XS3

CSM_XS3_DS_E_7_4

Small Round Water-resistive Connectors

- Water-resistive, compact connector meets IP67 requirements.
- Conventional M8 screw-on models are available along with S8 snap-in models that connect and disconnect with one touch.
- Ideal for a wide variety of FA and OA applications.
- Connectors on both cable ends require no harness work.
- Some new M8 models with 3 or 5 poles.
- Oil-resistant Polyurethane Robot Cables added.

Refer to *Safety Precautions* on page 23.



Ratings and Specifications

Item	Model	XS3F/H/W/P/M	XS3F-M52□-5□□-A XS3M-M524-1□	XS3R		
Rated current		1 ADC	3 ADC	1 ADC		
Rated voltage		125 VDC *2	30 VDC	125 VDC		
Contact resistant (connector)	ce	40 mΩ max. (20 mV max., 100 mA max.)		60 mΩ max. (20 mVDC max., 100 mA max.)		
Insulation resista	ince	1,000 MΩ min. (at 500 VDC)				
Dielectric strengt (connector)	h	1,000 VAC for 1 min (leakage current: 1 mA max.)	650 VAC for 1 min (leakage current: 1 mA max.)	1,000 VAC for 1 min (leakage current: 1 mA max.)		
Degree of protect	tion	IP67 (IEC60529)				
Insertion tolerand	ce	200 times				
Cable tensile stre	ength *1	49 N/15 s				
Ambient operatin temperature rang		–25 to 70°C *3	–25 to 70°C			
Ambient humidity	y range	20 to 85%RH				
*1 Models with cable	only					

1. Models with cable only

*2. Except 5poles

*3. Use the robot cable within a temperature range between 0°C and 70°C to prevent the wires inside the cable from being broken when bending it.

Materials and Finish

Connector

	Туре		M8			S8	
Item	Model	XS3F/H/W/R	XS3P/M *	XS3M-M524-1	XS3F/W (Socket side)	XS3H/W (Plug side)	XS3P
Contact block		PBT resin (UL94	V-0) light gray or b	lack			
Contacts		Phosphor bronze/ nickel base, 0.4- µm gold plating	Brass/nickel base 0.4-mm gold plati	,	Phosphor bronze/ nickel base, 0.4- µm gold plating	Brass/nickel base plating	e, 0.4-μm gold
Thread bracket		Brass/nickel plati	ng or SUS316L	—		Brass/nickel plating	—
Body		—	Brass/nickel plating	Nickel-plated zinc alloy	—		
Shell		—					TPEE
C-Ring		—		Phosphor bronze/tin plating	—		
Grounding fixt	ure	—		Phosphor bronze/tin plating	—		
Nut		—	Brass/nickel plati	ng	—		Brass/nickel plating
Cover		Soft PBT resin (UL94 V-0)	_		TPEE		_
O-ring		Rubber					

*Except 5poles

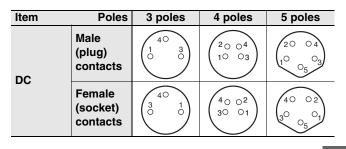
Note: The XS3M is for both M8 and S8.

Cables

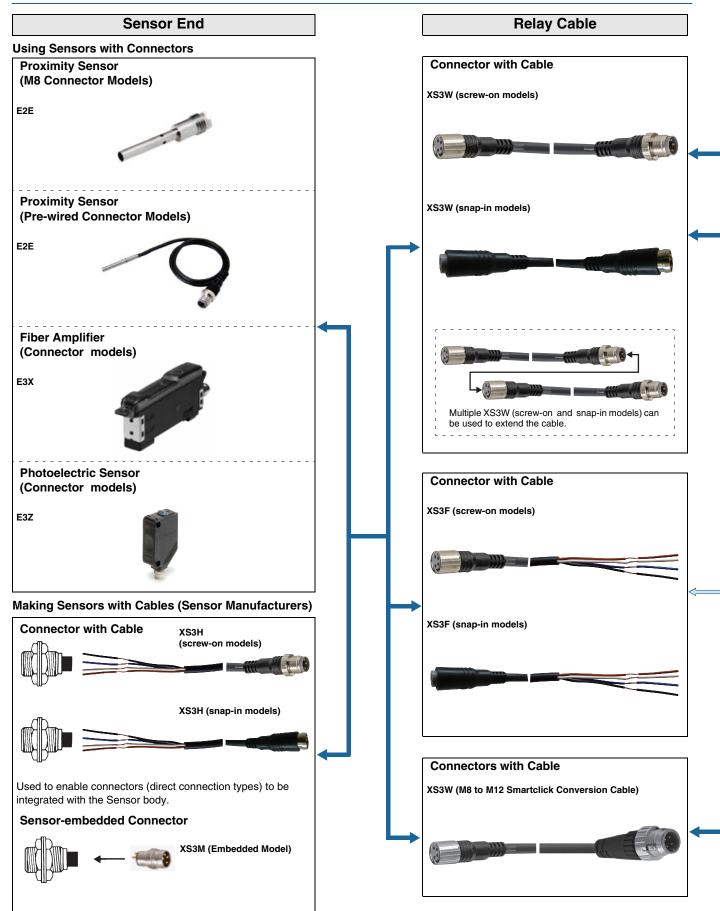
Item Pol	es	3 poles	4 poles	5 poles
Standard cable		4 mm dia, AWG24 (0.2 Structure: 0		4.7 mm dia, AWG24 (0.2 mm ²) Structure: 0.16 mm/11
Robot cab	le	4 mm dia, AWG24 (0.2 Structure: 0	2 mm²) .08 mm/40	_
Oil-resistan Polyurethar Robot cable	ne	-	4.7 mm dia, AWG22 (0.3 mm ²) Structure: 0.08 mm/60	_

Note: Only the XS3F (socket) is available with 5 pins.

