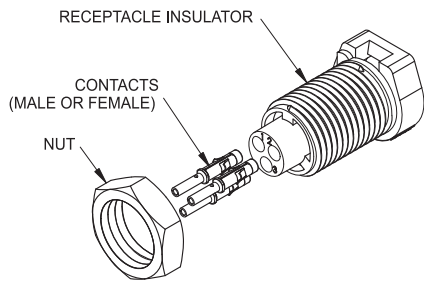
Dimension	D01 Housing	D02 Housing
A	1.142 [29.00]	1.358 [34.50]
B	1.614 [41.00]	1.950 [49.50]
C	1.732 [44.00]	2.087 [53.00]
D	2.400 [61.00]	2.953 [75.00]
F	1.500 [38.00]	1.772 [45.00]
G Dia.	0.512 [13.00]	0.709 [18.00]
H Dia.	0.118 [3.00] Min. 0.216 [5.50] Max.	0.197 [5.00] Min. 0.315 [8.00] Max.
J Dia.	0.472 [12.00]	0.709 [18.00]
K	0.161 [4.10]	0.278 [7.00]
L	M11 X 1.00 Thd.	M15 X 1.00 Thd.
M	0.512 [13.00]	0.669 [17.00]
N	0.512 [13.00]	0.689 [17.50]
Q Dia.	0.220 [5.60]	0.100 [2.54]
R	0.126 [3.20]	0.295 [7.50]
S Dia.	0.441 [11.20]	0.598 [15.20]

NOTE:

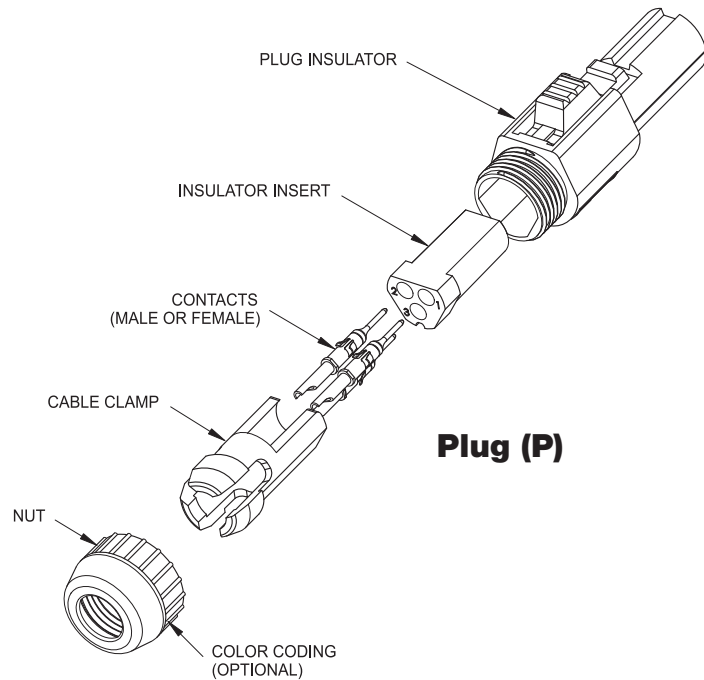
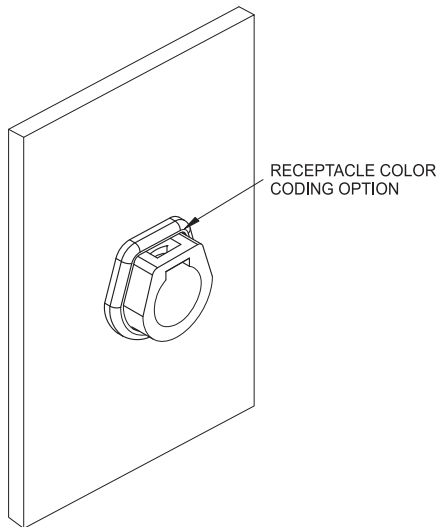
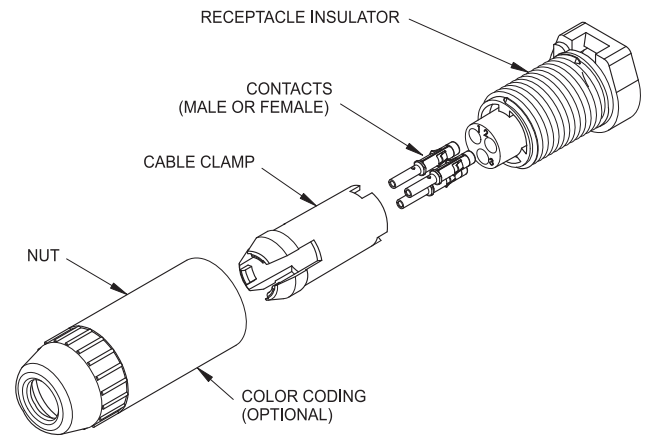
1) Recommended tightening torque for panel mount receptacle (0.452-0.678 N•M) for both D01 and D02.

Dimensions are in inches [mm]

Panel Mount Receptacle (EE)



Cable Mount Receptacle (EP)



D01 General Specifications			
	3 Pin	4 Pin	9 Pin
Contact Diameter	0.024 [0.60]	0.024 [0.60]	0.016 [0.40]
Current Rating (Amps)	4	4	1
Contact Resistance (milliohms)	< 5	< 5	< 8
Extraction Force Per Contact (oz.)	0.50 to 2.00	0.50 to 2.00	0.60 to 1.60
Contact Life Cycles	100,000	100,000	100,000
Breakdown Voltage Between Contacts	> 2250V	> 2250V	> 1000V
Dielectric Withstanding Voltage	1650V	1650V	750V
Contact			
Socket Material	Beryllium copper wires and brass body (socket)		
Pin Material	Brass (pin)		
Plating Material	Gold over nickel		
Insulation Resistance	> 10 ³ megohms at 500 VDC		
Temperature Rating*			
Polycarbonate (D01 - 3 and 4 pin only)	-40° C to 85° C		—
Polyetherimide (D01 - 9 pin only)	—		-40° C to 125° C*

