

# RM SERIES SHELL SIZE 12 – 31mm CIRCULAR CONNECTORS

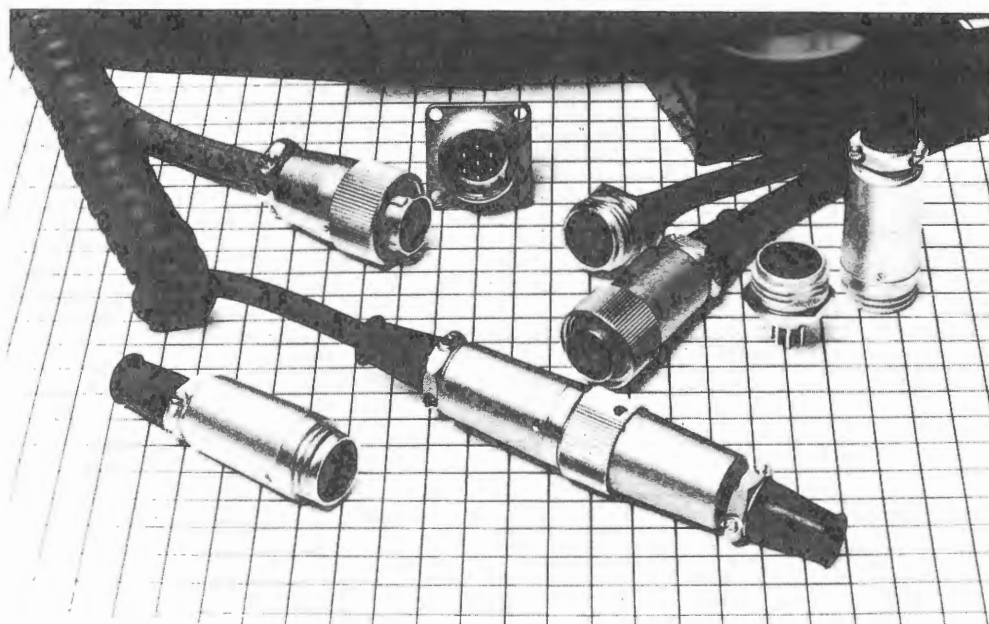
## Introduction

RM Series are compact, circular connectors HIROSE has developed as the result of many years of research and proven experience to meet the most stringent demands of communication equipment as well as electronic equipment. RM Series is available in 5 shell sizes: 12, 15, 21, 24, and 31. There are also 16 kinds of contacts: 2, 3, 4, 5, 6, 7, 8, 10, 12, 15, 20, 31, 40, and 55 (contacts 2 and 4 are available in two types). The lock mechanisms with thread

coupling type, bayonet sleeve type or quick detachable type are easy to use.

Various kinds of accessories are available.

RM Series are miniaturized in size, rugged and excellent in mechanical and electrical performance thus making it possible to meet the most stringent demands of users. Refer to the contact arrangements of RM series connectors on page 46.



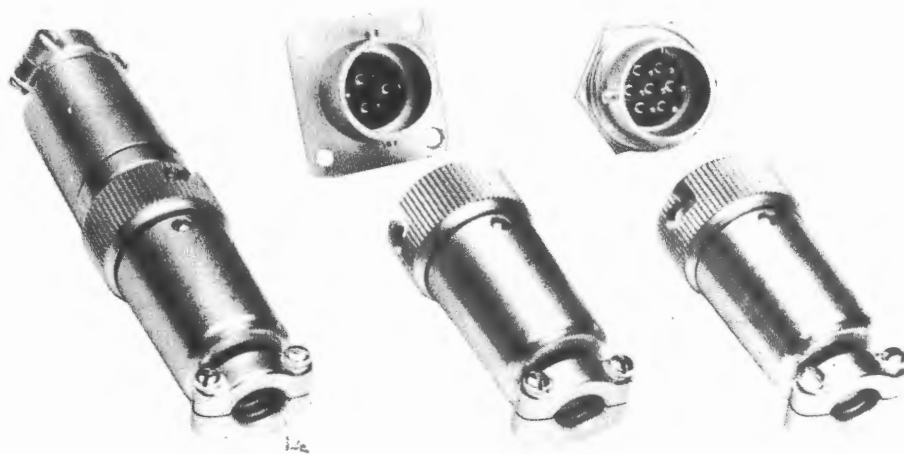
## Material and Finish

Socket Contact	1) CDA alloy 194 (all of solder pot type), Silver plated 2) Phosphor bronze (dip soldering and crimping type), Silver plated
Pin Contact	Brass, Silver plated
Molding	1) UL94V-0 diallyl phthalate (all of solder pot type), Black 2) UL94V-0 glass-filled polycarbonate (dip soldering and crimping type), Black
Shell	1) Zinc alloy (RM12B, RM15T-Video), Nickel plated 2) Brass (RM15Q, Other RM series), Nickel plated
Body	1) Zinc alloy (RM12B), Matte finish nickel plated 2) Aluminum alloy (RM15T-Video), Alumite coating 3) Brass (RM15Q, Other RM series), Bright finish nickel plated

# RM12B SERIES SHELL SIZE 12mm BAYONET LOCK CONNECTORS

Hirose has developed RM12B series in order to supply customers better cylindrical connectors which enable easier soldering termination due to the long plug body. Diecast

zinc alloy housings reduce costs. Coupled with reliable, long life contacts, the RM12B connectors are an attractive and competitive offering.