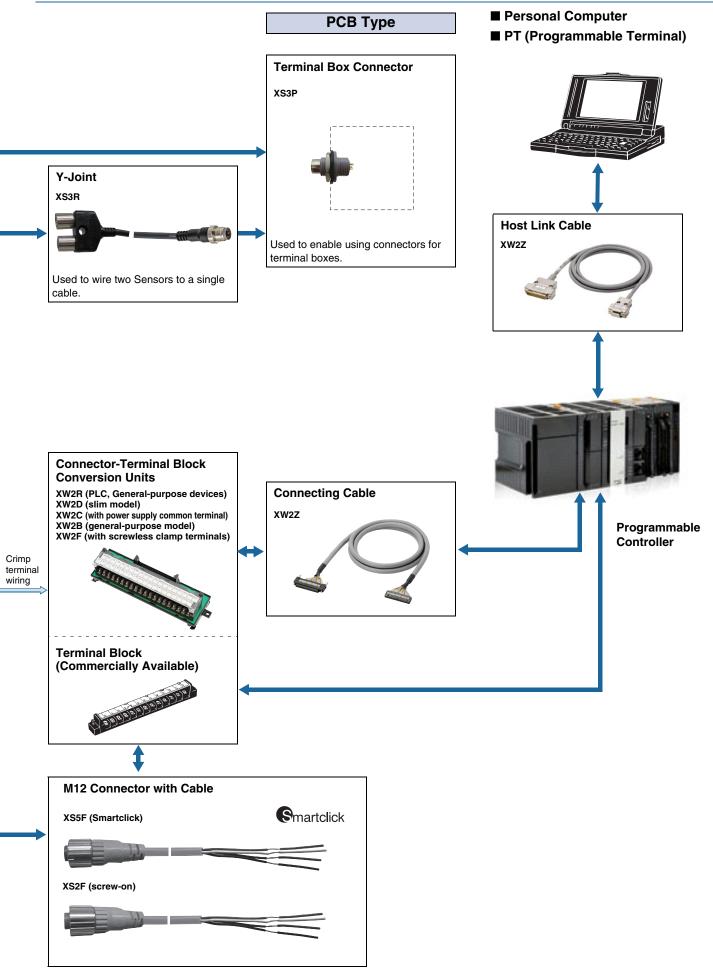
Pin Arrangement (Engaged Side)



Wiring System Configuration



(indicates mating connectors, and indicates wiring connections.)

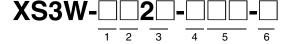


Refer to your OMRON website for details on M12 Connectors with Cables.

XS3W Connectors with Cables, Connectors on Both Ends (Socket/Plug)

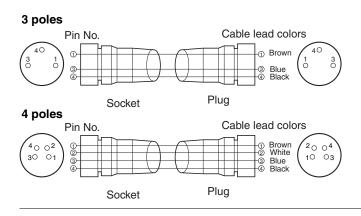
Model Number Legend

Use this model number legend to identify products from their model number. When ordering, use a model number from the table in *Ordering Information*.



1. Fastening Method	3. Cable Connection Direction	4. Connections	5. Cable Length
M: M8	1: Straight/	Pin No.	01: 1 m
S: S8	Straight 2: Right-angle/	① ③ ④ 3: Brown Blue Black	02: 2 m 05: 5 m
2. Connector Poles 3: 3 poles	Right-angle 3: Straight (socket)/ Right-angle (plug)	Pin No. ① ② ③ ④ 4: Brown White Blue Black	6. Cable Specifications
4: 4 poles	4: Right-angle (socket)/ Straight (plug)	4. DIOWIT WITTLE DILLE DIACK	R: Vibration-proof robot cable PR: Oil-resistant Polyurethane Robot cable

Wiring Diagram/Engaged Side



Mating Connectors

Item	Socket side	Plug side
XS3W (M8)	XS3M (M8/S8) XS3H (M8)	XS3F (M8) XS3W (M8) XS3P (M8)
XS3W (S8)	XS3M (M8/S8) XS3H (M8)	XS3F (S8) XS3W (S8) XS3P (S8)

Note 1. Cables can be extended with more than one XS3W.

2. M8 screw-on models and S8 snap-in models cannot be connected to each other.

Ordering Information

M8 Screw-on Connectors

Cable Specifications	No. of cable cores	Cable connection direction	Cable length L (m)	Model
		Straight/Straight	1	XS3W-M321-301-R
	3		2	XS3W-M321-302-R
			5	XS3W-M321-305-R
			1	XS3W-M421-401-R
		Straight/Straight	2	XS3W-M421-402-R
Vibration-proof			5	XS3W-M421-405-R
Robot cable		Dight angle/Dight angle	2	XS3W-M422-402-R
	4	Right-angle/Right-angle	5	XS3W-M422-405-R
		Straight (socket)/	2	XS3W-M423-402-R
		Right-angle (plug)	5	XS3W-M423-405-R
		Right-angle (socket)/	2	XS3W-M424-402-R
		Straight (plug)	5	XS3W-M424-405-R
			1	XS3W-M421-401-PR
		Straight/Straight	2	XS3W-M421-402-PR
			5	XS3W-M421-405-PR
		Right-angle/Right-angle	1	XS3W-M422-401-PR
O H			2	XS3W-M422-402-PR
Oil-resistant	Λ		5	XS3W-M422-405-PR
Polyurethane Robot cable	4		1	XS3W-M423-401-PR
		Straight (socket)/	2	XS3W-M423-402-PR
		Right-angle (plug)	5	XS3W-M423-405-PR
		Diskt engle (seeled) (1	XS3W-M424-401-PR
		Right-angle (socket)/ Straight (plug)	2	XS3W-M424-402-PR
		Straight (plug)	5	XS3W-M424-405-PR