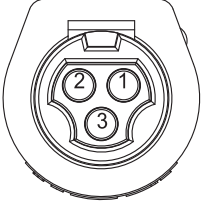
Accessories	3 Pin	4 Pin	9 Pin
Crimp Tool	AFM8 or (M22520/2-01)	AFM8 or (M22520/2-01)	AFM8 or (M22520/2-01)
Positioner	K547	K547	T1914
Removal Tool	S/DEM1.0060	S/DEM1.0060	—
Insertion Tool	T1866	T1866	T1916


D02 General Specifications					
	3 Pin	7 Pin	9 Pin	12 Pin	25 Pin
Contact Diameter	0.059 [1.50]	0.024 [0.60]	0.024 [0.60]	0.018 [0.50]	0.016 [0.40]
Current Rating (Amps)	8	4	4	2.5	1
Contact Resistance (milliohms)	< 2	< 5	< 5	< 8	< 8
Extraction Force Per Contact (oz.)	1.80 to 5.40	0.50 to 2.00	0.50 to 2.00	0.30 to 1.60	0.30 to 1.60
Contact Life Cycles	100,000	100,000	100,000	100,000	100,000
Breakdown Voltage Between Contacts	> 2250	> 2000	> 1560	> 1000	> 1000
Dielectric Withstanding Voltage	1650	1500	1150	750	750
Contact					
Socket Material	Beryllium copper wires and brass body (socket)				
Pin Material	Brass (pin)				
Plating Material	Gold over nickel				
Insulation Resistance	> 10 ³ megohms at 500 VDC				
Temperature Rating*					
Polycarbonate (D02 - 3, 7, 9 and 12 pin only)	-40° C to 85° C				—
Polyetherimide (D02 - 25 pin only)	—				-40° C to 125° C*


Accessories	3 Pin	7 and 9 Pin	12 Pin	25 Pin
Crimp Tool	AF8	AFM8 or M22520/2-01	AFM8 or M22520/2-01	AFM8 or M22520/2-01
Positioner	TP688	K623	T870	T1914
Removal Tool	S/DEM5.0150	S/DEM1.0060	—	—
Insertion Tool	T1888	T1866	T1271	T1916

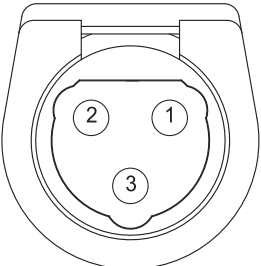
*If color coding option is specified, maximum temperature rating is 85° C.


Dimensions are in inches [mm]

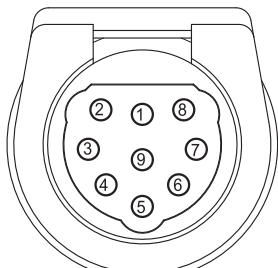
<p>D01 3 Pin</p>  <p>Receptacle seen from mating side</p>	<p>Housing Options</p> <p>Receptacle Panel Mount Receptacle Cable Plug</p>	<p>Example Part Numbers</p> <p>D01EEB306FRTAH D01EPB306FRTAH D01PB306MRT</p>
	<p>Contact Options</p> <p>Crimp Socket – 22-26 AWG Crimp Socket – 18-20 AWG Solder Cup Socket – up to 22 AWG Crimp Pin – 22-26 AWG Crimp Pin – 18-20 AWG Solder Cup Pin – up to 22 AWG</p>	<p>See part number configurator on page 2/17 for complete ordering information.</p>
	<p>Tools</p> <p>Crimp Tool Crimp Positioner Removal Tool Insertion Tool</p>	<p>AFM8 or M22520/2-01 K547 S/DEM1.0060 T1866</p>


<p>D01 4 Pin</p>  <p>Receptacle seen from mating side</p>	<p>Housing Options</p> <p>Receptacle Panel Mount Receptacle Cable Plug</p>	<p>Example Part Numbers</p> <p>D01EEB406FRTAH D01EPB406FRTAH D01PB406MRT</p>
	<p>Contact Options</p> <p>Crimp Socket – 22-26 AWG Crimp Socket – 18-20 AWG Solder Cup Socket – up to 22 AWG Crimp Pin – 22-26 AWG Crimp Pin – 18-20 AWG Solder Cup Pin – up to 22 AWG</p>	<p>See part number configurator on page 2/17 for complete ordering information.</p>
	<p>Tools</p> <p>Crimp Tool Crimp Positioner Removal Tool Insertion Tool</p>	<p>AFM8 or M22520/2-01 K547 S/DEM1.0060 T1866</p>


<p>D01 9 Pin</p>  <p>Receptacle seen from mating side</p>	<p>Housing Options</p> <p>Receptacle Panel Mount Receptacle Cable Plug</p>	<p>Example Part Numbers</p> <p>D01EEB904FRUTAH D01EPB904FRUTAH D01PB904MRUT</p>
	<p>Contact Options</p> <p>Crimp Socket – 26-28 AWG Solder Cup Socket – up to 26 AWG Crimp Pin – 26-28 AWG Solder Cup Pin – up to 26 AWG</p>	<p>See part number configurator on page 2/17 for complete ordering information.</p>
	<p>Tools</p> <p>Crimp Tool Crimp Positioner Insertion Tool</p>	<p>AFM8 or M22520/2-01 T1914 T1916</p>

<p>D02 3 Pin</p>  <p>Receptacle seen from mating side</p>	<p>Housing Options</p> <p>Receptacle Panel Mount Receptacle Cable Plug</p>	<p>Example Part Numbers</p> <p>D02EEB315FRTAH D02EPB315FRTAH D02PB315MRT</p>
	<p>Contact Options</p> <p>Crimp Socket – 18 and 20 AWG Solder Cup Socket – up to 16 AWG Crimp Pin – 18 and 20 AWG Solder Cup Pin – up to 16 AWG</p>	<p>See part number configurator on page 2/17 for complete ordering information.</p>
	<p>Tools</p> <p>Crimp Tool Crimp Positioner Removal Tool Insertion Tool</p>	<p>AF8 TP688 S/DEM5.0150 T1888</p>

