

YMC series circular electrical connector

YMC series is extended from YM series, designed as bayonet coupling and springtac socket. Plug is designed as crimp contact and receptacle is solder contact.

Part number

	YMC	22	F	7	K ₁	P ₄₀	(W)
Basic series							
Shell size							
18, 22, 24, 27, 30, 33, 36, 39, 42							
Type of plug and receptacle							
T = Plug							
F = Square flange receptacle							
S = Jam nut hermetic receptacle thru bulkhead							
Number of contact							
01 ~ 37							
Type of contact							
Z ₁ = Pin with gold plating							
K ₁ = Socket with gold plating							
M ₁ = Contact with gold plating (only for thru bulkhead receptacle)							
Formation							
D ₄₀ = Short shell without thread, stainless steel passivated							
P ₄₀ = Stainless steel passivated with thread							
Orientation							
N, W, X, Y, Z							
Omit = N							

Performance specification

Operating temperature: -55 °C ~ +200 °C

Relative humidity: at 60 °C, 95%

Environment-resistance: salt spray test 1000 hours

Shell: stainless steel passivated

Insulator: thermosetting material

Contact: cooper-alloy with gold plating

Vibration: at 10 ~ 2000 Hz, acceleration: 196 m/s²

Shock: acceleration 980 m/s²

Endurance: ≥ 1000 cycles

Electrical performance

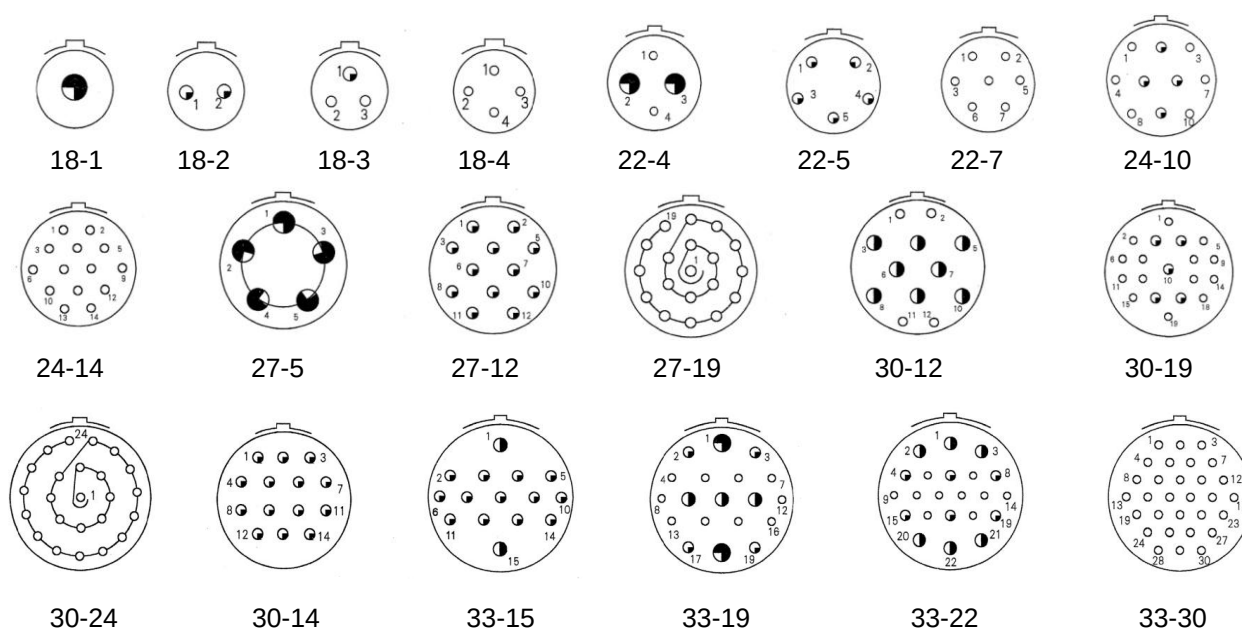
Contact resistance and rated current

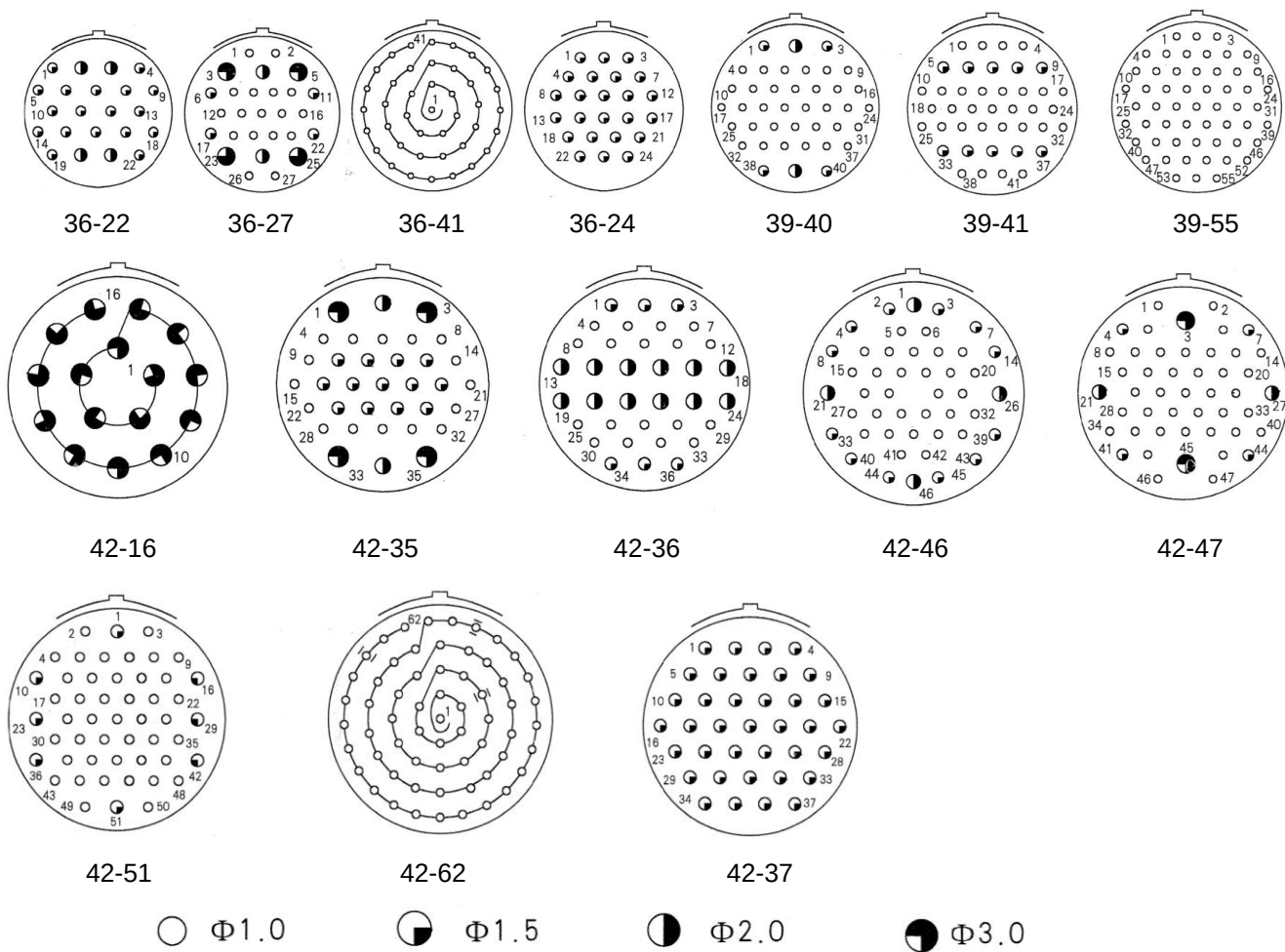
Size (mm)	Resistance (mΩ)	Rated current (A)	Inside diameter (mm)
Φ 1.0	5.00	5	Φ 1.3
Φ 1.5	2.50	10	Φ 1.8
Φ 2.0	1.25	20	Φ 2.5
Φ 3.0	0.75	40	Φ 3.4

Rated voltage, Withstanding voltage and Insulation resistance

Operating environment	Rated voltage (v)	Withstanding voltage (v)	Insulation resistance (MΩ)
Normal	500	1500	≥ 5000
Hot and humid	500	1125	≥ 100
Low pressure (1KPa)	250	300	---