S8 Snap-in Connectors

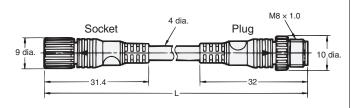
Cable Specifications	No. of cable cores	Cable connection direction	Cable length L (m)	Model
			1	XS3W-S421-401-R
		Straight/Straight	2	XS3W-S421-402-R
Vibration-proof Robot cable			5	XS3W-S421-405-R
		Dight angle/Dight angle	2	XS3W-S422-402-R
	4	Right-angle/Right-angle	5	XS3W-S422-405-R
		Straight (socket)/2Right-angle (plug)5	2	XS3W-S423-402-R
			5	XS3W-S423-405-R
		Right-angle (socket)/	2	XS3W-S424-402-R
		Straight (plug)	5	XS3W-S424-405-R

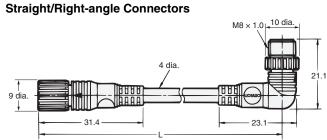
Dimensions

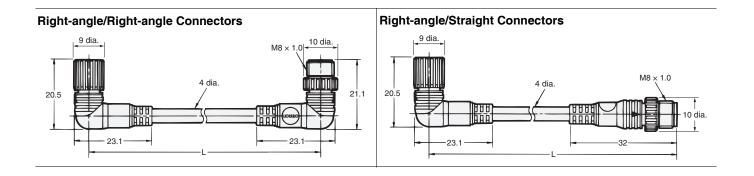
(Unit: mm)

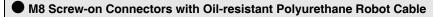
M8 Screw-on Connectors with Vibration-proof Robot Cable

Straight/Straight Connectors





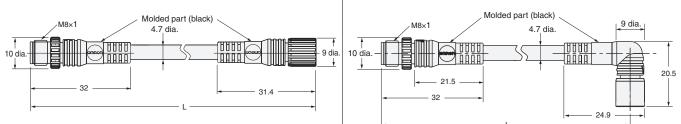




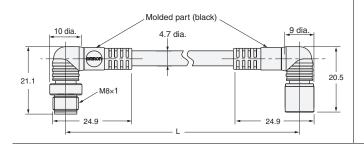
XS3W-M42 -4 -PR

Straight/Straight Connectors

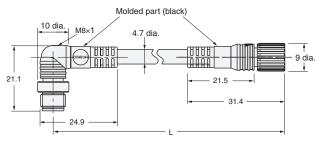
Straight/Right-angle Connectors



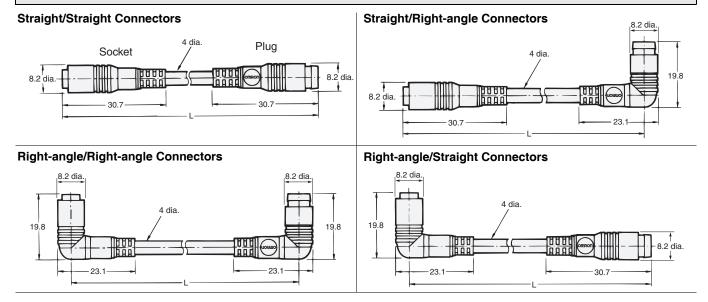
Right-angle/Right-angle Connectors



Right-angle/Straight Connectors



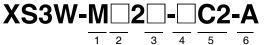
• S8 Snap-in Connectors with Vibration-proof Robot Cable XS3W-S42-4-R



XS3W Connectors with Cables, Connectors on Both Ends (M8 Socket/M12 Plug or M8 Plug/M12 Socket)

Model Number Legend

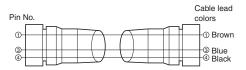
Use this model number legend to identify products from their model number. When ordering, use a model number from the table in *Ordering Information*.



M: M8C: M8 (screw-on) socket: Straight, M12 (Smartclick)Pin No.C2: 20 cmStraight, M12 (Smartclick)①③④plug: Straight3: Brown Blue Black6. Cable SpecifieD: M8 (screw-on) plug:Pin No.6. Cable Specifie	
plug: Straight 3: Brown Blue Black	
	cation
3: 3 polesStraight, M12 (Smartclick)1234: Standard ca4: 4 polessocket: Straight4: Brown White Blue Black	able

Wiring Diagram

3 poles







Ordering Information

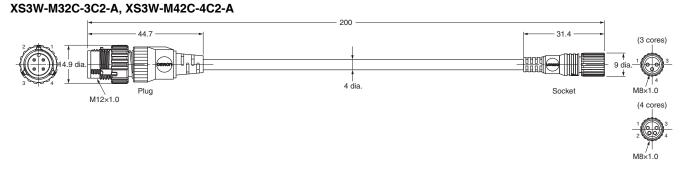
Cable Specifications	No. of cable cores	Connectors	Cable length L (m)	Model
	3	M8 socket/M12 plug		XS3W-M32C-3C2-A
Standard cable	3	M8 plug/M12 socket	0.2	XS3W-M32D-3C2-A
	Α	M8 socket/M12 plug	0.2	XS3W-M42C-4C2-A
	4	M8 plug/M12 socket		XS3W-M42D-4C2-A