<p>D02 7 Pin</p>  <p>Receptacle seen from mating side</p>	<p>Housing Options</p> <p>Receptacle Panel Mount Receptacle Cable Plug</p>	<p>Example Part Numbers</p> <p>D02EEB706FRTAH D02EPB706FRTAH D02PB706MRT</p>
	<p>Contact Options</p> <p>Crimp Socket – 22-26 AWG Solder Cup Socket – up to 22 AWG Crimp Pin – 22-26 AWG Solder Cup Pin – up to 22 AWG</p>	<p>See part number configurator on page 2/17 for complete ordering information.</p>
	<p>Tools</p> <p>Crimp Tool Crimp Positioner Removal Tool Insertion Tool</p>	<p>AFM8 or M22520/2-01 K623 S/DEM1.0060 T1866</p>

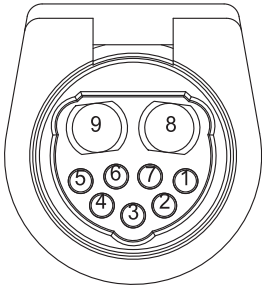
<p>D02 9 Pin</p>  <p>Receptacle seen from mating side</p>	<p>Housing Options</p> <p>Receptacle Panel Mount Receptacle Cable Plug</p>	<p>Example Part Numbers</p> <p>D02EEB906FRTAH D02EPB906FRTAH D02PB906MRT</p>
	<p>Contact Options</p> <p>Crimp Socket – 22-26 AWG Solder Cup Socket – up to 22 AWG Crimp Pin – 22-26 AWG Solder Cup Pin – up to 22 AWG</p>	<p>See part number configurator on page 2/17 for complete ordering information.</p>
	<p>Tools</p> <p>Crimp Tool Crimp Positioner Removal Tool Insertion Tool</p>	<p>AFM8 or M22520/2-01 K623 S/DEM1.0060 T1866</p>

<p>D02 12 Pin</p>  <p>Receptacle seen from mating side</p>	Housing Options	Example Part Numbers
	Receptacle Panel Mount Receptacle Cable Plug	D02EEB125FRTAH D02EPB125FRTAH D02PB125MRT
	Contact Options	See part number configurator on page 2/17 for complete ordering information.
	Crimp Socket – 22-26 AWG Solder Cup Socket – up to 22 AWG Crimp Pin – 22-26 AWG Solder Cup Pin – up to 22 AWG	
	Tools	
	Crimp Tool Crimp Positioner Insertion Tool	AFM8 or M22520/2-01* T870 T1271

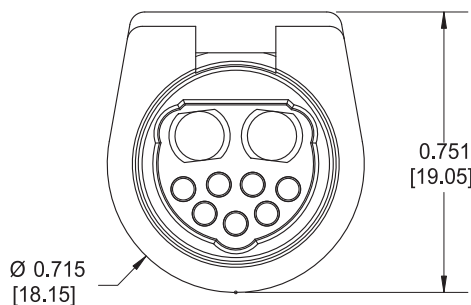
<p>D02 25 Pin</p>  <p>Receptacle seen from mating side</p>	Housing Options	Example Part Numbers
	Receptacle Panel Mount Receptacle Cable Plug	D02EEB2504FRUTAH D02EPB2504FRUTAH D02PB2504MRUT
	Contact Options	See part number configurator on page 2/17 for complete ordering information.
	Crimp Socket – 26-28 AWG Solder Cup Socket – up to 26 AWG Crimp Pin – 26-28 AWG Solder Cup Pin – up to 26 AWG	
	Tools	
	Crimp Tool Crimp Positioner Insertion Tool	AFM8 or M22520/2-01 T1914 T1916

Combination Connectors Power and Signal

• Two 8 Amp and seven 2.5 Amp Signal Contacts • Crimp Contacts

<p>D02 Power and Signal</p>  <p>Receptacle seen from mating side</p>	<p>Housing Options</p> <p>Receptacle Panel Mount Plug</p>	<p>Example Part Numbers*</p> <p>D02EEB215/705FRTAH D02PB215/705MRT</p>	
	<p>Contact Options</p> <p>Power Socket – 16-20 AWG Power Pin – 16-20 AWG Signal Socket – 22-26 AWG Signal Pin – 22-26 AWG</p>	<p>See part number configurator on page 2/17 for complete ordering information.</p>	
	<p>Tools</p> <p>Crimp Tool Crimp Positioner (Pin) Crimp Positioner (Socket) Removal Tool Insertion Tool</p>	<p>Power</p> <p>AF8 T1164 TP688 T1124 –</p>	<p>Signal</p> <p>AFM8 T870 T870 – T1215</p>

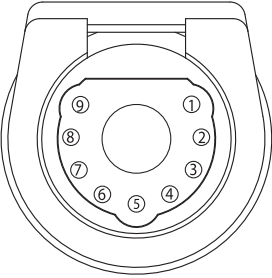
General Specifications		
Contacts	Power	Signal
Number of Contacts	2	7
Diameter	0.059 [1.50]	0.018 [0.50]
Current Rating (Amps)	8	2.50
Contact Resistance	< 2.0 milliohms	< 8.0 milliohms
Extraction Force	1.8 to 5.4 oz.	0.3 to 1.6 oz.
Contact Material	<p>Brass Beryllium copper wires and brass body</p>	
Insulator Material	<p>Polycarbonate Polycarbonate</p>	
Flammability	UL94V0	
Temperature Rating	-40° C to 85° C	
Insulation Resistance	> 10 Mohm at 500 VDC	



NOTE:
*B = Black Polycarbonate Available in Power and Signal.

