



## S3 Series Plastic Push-pull Connectors

S3-ver1.3

RoHS compliant S3 series plastic circular connector is a push-pull connector with self-latching system. It is compact, light, durable and simple to operate. Size M14 is compatible with Lemo / Redel 1P series. S3 series has been widely used for applications like medical, test and instrumentation.

### Technical Parameters

#### Environmental

Working temperature:  $-40^{\circ}\text{C} \sim 105^{\circ}\text{C}$   
 IP degree: IP50

#### Mechanical

Cycle of contacts:  $>5,000$   
 Cycle of connectors:  $>3,000$   
 Total insertion force:  $9\sim 12\text{N}$

#### Electrical

Insulation resistance (normal ambient):  $\geq 5,000\text{M}\Omega$

Contact resistance:

$\phi 1.25$  contact  $\leq 3\text{ m}\Omega$ ;  $\phi 0.9$  contact  $\leq 5\text{ m}\Omega$ ;  $\phi 0.7$  contact  $\leq 7\text{ m}\Omega$ ,  $\phi 0.5$  contact  $\leq 9\text{ m}\Omega$

Current and voltage:



Number of contacts	M14				
	Contact diameter(mm)	AWG. max	Rated current (A)	Rated voltage (V)	
				VDC	VAC
2	$\phi 1.25$	20	9	500	350
4	$\phi 0.9$	22	7	500	350
5	$\phi 0.9$	22	6	400	250
6	$\phi 0.7$	26	5	400	250
7	$\phi 0.7$	26	4	400	250
8	$\phi 0.7$	26	4	400	250
10	$\phi 0.5$	28	3	300	250
14	$\phi 0.5$	28	2	250	200



## Nomenclature

**S3** - **14** **PA** **N** - **M** **06** **P** - **G** **B** **52**  
 1        2        3        4        5        6        7        8        9        10

### 1. Series

S3, shell material is PC and insulator material is PA66

### 2. Mounting size

M14 mm

### 3. Connector model

PA-straight plug, with back nut

PB-straight plug, with back nut for fit with strain relief

RA-fixed receptacle with 2 nuts, front mount rear lock

RC-fixed receptacle with 2 nuts, front and rear mounting.

(New models can be developed upon request)

### 4. Keying code

M14, N, A

### 5. Insert type

M - multi-pole type

### 6. Number of contacts

M14: 2, 4, 5, 6, 7, 8, 10, 14

### 7. Contact style

P-pin contact; S-socket contact; B-PCB socket contact

### 8. Shell colour

G-grey, K-black

### 9. Colour identification (colour of plastic nut and back nut)

K-black, B-blue, G-grey, Y-yellow, T-brown, N-green R-red

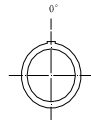
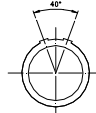
### 10. Maximum cable O.D.

Please specify cable outer diameter when ordering. "52" means up to 5.2mm cable. Please refer to page 3 "Accessories•collet" to see adaptable cable O.D. ranges. Receptacle does not have this digit.

## Materials

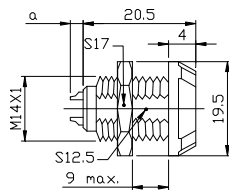
Part	Material	Remark
Insulator	PA66	-
Receptacle shell/front nut	PC	-
Plug shell/tail nut	PC	-
Pin contact	Brass	Gold plating
Socket contact	Bronze	Gold plating
Hex nut	Brass	Nickel plating

## Keying

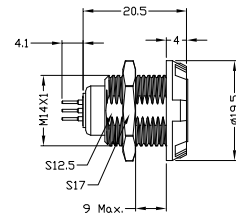
Code	N	A
Key angle		

## Connector Models (mm)

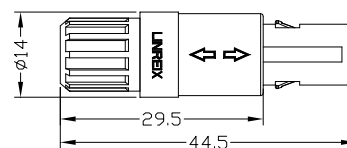
### RC receptacle (solder termination)



### RC receptacle (PCB termination)

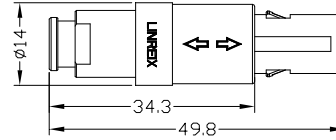


### PA plug



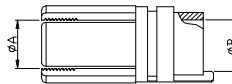


PB plug



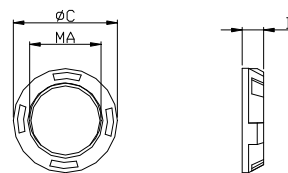
Accessories (mm)

Collet



Part Number	ΦA (mm)	ΦB (mm)	Cable O.D. (mm)	
			Min	Max
S3-14C-26	2.6	6.5	1.0	2.6
S3-14C-39	3.9	6.5	2.7	3.9
S3-14C-52	5.2	6.5	4.0	5.2
S3-14C-65	6.5	6.5	5.3	6.5

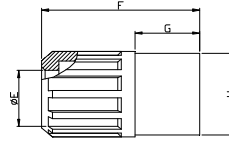
Plastic front nut



Part No.	MA(mm)	ΦC(mm)	D(mm)	Colour
S3-14FN-G	14	18.5	4.0	Grey
S3-14FN-K	14	18.5	4.0	Black
S3-14FN-R	14	18.5	4.0	Red
S3-14FN-N	14	18.5	4.0	Green
S3-14FN-B	14	18.5	4.0	Blue
S3-14FN-Y	14	18.5	4.0	Yellow
S3-14FN-T	14	18.5	4.0	Orange

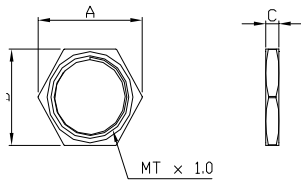


## Back nut



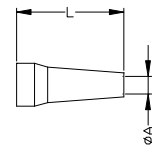
Part No.	ΦE (mm)	F (mm)	G (mm)	H (mm)	Color
S3-14BN-G	6.5	22.2	9.3	11.4	Grey
S3-14BN-K	6.5	22.2	9.3	11.4	Black
S3-14BN-R	6.5	22.2	9.3	11.4	Red
S3-14BN-N	6.5	22.2	9.3	11.4	Green
S3-14BN-B	6.5	22.2	9.3	11.4	Blue
S3-14BN-Y	6.5	22.2	9.3	11.4	Yellow
S3-14BN-T	6.5	22.2	9.3	11.4	Orange

## Metal hex nut



Part No.	A	B	MT	C
S3-14HN	19.4	17	14	2.5

## Strain relief

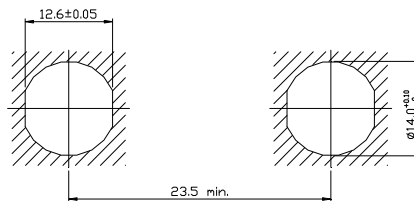


Item	L-12SR- $\phi$ 40	L-12SR- $\phi$ 50	L-12SR- $\phi$ 60
ØA	3.9	5.5	5.8
L	30	30	30
Cable O.D. max.	4.0	5.0	6.0
Cable O.D. min.	3.5	4.5	5.5

Note: “□” denotes a colour, K-black, B-blue, G-grey, Y-yellow, T-brown, N-green R-red

## Installation (mm)

### Panel cut-out



Hex nut torque=1.5N·m