Dimensions

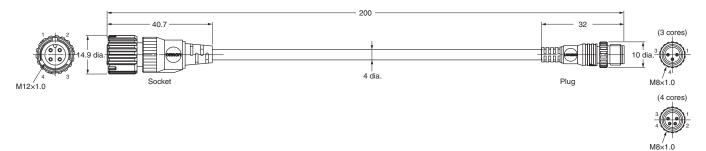
(Unit: mm)

Screw-on Connectors (M8 to M12)

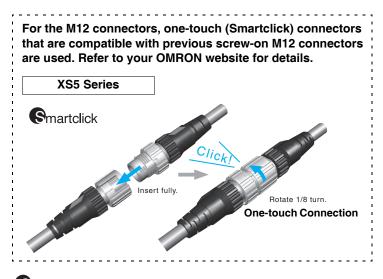
XS3W-M22-C2-A



XS3W-M32D-3C2-A, XS3W-M42D-4C2-A



Note: For 3-core, M12 connectors, pin 2 is not connected internally.

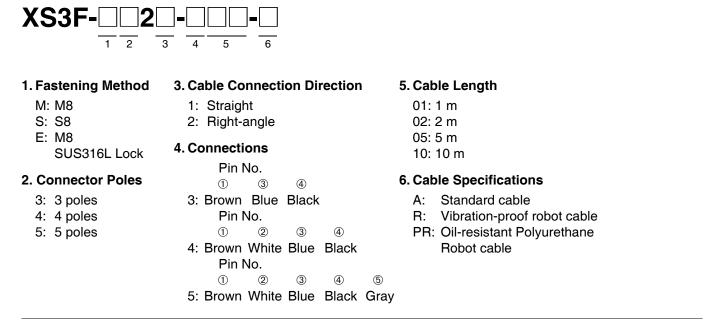


Smartclick is a registered trademark of the OMRON Corporation.

XS3F Sockets on One Cable End

Model Number Legend

Use this model number legend to identify products from their model number. When ordering, use a model number from the table in *Ordering Information*.



Mating Connectors

Item	Model
XS3F(M8)	XS3M (M8/S8), XS3H (M8), XS3W (M8)
XS3F(S8)	XS3M (M8/S8), XS3H (M8), XS3W (M8)
Note: M8 screw-o	n models and S8 snap-in models cannot be connected to each oth

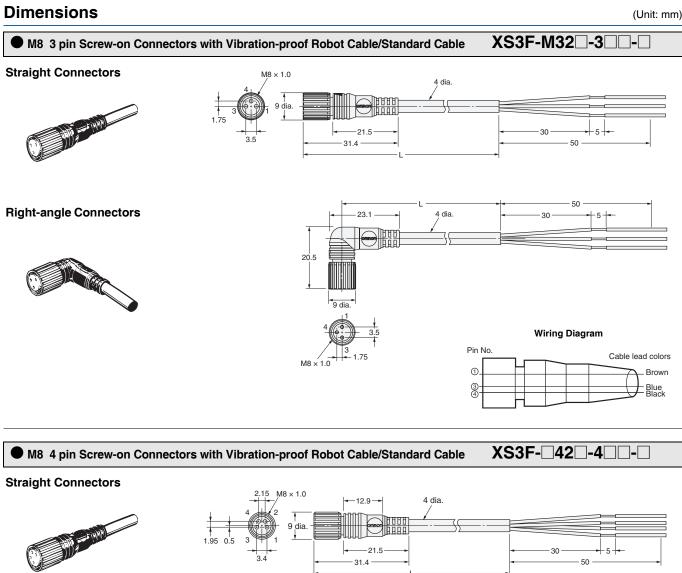
Ordering Information

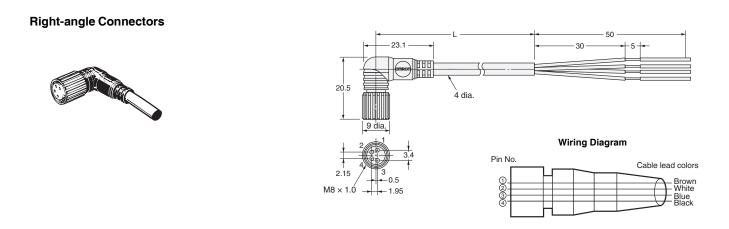
M8 Screw-on Connectors

Cable Specifications	No. of cable cores	Cable connection direction	Cable length L (m)	Model
		Ctraight	2	XS3F-M321-302-A
Standard cable		Straight	5	XS3F-M321-305-A
Standard cable		Dight angle	2	XS3F-M322-302-A
	0	Right-angle	5	XS3F-M322-305-A
	3	Straight	2	XS3F-M321-302-R
Vibration-proof robot		Straight	5	XS3F-M321-305-R
cable		Right-angle	2	XS3F-M322-302-R
		night-angle	5	XS3F-M322-305-R
		Straight	2	XS3F-M421-402-A
Standard cable		Straight	5	XS3F-M421-405-A
		Right-angle	2	XS3F-M422-402-A
		night-angle	5	XS3F-M422-405-A
Vibration-proof robot cable			1	XS3F-M421-401-R
		Straight	2	XS3F-M421-402-R
			5	XS3F-M421-405-R
			1	XS3F-M422-401-R
		Right-angle	2	XS3F-M422-402-R
	4		5	XS3F-M422-405-R
Standard SUS316L cable lock		Straight	2	XS3F-E421-402-A
		Ottalgitt	5	XS3F-E421-405-A
		Right-angle	2	XS3F-E422-402-A
		night-angle	5	XS3F-E422-405-A
		Straight	2	XS3F-M421-402-PR
Oil-resistant			5	XS3F-M421-405-PR
Polyurethane			1	XS3F-M422-401-PR
Robot cable		Right-angle	2	XS3F-M422-402-PR
			5	XS3F-M422-405-PR
			2	XS3F-M521-502-A
		Straight	5	XS3F-M521-505-A
Standard cable	F		10	XS3F-M521-510-A
Stanualu Gable	5		2	XS3F-M522-502-A
		Right-angle	5	XS3F-M522-505-A
			10	XS3F-M522-510-A