Dimensions are in inches [mm]

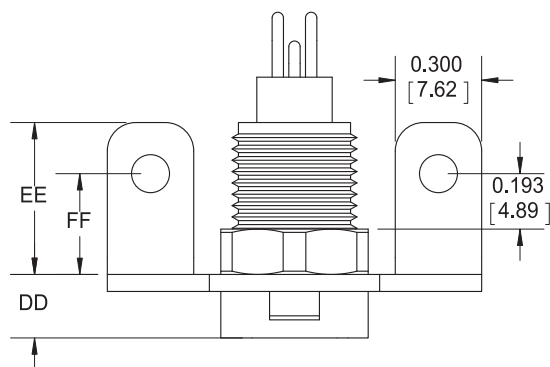
Combination Connectors Coax or Power and Signal

<p>D02 Coax or Power and Signal</p>  <p>Receptacle seen from mating side</p>	<p>Housing Options</p> <p>Receptacle Panel Mount Receptacle Cable Plug</p>		<p>Example Part Numbers¹</p> <p>D02EEB905FR1C1FRUTHA D02EPB905FR1C1FRUTHA D02PB905MR1C1MRUT</p>	
	<p>Contact Options</p> <p>Coax Crimp Socket – RRG 316, RG316DB Coax Solder Cup Socket – RG405, T-Flex 405 Coax Crimp Pin – RG316, RG316DB Coax Solder Cup Pin – RG405, T-Flex 405 Power Crimp Socket – 12 AWG Power Crimp Pin – 12 AWG Signal Crimp Socket – 22-26 AWG Signal Solder Cup Socket – 22-26 AWG Signal Crimp Pin – 22-26 AWG Signal Solder Cup Pin – 22-26 AWG</p>		<p>See part number configurator on page 2/17 for complete ordering information.</p>	
	<p>Tools</p>			
	<p>Crimp Tool</p> <p>Crimp Die Set</p> <p>Crimp Positioner Removal Tool Insertion Tool</p>	<p>Coax</p> <p>HX3 (Outer) AFM8 (Inner) T1958 (Outer) or T2019 (Outer for RG316DB) T1957 (Inner) T1982 –</p>	<p>Power</p> <p>M309 – – – – T1981 T1982 –</p>	<p>Signal</p> <p>AFM8 – – – – T870 – T1215</p>

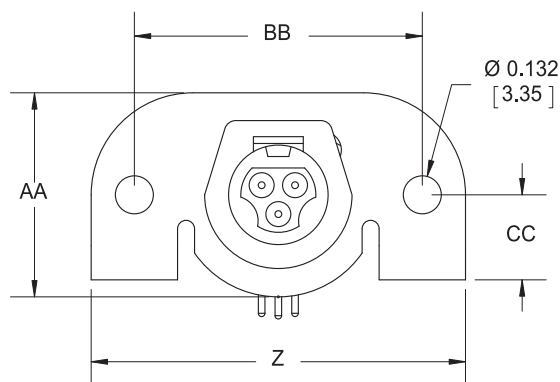
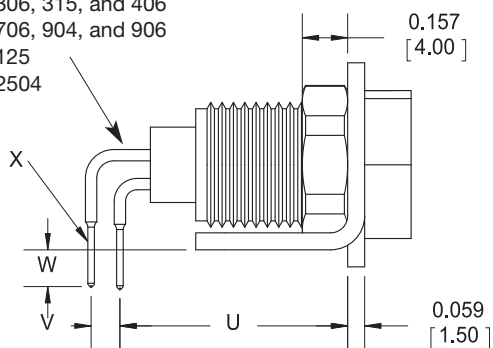
NOTES:
1) H = Black Polyetherimide (High Temperature).
2) Available in Coax or Power and Signal.

Dimensions are in inches [mm]

Printed Circuit Board Receptacles (Right Angle)



2 Rows: 306, 315, and 406
3 Rows: 706, 904, and 906
4 Rows: 125
6 Rows: 2504



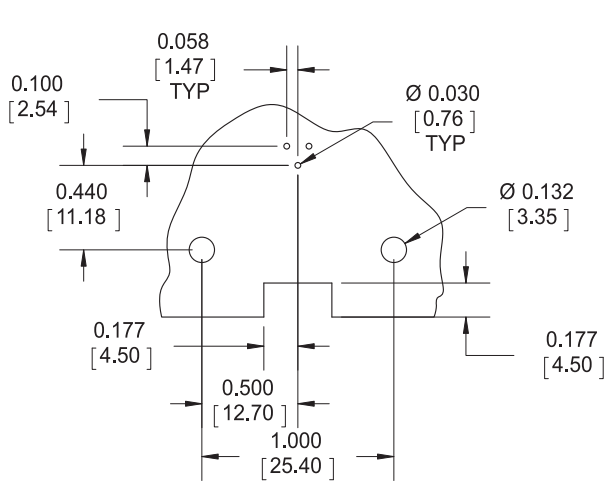
Dimension	D01 Housing 3 and 4 Position	D01 Housing 9 Position	D02 Housing 3 Position	D02 Housing 7 and 9 Position	D02 Housing 12 Position	D02 Housing 25 Position
U	0.790 [20.07]	0.700 [17.79]	0.834 [21.19]	0.742 [18.85]	0.689 [17.50]	0.655 [16.65]
V	0.100 [2.54]	0.075 [1.90]	0.150 [3.81]	0.100 [2.54]	0.100 [2.54]	0.075 [1.90]
W	0.187 [4.74]	0.181 [4.60]	0.184 [4.68]	0.177 [4.50]	0.173 [4.39]	0.181 [4.60]
X Dia.	0.024 [0.60]	0.015 [0.38]	0.059 [1.50]	0.024 [0.60]	0.017 [0.435]	0.015 [0.38]
Z	1.300 [33.02]	1.300 [33.02]	1.500 [38.10]	1.500 [38.10]	1.500 [38.10]	1.500 [38.10]
AA	0.709 [18.00]	0.709 [18.00]	0.866 [22.00]	0.866 [22.00]	0.866 [22.00]	0.866 [22.00]
BB	1.000 [25.40]	1.000 [25.40]	1.200 [30.48]	1.200 [30.48]	1.200 [30.48]	1.200 [30.48]
CC	0.236 [6.00]	0.236 [6.00]	0.315 [8.00]	0.315 [8.00]	0.315 [8.00]	0.315 [8.00]
DD	0.220 [5.60]	0.220 [5.60]	0.335 [8.50]	0.335 [8.50]	0.335 [8.50]	0.335 [8.50]
EE	0.528 [13.40]	0.528 [13.40]	0.610 [15.50]	0.610 [15.50]	0.610 [15.50]	0.610 [15.50]
FF	0.350 [8.89]	0.350 [8.89]	0.400 [10.16]	0.400 [10.16]	0.400 [10.16]	0.400 [10.16]

Dimensions are in inches [mm]