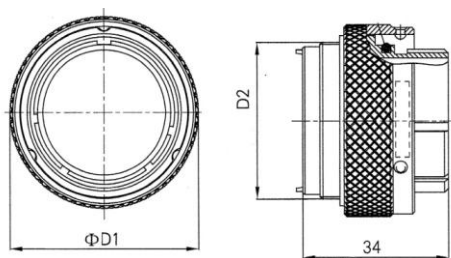
Contact layout



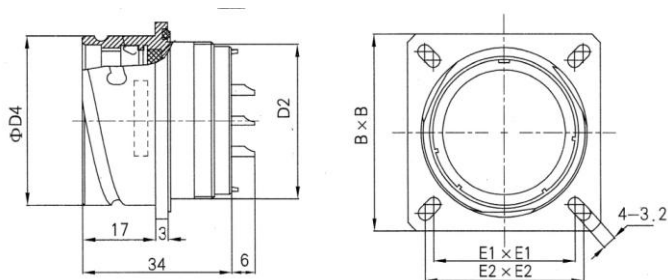


Shell size

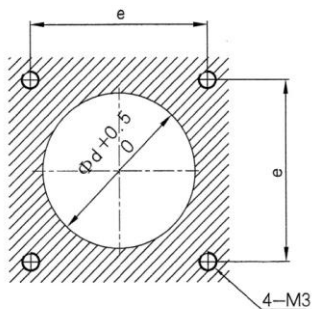
Plug (crimp contact)



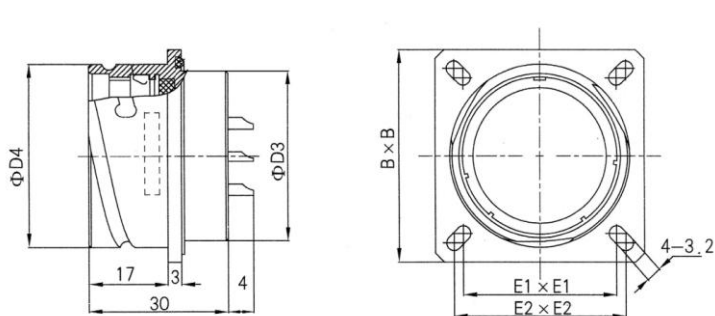
Receptacle-P₄₀ (solder contact)



Hole dimensions on receptacle panel

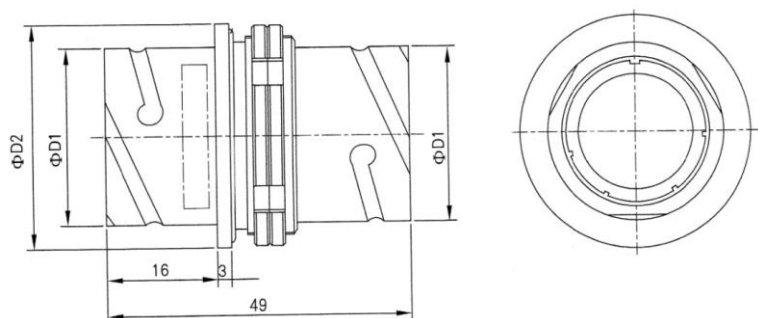


Receptacle-D₄₀ (solder contact)



Shell size	D1	D2	D3	D4	B	E1	E2	d	e
18	26	M18 × 1	18.0	20.8	27.5	21.0	22.0	18.5	21.0 ~ 22.0
22	30	M22 × 1	22.0	24.8	30.0	23.0	24.5	22.5	23.0 ~ 24.5
24	32	M24 × 1	24.0	26.8	33.0	25.0	27.0	24.5	25.0 ~ 27.0
27	35	M27 × 1	27.0	29.8	36.0	27.0	30.0	27.5	27.0 ~ 30.0
30	38	M30 × 1	30.0	32.8	39.0	29.0	32.0	30.5	29.0 ~ 32.0
33	41	M33 × 1	33.0	35.8	42.0	31.0	34.5	33.5	31.0 ~ 34.5
36	44	M36 × 1	36.0	38.8	45.0	33.0	37.0	36.5	33.0 ~ 37.0
39	47	M39 × 1	39.0	41.8	48.0	35.5	39.0	39.5	35.5 ~ 39.0
42	50	M42 × 1	42.0	44.8	51.0	38.0	41.5	42.5	38.0 ~ 41.5

Thru bulkhead receptacle



Shell size	D1	D2
18	20.8	34.0
22	24.8	38.0
24	26.8	40.0
27	29.8	43.0
30	32.8	46.0
33	35.8	49.0
36	38.8	52.0
39	41.8	55.0
42	44.8	58.0