S8 Snap-in Connectors

Cable Specifications	No. of cable cores	Cable connection direction	Cable length L (m)	Model
			1	XS3F-S421-401-R
Vibration-proof robot cable		Straight	2	XS3F-S421-402-R
	4		5	XS3F-S421-405-R
	4		1 XS3F-S422-40	XS3F-S422-401-R
		Right-angle 2	2	XS3F-S422-402-R
			5	XS3F-S422-405-R





-21.5

- 31.4

30

- 5 -

50

1.95 0.5

3.4



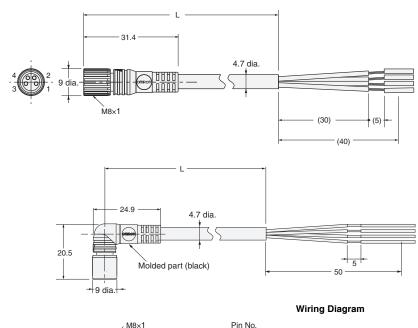
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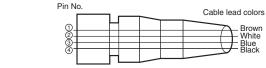
· 0.5 ·1.95

Straight Connectors



Right-angle Connectors

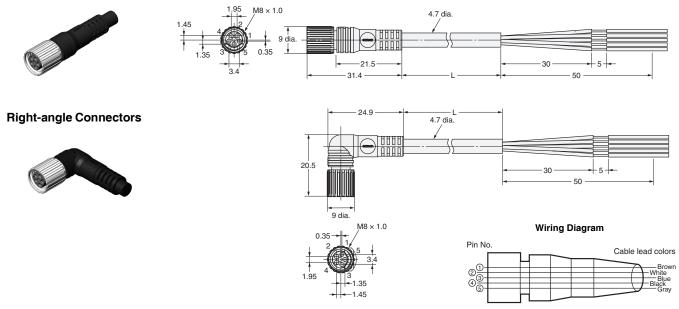


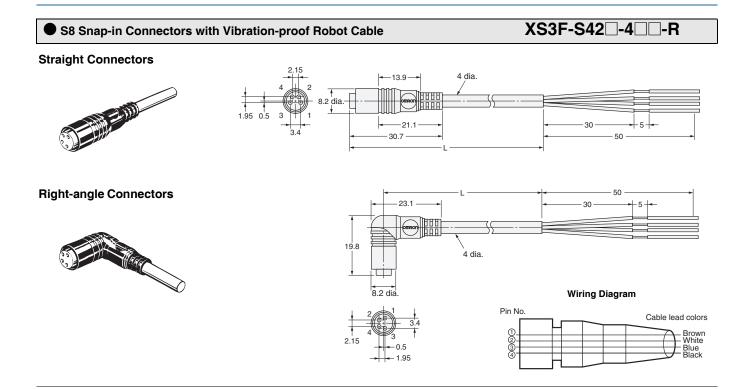


• M8 5 pin Screw-on Connectors with Standard Cable

XS3F-M52 -5 -A

Straight Connectors

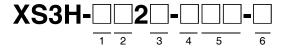




XS3H Plugs on One Cable End

Model Number Legend

Use this model number legend to identify products from their model number. When ordering, use a model number from the table in *Ordering Information*.



1. Fastening Method	3. Cable Connection Direction	5. Cable Length
M: M8	1: Straight	C3: 0.3 m
S: S8	2: Right-angle	01: 1 m
2. Connector Poles	4. Connections	02: 2 m 05: 5 m
3: 3 poles	Pin No.	C. Oshla Osasifiastiana
4: 4 poles	1 3 4	6. Cable Specifications
	3: Brown Blue Black	R: Vibration-proof robot cable
	Pin No.	PR: Oil-resistant Polyurethane
	1 2 3 4	Robot cable
	4: Brown White Blue Black	

Mating Connectors

Item	Model		
XS3H(M8)	XS3F (M8), XS3W (M8), XS3P (M8)		
XS3H(S8)	XS3F (S8), XS3W (S8), XS3P (S8)		
Note: M8 screw-on models and S8 snap-in models cannot be connected to each other.			