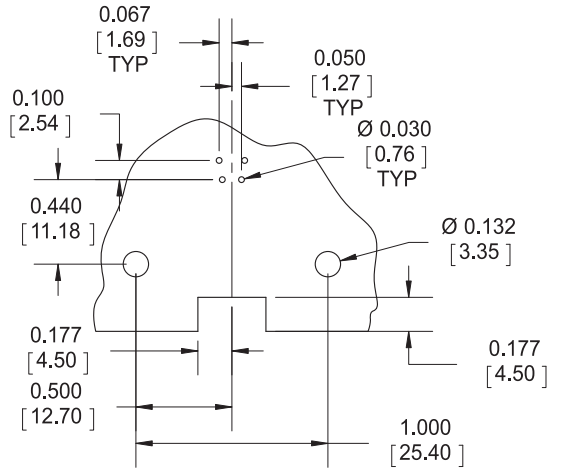
Mounting Dimensions

Right Angle Daughter Board Application

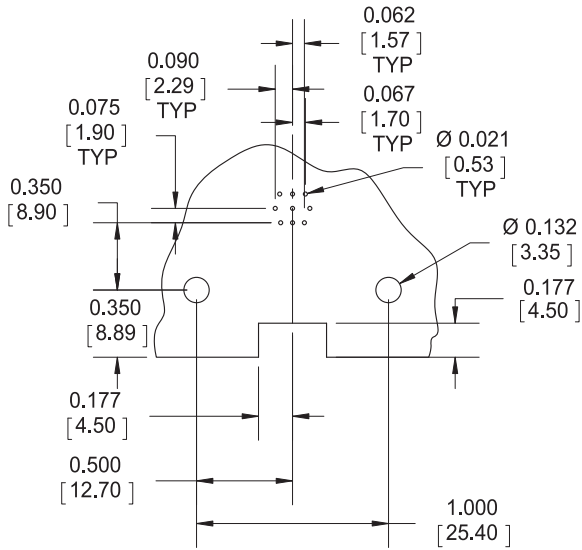
Printed Circuit Board Shown From Component Side



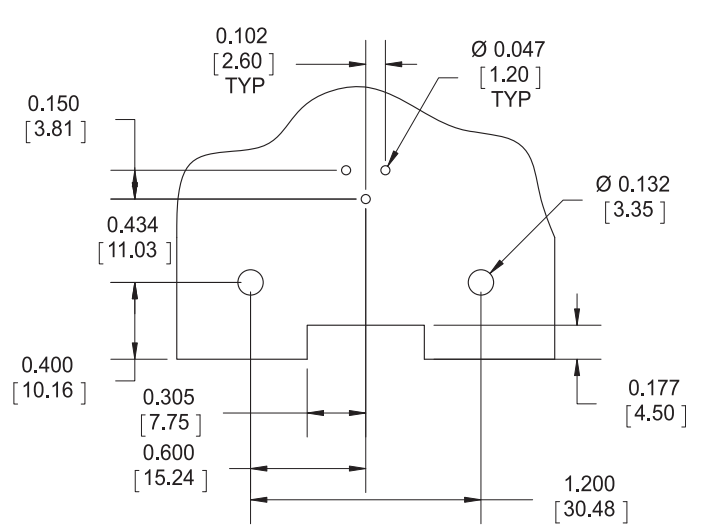
**Printed Circuit Board Layout for
D01EEB306FB24TABH**



**Printed Circuit Board Layout for
D01EEB406FB24TABH**



**Printed Circuit Board Layout for
D01EEB904FB24UTABH**



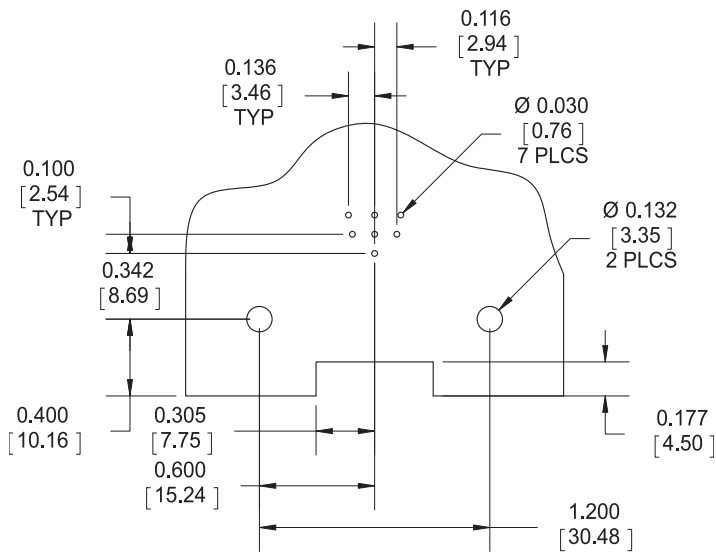
**Printed Circuit Board Layout for
D02EEB315FB24TABH**

Dimensions are in inches [mm]