**Pin Contact**

**Socket Contact**



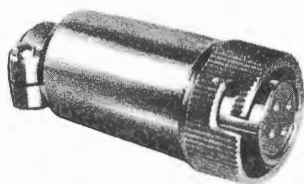
## Features

- Pipe shaped socket contact for long life reliable operation
- UL94V-0 diallyl phthalate molding material for excellent electrical and mechanical characteristics
- Sleek design with grainy matte finish
- Bayonet type coupling for easy operation
- Reversible pin and socket insert
- 2,3,4,5,6, and 7 pin available in the common diecasting body
- Besides plug and receptacle, a jack is available for cable extension program

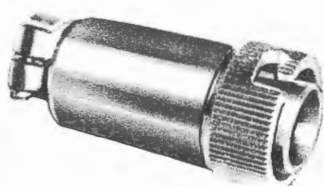
## Specification

- Operating voltage: AC600V (2 pin)  
AC500V (3 and 4 pin)  
AC350V (5,6 and 7 pin)
- Current rating: 5 amps
- Insulation resistance: min. 1,000M $\Omega$  at DC500V
- Contact resistance: max. 4m $\Omega$
- Solder cup diameter: 1.1mm (.043")
- Temperature cycling: -55°C to +85°C
- Contact durability: 2000 times at max. 8m $\Omega$

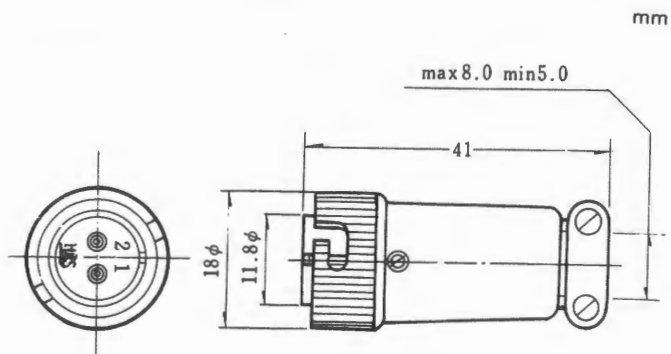
## Plug



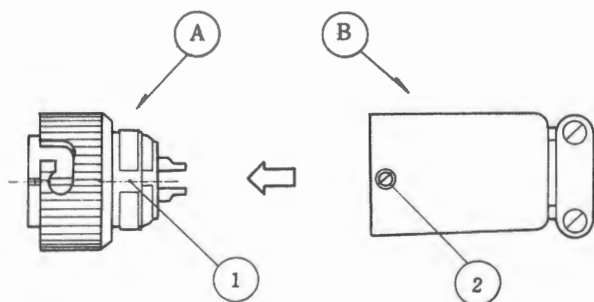
RM12BPG-4S



RM12BPG-4PH









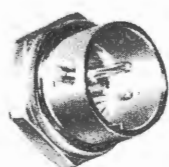
No. of pin	Part No.
2	RM12BPG-2PH RM12BPG-2S
3	RM12BPG-3PH RM12BPG-3S
4	RM12BPG-4PH RM12BPG-4S
5	RM12BPG-5PH RM12BPG-5S
6	RM12BPG-6PH RM12BPG-6S
7	RM12BPG-7PH RM12BPG-7S



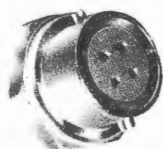
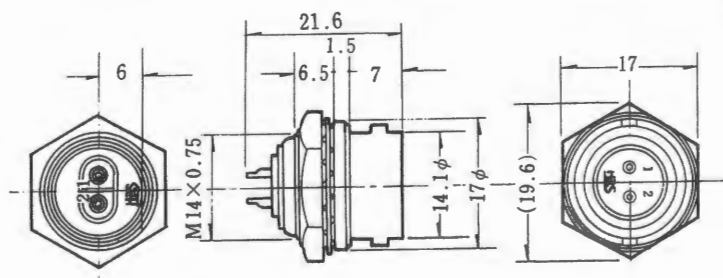
**Caution:**  
After soldering termination, when ② part is screwed onto ① part, please pay attention to locate them, so the screw ② drops in one of three dents as shown ① around the rim.