Ordering Information

M8 Screw-on Connectors

Cable Specifications	No. of cable cores	Cable connection direction	Cable length L (m)	Model
	0	0	0.3	XS3H-M321-3C3-R
	3	Straight	1	XS3H-M321-301-R
/ibration-proof		Straight	0.3	XS3H-M421-4C3-R
Robot cable	4	Straight	1	XS3H-M421-401-R
		Right-angle	0.3	XS3H-M422-4C3-R
			1	XS3H-M422-401-R
Oil-resistant Polyurethane Robot cable	4	Straight	2	XS3H-M421-402-PR
			5	XS3H-M421-405-PR
			1	XS3H-M422-401-PR
		Right-angle	2	XS3H-M422-402-PR
		-	5	XS3H-M422-405-PR

S8 Snap-in Connectors

Cable Specifications	No. of cable cores	Cable connection direction	Cable length L (m)	Model
Vibration-proof Robot cable	4	Straight	0.3	XS3H-S421-4C3-R
			1	XS3H-S421-401-R
		Right-angle	0.3	XS3H-S422-4C3-R
			1	XS3H-S422-401-R

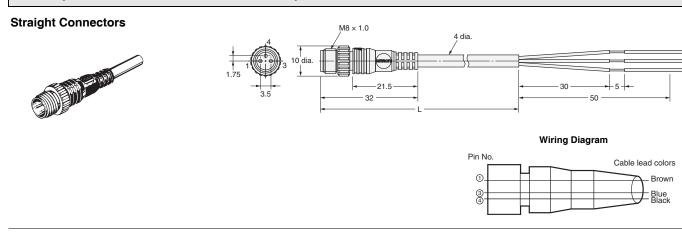
XS3

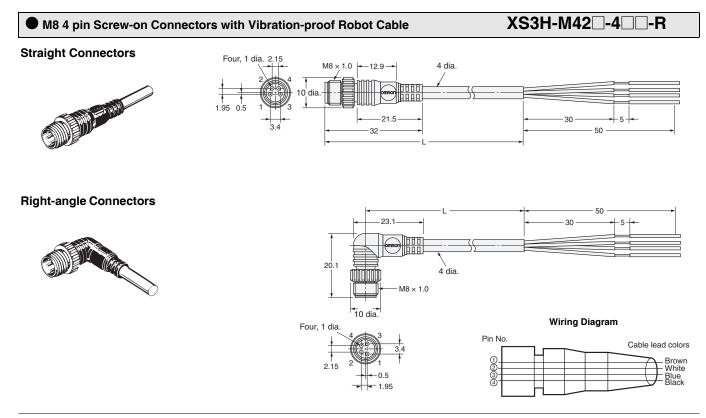
Dimensions

(Unit: mm)

M8 3 pin Screw-on Connectors with Vibration-proof Robot Cable



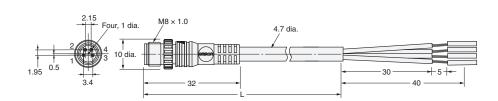




M8 4 pin Screw-on Connectors with Oil-resistant Polyurethane Robot Cable XS3H-M42-40-PR

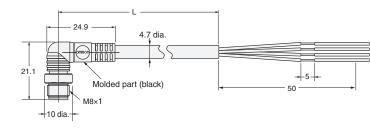
Straight Connectors





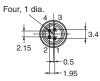
Right-angle Connectors





Pin No

10000

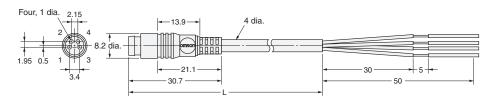


Wiring Diagram Cable lead colors Brown White Black

S8 4 pin Snap-in Connectors with Vibration-proof Robot Cable

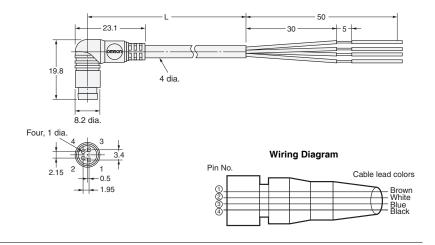
Straight Connectors





Right-angle Connectors





XS3P Panel-mounting Sockets for Terminal Boxes

Mating Connectors

Item	Model
XS3P(M8)	XS3H (M8), XS3W (M8)
XS3P(S8)	XS3H (S8), XS3W (S8)
Noto: M9 paraw on ma	dala and 69 anan in madala aannat ha aa

Note: M8 screw-on models and S8 snap-in models cannot be connected to each other.

Ordering Information

Connection method	Panel mounting	Pin shape	Applicable wires	Model	Minimum order
M8 screw-on	Front lock or rear lock	DIP pins		XS3P-M421-1	
		Solder cup pins	AWG24 max.	XS3P-M421-2	
	Rear lock	Solder cup pins	AWG24 max.	XS3P-M422-2	50
S8 snap-in	Front lock or rear lock	DIP pins		XS3P-S421-1	
		Solder cup pins	AWG24 max.	XS3P-S421-2	

Note: Orders are accepted in multiples of the minimum order.

Safety Precautions

In addition to the following information, also refer to Safety Precautions on page 23

Precautions for Correct Use

Panel Mounting

• When mounting XS3P Panel-mounting Connectors to panels, refer to *Panel-mounting Dimensions* and provide rubber bushings and nuts for the Connectors. Apply a tightening torque of between 0.4 and 0.6 N·m to mount the Connectors.