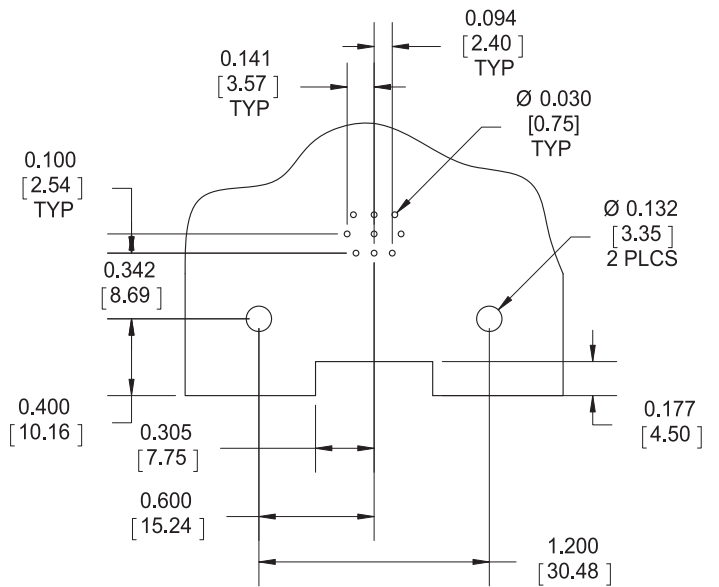
Mounting Dimensions

Right Angle Daughter Board Application

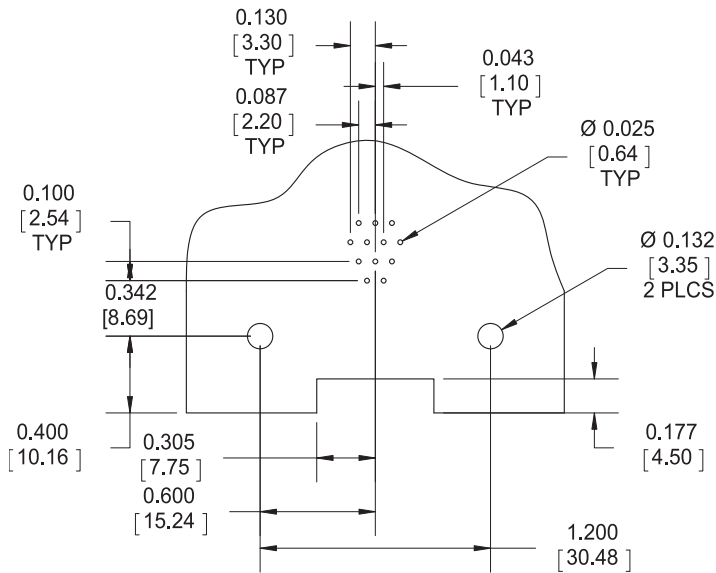
Printed Circuit Board Shown From Component Side



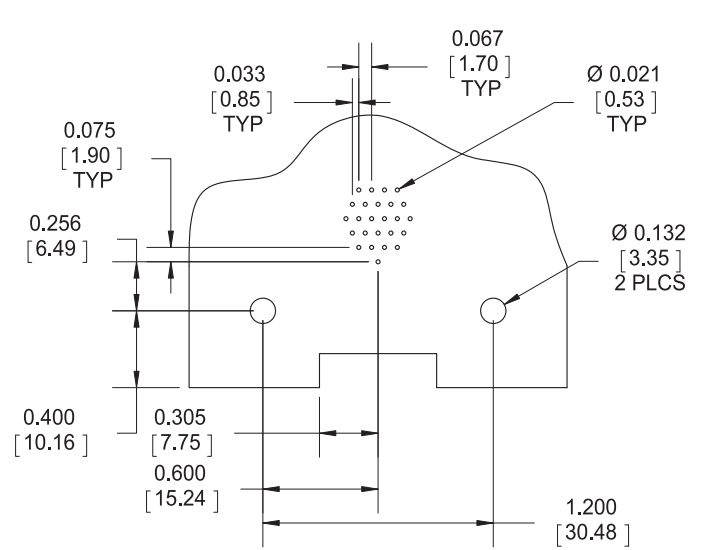
**Printed Circuit Board Layout for
D02EEB706FB24TABH**



**Printed Circuit Board Layout for
D02EEB906FB24TABH**



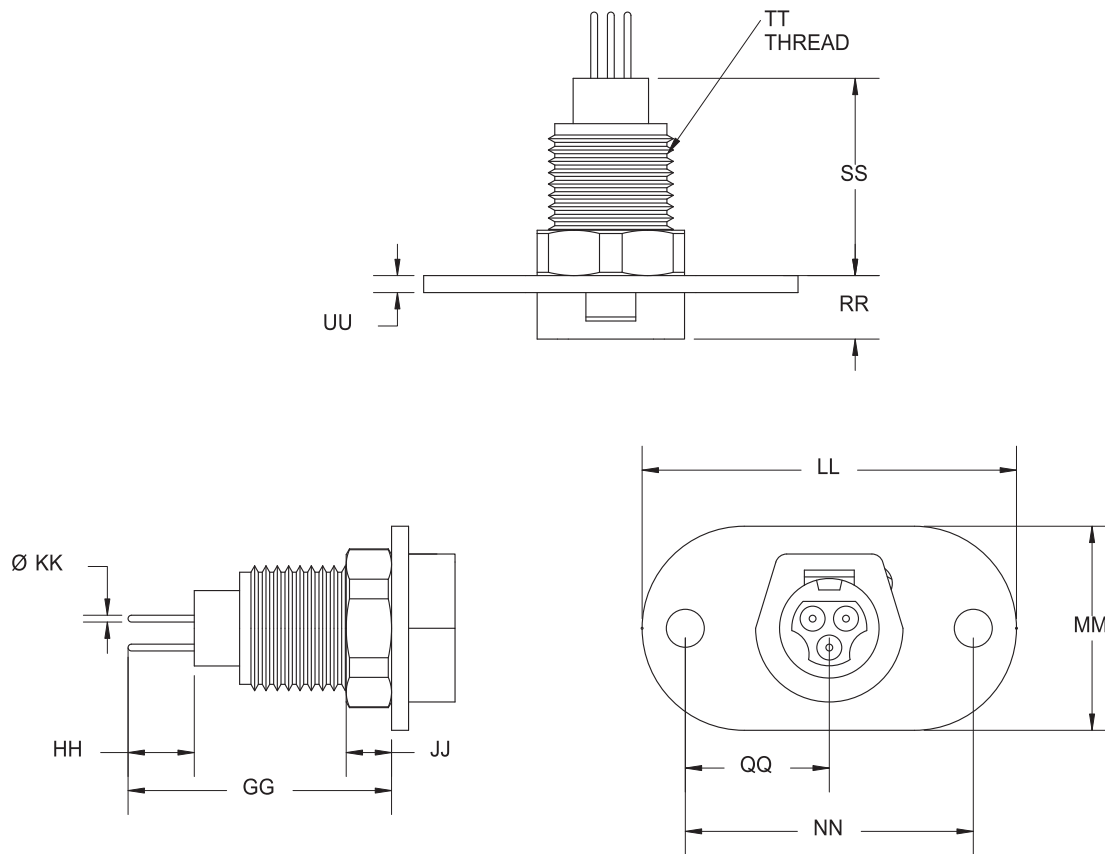
**Printed Circuit Board Layout for
D02EEB125FB24TABH**