## Contact arrangement

Shell size						
12						
No. of contacts	2	3	4	5	6	7



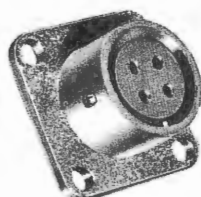
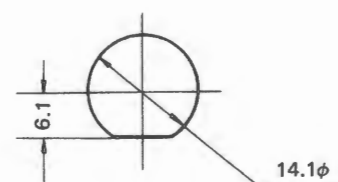
RM12BRD-4PH



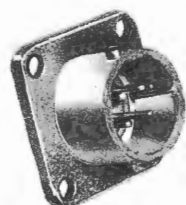
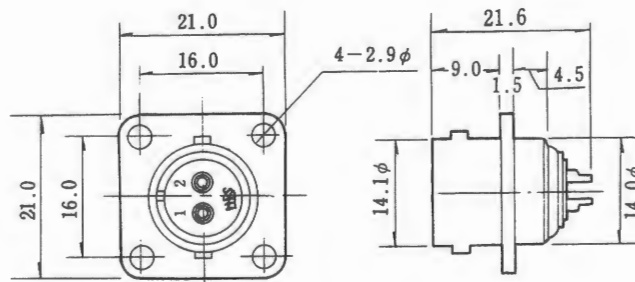
RM12BRD-4S

No. of pins	Part No.
2	RM12BRD-2S RM12BRD-2PH
3	RM12BRD-3S RM12BRD-3PH
4	RM12BRD-4S RM12BRD-4PH
5	RM12BRD-5S RM12BRD-5PH
6	RM12BRD-6S RM12BRD-6PH
7	RM12BRD-7S RM12BRD-7PH

Mounting Hole



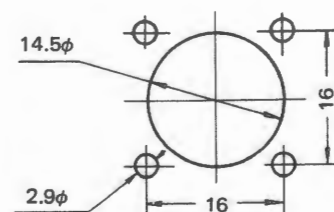
RM12BRB-4S



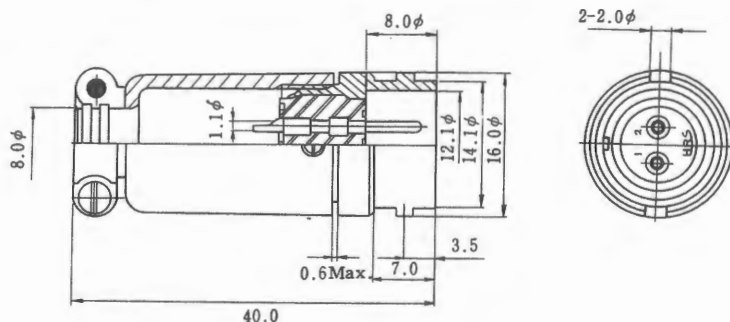
RM12BRB-4PH

No. of pins	Part No.
2	RM12BRB-2S RM12BRB-2PH
3	RM12BRB-3S RM12BRB-3PH
4	RM12BRB-4S RM12BRB-4PH
5	RM12BRB-5S RM12BRB-5PH
6	RM12BRB-6S RM12BRB-6PH
7	RM12BRB-7S RM12BRB-7PH

Mounting Hole



## Jack



No. of pins	Part No.
2	RM12BJB-2S RM12BJB-2PH
3	RM12BJB-3S RM12BJB-3PH
4	RM12BJB-4S RM12BJB-4PH
5	RM12BJB-5S RM12BJB-5PH
6	RM12BJB-6S RM12BJB-6PH
7	RM12BJB-7S RM12BJB-7PH

## Ordering Information

	RM	21	T	P	A	-	20	S	Y	( )
1. Series Name; _____										
RM: Round Miniature										
2. Shell Size; _____										
The shell size is figured by outer diameter of fitting section of plug and available in 5 types, 12, 15, 21, 24, 31.										
3. Type of lock mechanism; _____										
T: Thread coupling type										
B: Bayonet sleeve type										
Q: Quick detachable type										
4. Shell Type; _____										
P: Plug										
R: Receptacle										
J: Jack										
5. Shell model change mark; _____										
Each time the shell undergoes a change in enclosure or the like, it is marked as A, B, D, E, and so on.										
6. Contact Arrangement; _____										
Number of contacts.										
7. Type of Contact; _____										
P: Pin										
S: Socket										
8. Change of insert position; _____										
When change of insert position is required, a letter, W, X, Y, or Z is used. See page 61.										
9. Cable dia. _____										
( ) : Stands for the dia. of cords for dustproof and water-proof plugs.										
For details, please refer to the descriptions on page										

This image shows a full page of a worksheet designed for handwriting practice. It features approximately 20 horizontal dashed lines spaced evenly across the page, providing a guide for letter height and placement. The background is plain white, and there are no other markings or text present.