Dimensions

XS3P-M421-1 (DIP Pins)

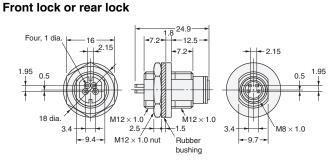
(Unit: mm)



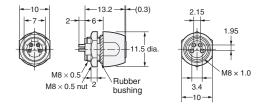
- M8 Screw-on Sockets with Solder Cup Pins
- M8 Screw-on Sockets with Solder Cup Pins

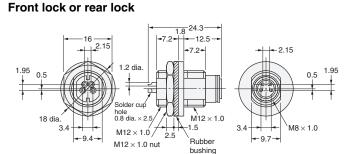
XS3P-M421-2 XS3P-M422-2 XS3P-M421-2 (Solder Cup Pins)

XS3P-M421-1

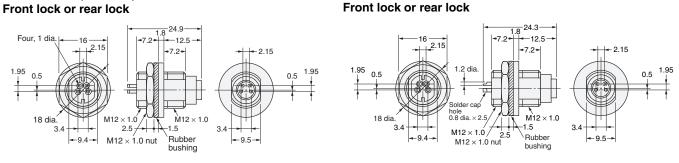


XS3P-M422-2 (Solder Cup Pins), Rear Lock Slim Models



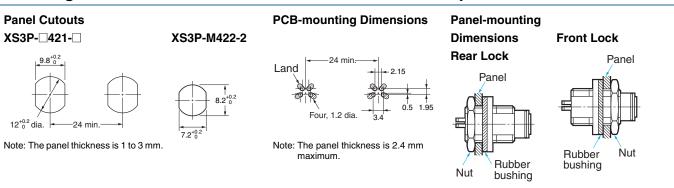


S8 Snap-in Sockets with DIP Pins S8 Snap-in Sockets with Solder Cup Pins XS3P-S421-1 XS3P-S421-1 (DIP Pins) XS3P-S421-2 (Solder Cup Pins)



Mounting Dimensions for XS3P Screw-on Models and Snap-in Models

(Unit: mm)



XS3M Sensor Embedded Plugs

Mating Connectors

Item	Model
XS3M	XS3F (M8/S8), XS3W (M8/S8)

Note: The plug can be connected to both M8 screw-on and S8 snap-in models.

Ordering Information

Embedded Model with DIP Pins

Connection method	Pin shape	Applicable wires	Model	Minimum order	
Embedded model	DIP pins		XS3M-K421-1	200	
	Solder cup pins	AWG26 max.	XS3M-K421-2	200	

Note: Orders are accepted in multiples of the minimum order.

Dimensions

XS3M-K421-1

(Unit: mm)

Embedded Plugs with Screw Threads and DIP Pins Embedded Plugs with Screw Threads and Solder Cup Pins

1 dia

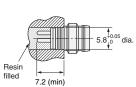
5.6 dia.

3.6

Four, 1 dia

6.5 dia. 5.8±0.2 d

XS3M-K421-1 XS3M-K421-2



Mounting Dimensions

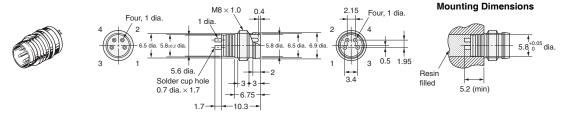
2.15 Four, 1 dia.

4

0.5 1.95

XS3M-K421-2

Embedded Model with Solder Cup Pins



-6.75

-10.3

6.5 dia. 6.9 d

XS3

XS3M Panel-mounting Plugs

Mating Connectors

Item	Model	
XS3M-M524-1	XS3F-M52 -5 -A	

Ordering Information

Lock method	Pin shape	Shield pin	Applicable wires	Model
Front lock		No	- AWG26 max.	XS3M-M524-10
		Yes		XS3M-M524-11

Note: Orders are accepted in multiples of the minimum order.

Dimensions

(Unit: mm)

Front lock DIP pins (5 pins)

XS3M-M524-

XS3M-M524-10

Front Lock with DIP Pins 4.5 mm (for Either Round Holes or Solder Cups), Without Shield Pin

O-ring on panel side

 $M8 \times 1.0$

1.95

SW

SW10

1.45

0.35

1.35

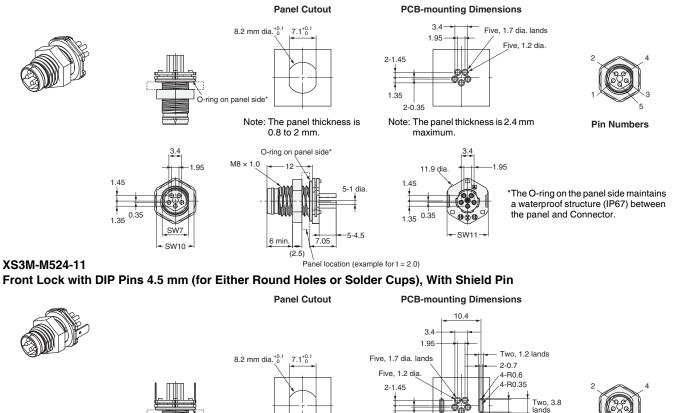
Note: The panel thickness is

0.8 to 2 mm.

O-ring on panel side

6 min

(2.5)



1.35

2-0.35

1 45

1.35

2-2.6

5-1 dia

2 - 4.5

Panel location (example for t = 2.0)

7.05

maximum.

11.9 d

0.35

the panel and Connector.

*The O-ring on the panel side maintains

a waterproof structure (IP67) between

Two, 3.3

1.95

Note: The panel thickness is 2.4 mm

10.4

3.4

SW1

Pin Numbers

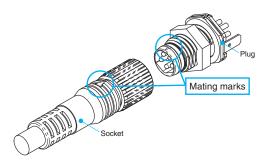
Safety Precautions

In addition to the following information, also refer to Safety Precautions on page 23

Precautions for Correct Use

XS3M-M524-DD Mating

To mate the Connectors, align the mating marks on the Plug and Socket (see following figure), insert the Connectors completely, and tighten the lock nut, being careful not to damage the threads.