**Printed Circuit Board Layout for
D02EEB2504FB24UTABH**

Dimensions are in inches [mm]

Printed Circuit Board Receptacles (Straight Dip Solder)



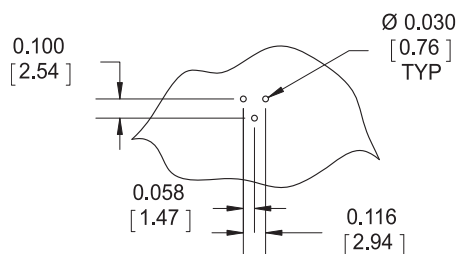
Dimension	D01 Housing 3 and 4 Position	D01 Housing 9 Position	D02 Housing 3 Position	D02 Housing 7 and 9 Position	D02 Housing 12 Position	D02 Housing 25 Position
GG	0.914 [23.23]	0.866 [22.00]	1.059 [26.91]	0.989 [25.12]	0.923 [23.45]	0.870 [22.10]
HH	0.229 [5.82]	0.181 [4.60]	0.193 [4.91]	0.221 [5.61]	0.233 [5.94]	0.260 [4.60]
JJ	0.157 [4.00]	0.157 [4.00]	0.157 [4.00]	0.157 [4.00]	0.157 [4.00]	0.157 [4.00]
KK	0.023 [0.58]	0.015 [0.38]	0.039 [1.00]	0.023 [0.58]	0.017 [0.43]	0.015 [0.38]
LL	1.300 [33.02]	1.300 [33.02]	1.500 [38.10]	1.500 [38.10]	1.500 [38.10]	1.500 [38.10]
MM	0.709 [18.00]	0.709 [18.00]	0.866 [22.00]	0.866 [22.00]	0.866 [22.00]	0.866 [22.00]
NN	1.000 [25.40]	1.000 [25.40]	1.200 [30.48]	1.200 [30.48]	1.200 [30.48]	1.200 [30.48]
QQ	0.500 [12.70]	0.500 [12.70]	0.600 [15.24]	0.600 [15.24]	0.600 [15.24]	0.600 [15.24]
RR	0.220 [5.60]	0.220 [5.60]	0.335 [8.50]	0.335 [8.50]	0.335 [8.50]	0.335 [8.50]
SS	0.685 [17.40]	0.685 [17.40]	0.866 [22.00]	0.768 [19.50]	0.689 [17.50]	0.689 [17.50]
TT	M11 x 1.00 Thd.	M11 x 1.00 Thd.	M15 x 1.00 Thd.	M15 x 1.00 Thd.	M15 x 1.00 Thd.	M15 x 1.00 Thd.
UU	0.059 [1.50]	0.059 [1.50]	0.059 [1.50]	0.059 [1.50]	0.059 [1.50]	0.059 [1.50]

Dimensions are in inches [mm]

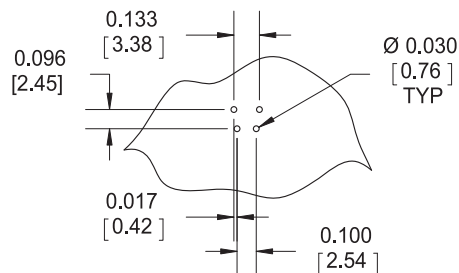
Mounting Dimensions

Straight Contact Printed Circuit Board Application

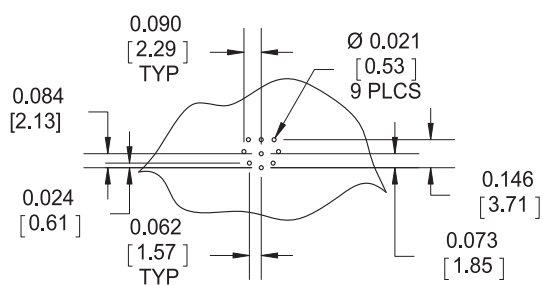
Printed Circuit Board Shown From Component Side



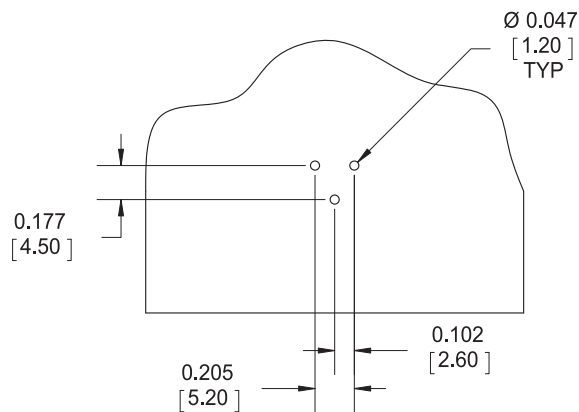
**Printed Circuit Board Layout for
D01EEB306FD21TABH**



**Printed Circuit Board Layout for
D01EEB406FD21TABH**



**Printed Circuit Board Layout for
D01EEB904FD21UTABH**



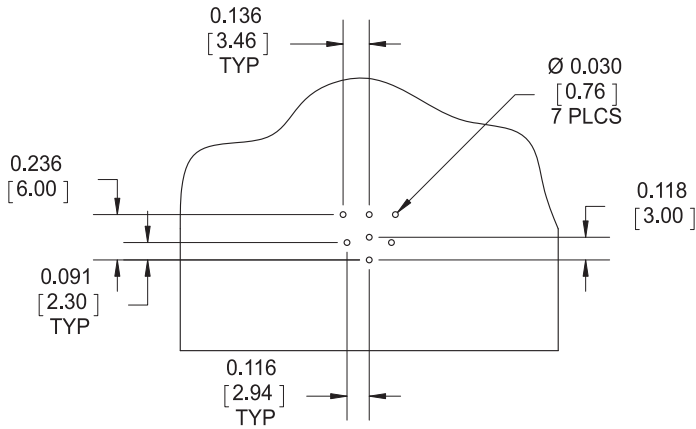
**Printed Circuit Board Layout for
D02EEB315FD21TABH**

Dimensions are in inches [mm]

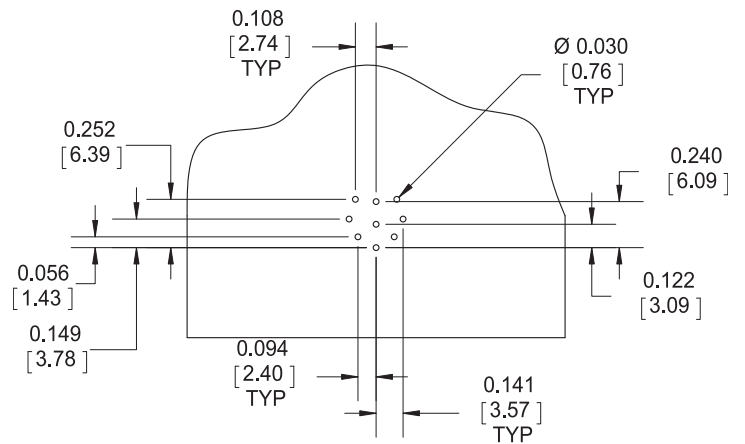
Mounting Dimensions

Straight Contact Printed Circuit Board Application

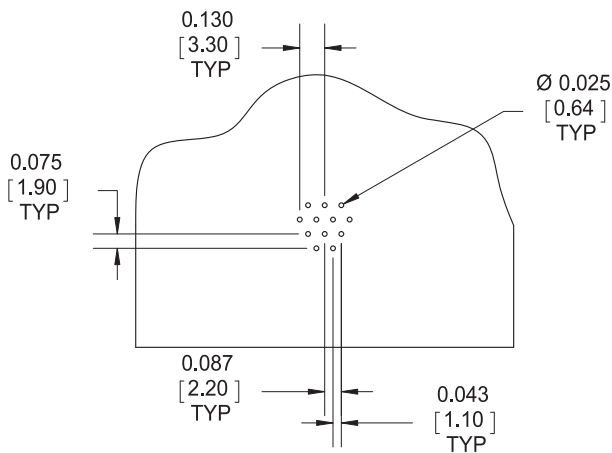
Printed Circuit Board Shown From Component Side



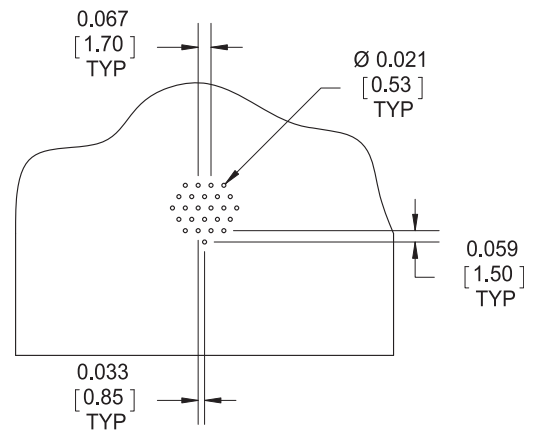
**Printed Circuit Board Layout for
D02EEB706FD21TABH**



**Printed Circuit Board Layout for
D02EEB906FD21TABH**



**Printed Circuit Board Layout for
D02EEB125FD21TABH**



**Printed Circuit Board Layout for
D02EEB2504FD21UTABH**

Dimensions are in inches [mm]

Ordering Information

	D01	V	P	B	306	F	B	24	U	TABH	
Connector Housing	D01, D02										
Color Code Indicator*	D = Blue R = Red T = Orange V = Green W = White Y = Yellow Omit character if not required										
Insulator	P = Plug EE = Receptacle panel mount EP = Receptacle cable mount (EP Not available for 215/705 style)										
Main Body Color	B = Black										
Contact Arrangement	D01 3 Pin = 306 D01 4 Pin = 406 D01 9 Pin = 904 D02 3 Pin = 315 D02 7 Pin = 706		D02 9 Pin = 906 D02 12 Pin = 125 D02 25 Pin = 2504 D02 Power/Signal = 215/705								
										Plating	See Plating Reference
										Material	Omit for Polycarbonate U = Polyetherimide D01 904 and D02 2504 only
											00 = B&D terminal connectors with no bracket 21 = Mounting for straight printed circuit board 24 = Mounting for right angle print circuit board Omit for cable and front panel mount on R&S terminal.
										Terminal Styles	B = Right angle (female printed circuit mount only) ¹⁾ D = Straight (female printed circuit mount only) ¹⁾ R = Crimp for 22-26 AWG (shipped unassembled) RR = Crimp for 18-20 AWG (D01/306 and D01/406 only. (shipped unassembled)) S = Solder cup (shipped unassembled) Leave blank for no contacts
										Contact Gender	M = Male F = Female N = No contacts

**Note: Color code indicators are custom order only. Components are polycarbonate material.*

D02 Coax or Power and Signal Ordering Information

	D02	V	P	B	905	M	R	1C1	M	R	U	TH
Connector Housing	D02											
Color Code Indicator*	Omit character if not required											
Insulator	P = Plug EE = Receptacle panel mount EP = Receptacle cable mount											
Color	B = Black											
Contact Arrangement	905											
Signal Contact Gender	M = Male F = Female N = No signal contacts											
Terminal Styles	R = Crimp S = Solder N = No contacts											
											Plating	See Plating Reference
											Material	U = Polyetherimide (black)
											Terminal Styles	R = Crimp S = Solder Omit for connector without power/coax contacts
											Coax Contact Gender	M = Male F = Female N = No coax / power contacts
											Coaxial/Power Cable Type	1C1 = RG316 (crimp) 1C2 = T-Flex 405, RG 405 (solder only, cannot be used with crimp) 1C3 = RG316DB 1P1 = 12 AWG N = No contacts

**Note: Color code indicators are custom order only. Components are polycarbonate material.*

Plating Reference

Male Pins:	T = 10µin gold (min) over nickel TH = 50µin gold (min) over nickel
Female Sockets:	TAH = 50µin gold (min) over nickel on mating surface, gold flash over nickel on termination TABH = 50µin gold (min) over nickel on mating surface, tin lead over nickel on termination (D & B only)

NOTE:
1) Check factory for availability.

Dimensions are in inches [mm]