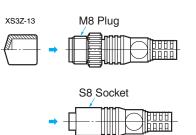
XS3M-M524-DD Panel Mounting

After you mount the Connector to the panel, attach the nut and tighten it to a suitable torque (0.4 N·m).

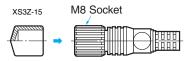
XS3 M8/S8 Connector Cover

Dust Cover

XS3Z-13







The Dust Cover is for dust prevention and does not ensure IP67. When mounting the Dust Cover to a Connector, be sure to press the Dust Cover onto the Connector until the Connector is fully inserted into the Dust Cover.

S8 Plug	

Model	Material	Suitable connector		
		Model	Mounting portion	
	PVC resin/red	XS3H/XS3W/XS3R	M8 plug	
XS3Z-13		XS3F/XS3W	S8 socket	
X332-13		XS3H/XS3W	S8 plug	
		XS3M	M8/S8 plug	
XS3Z-15		XS3F/XS3W/XS3R	M8 socket	

XS3R Y-Joint Plug/Socket Connectors

Mating Connectors

Item	Model
XS3R(M8)	XS3F(M8)
	XS3H(M8)
	XS3W(M8)
	XS3P(M8)

Ordering Information

For M8 Connectors

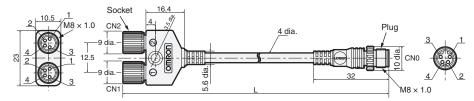
Cable	Connector	Cable length L (m)	Model	Minimum order
With Connectors on both cable Connector on one cable end Connector on one	Connectors on both	0.5	XS3R-M426-1C51-A	
		1	XS3R-M426-1011-A	
	2	XS3R-M426-1021-A	-	
		3	XS3R-M426-1031-A	5
		2	XS3R-M426-1020-A	
		5	XS3R-M426-1050-A	
Without cable	Connectors on both cable ends		XS3R-M426-1	10
			XS3R-M426-5	10

Dimensions

• Screw-on Models (M8)	With Standard Cable:	XS3R-M426-1
	Without Cable:	XS3R-M426-⊡

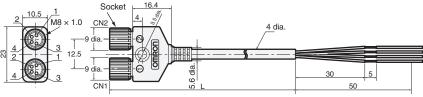
XS3R-M426-1 1-A

Connectors on Both Cable Ends (Y-Joint Plug/Socket)



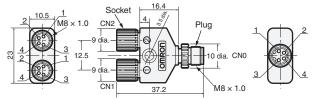
XS3R-

M426-1□□0-A

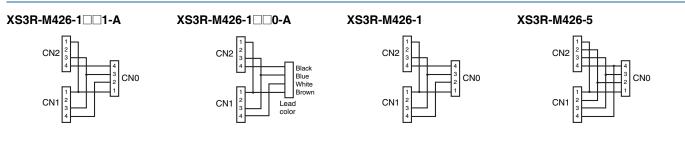


XS3R-M426-

Connector on Both Ends (Y-Joint Plug/Socket) without Cable



Wiring Diagram



(Unit: mm)

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Precautions for Correct Use

Do not use the product in atmospheres or environments that exceed product ratings.

Connections

- The XS3 and XS2 Sensor I/O Connectors cannot be connected to each other.
- You cannot mate Connectors that have a different number of poles.
- When using Sensors with Connectors or Limit Switches, use the Sensor I/O Connectors specified in the catalog.
- Do not connect M8 screw-on models and S8 snap-in models together, otherwise the proper degree of protection of the Connectors will not be maintained.

Connector Connection and Disconnection

- Before connecting or disconnecting Connectors, make sure that no power is being supplied to the Connectors.
- When connecting or disconnecting Connectors, be sure to hold the Connectors by hand. Do not disconnect the Connectors by pulling the cable.
- Do not touch the engagement side of any Connector with wet hands. If there is any water on the Connector or near the Connector, be sure to wipe off the water before connecting or disconnecting the Connector, otherwise the Connector may short-circuit internally or not ensure good insulation.
- Make sure that engagement side of any Connector is free of metal dust or power.
- Do not use pliers to tighten mounting the thread bracket, otherwise the thread bracket may be damaged. Be sure to tighten each thread bracket by hand within a torque of 0.2 N·m. If the thread bracket is not tightened securely, the Connector may not maintain its proper degree of protection or the thread bracket may fall off due to vibration.
- When you tighten or loosen a lock nut, hold onto only the lock nut.
- If you hold onto the cover or cable, excessive rotational force will be applied to the Connector and may damage it.
- Fully insert S8 snap-in models until the Connectors are hidden by the metal casing of the opposite parts, otherwise the Connectors will not maintain their proper degree of protection or the thread brackets may become loose due to vibration.

Degree of Protection

- Do not impose external force continuously on the joints of pin blocks and covers, otherwise the Connectors may not keep its proper degree of protection (i.e., IP67).
- Connectors are not fully watertight. Do not use them underwater.
- The Connectors are not oil-resistant. Do not use them where they would be subject to oil.
- If Connectors are used in places with vibration or shock, secure the engaged side of each Connector, otherwise the Connectors may be disconnected or fail to maintain their proper degree of protection.
- Connectors are of resin mold construction. Do not impose excessive force on them.

Storage

Do not store Connectors for long periods of time in the following locations

- · Locations subject to dust or high humidity
- · Locations subject to ammonia gas or sulfide gas

Installation

- Do not make any cable bends near the base of the Unit.
- Any bends made must have a minimum radius of 36 mm.

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