

Circular sensor connectors



M16 cables & connectors

The M16 Series is an ideal choice for intensive industrial and commercial applications. Over-molded cable, assembly type and panel-mount receptacles are available in various styles and mounting methods. Quick-locking wiring assembly type is also available.

- Degree of protection IP65/IP67
- 2~9, 14, 19 poles are available
- TPU over molded or TPU plastic body
- Cable length customized, PUR and PVC cable options
- Anti-vibration locking screw design

M16

Quick Search Table

Locking type	Fix screw																								Quick-lock			
Rated Current	7A(40℃)				6A(40℃)				6A(40℃)				5A(40℃)				5A(40℃)				3A(40℃)				4A			
Voltage	250V(A/C), 32V(D/C)				250V(A/C), 32V(D/C)				60V(A/C), 32V(D/C)				250V(A/C), 32V(D/C)				125V(A/C), 32V(D/C)				60V(A/C), 32V(D/C)				250V(A/C), 300V(D/C)			
Wire Gauge / size	18AWG / 0.75mm ²				18AWG / 0.75mm ²				18AWG / 0.75mm ²				18AWG / 0.75mm ²				18AWG / 0.75mm ²				Max.24AWG / Max.0.25mm ²				22AWG / 0.34mm ²			
Pin layout																												

M16 cables & connectors

02 Pins	03 Pins	04 Pins	05 Pins-a	05 Pins-b	06 Pins	07 Pins-a	07 Pins-b	08 Pins	14 Pins	19 Pins	08 Pins	09 Pins
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Molded Cable

	Male Molded Cable Straight	293	-	293	-	293	-	293	-	293	-	293	-	293	-	293	-	293	-	293	-	293	-	-	-	-	-
	Female Molded Cable Straight	-	294	-	294	-	294	-	294	-	294	-	294	-	294	-	294	-	294	-	294	-	294	-	-	-	-
	Male Molded Cable Angled	295	-	295	-	295	-	295	-	295	-	295	-	295	-	295	-	295	-	295	-	295	-	-	-	-	-
	Female Molded Cable Angled	-	296	-	296	-	296	-	296	-	296	-	296	-	296	-	296	-	296	-	296	-	296	-	-	-	-

Assembly Type

	Male Field Wirable Assembly Straight Solder	297	-	297	-	297	-	297	-	297	-	297	-	297	-	297	-	297	-	297	-	297	-	-	-	-	-
	Female Field Wirable Assembly Straight Solder	-	298	-	298	-	298	-	298	-	298	-	298	-	298	-	298	-	298	-	298	-	298	-	-	-	-

Panel Mount Type

	Male Panel Mount Die-cast Screw Solder Front fastened	299	-	299	-	299	-	299	-	299	-	299	-	299	-	299	-	299	-	299	-	299	-	-	-	-	-
	Male Panel Mount Die-cast Screw Solder Rear fastened	301	-	301	-	301	-	301	-	301	-	301	-	301	-	301	-	301	-	301	-	301	-	-	-	-	-
	Female Panel Mount Die-cast Screw Solder Front fastened	-	300	-	300	-	300	-	300	-	300	-	300	-	300	-	300	-	300	-	300	-	300	-	-	-	-
	Female Panel Mount Die-cast Screw Solder Rear fastened	-	302	-	302	-	302	-	302	-	302	-	302	-	302	-	302	-	302	-	302	-	302	-	-	-	-

Molded Cable

	Male Molded Cable Straight Quick-lock Type	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	303	-	303	-
	Female Molded Cable Straight Quick-lock Type	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	304	-	304
	Female Molded Cable Straight Quick-lock Type with Fix-Cap	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	305	-	305

Assembly Type

	Male Field Wirable Assembly Straight Quick-lock Type Solder	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	306	-	306	-
	Female Field Wirable Assembly Straight Quick-lock Type Solder	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	307	-	307
	Female Field Wirable Assembly Straight Solder with Fix-cap	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	308	-	308

Panel Mount Type

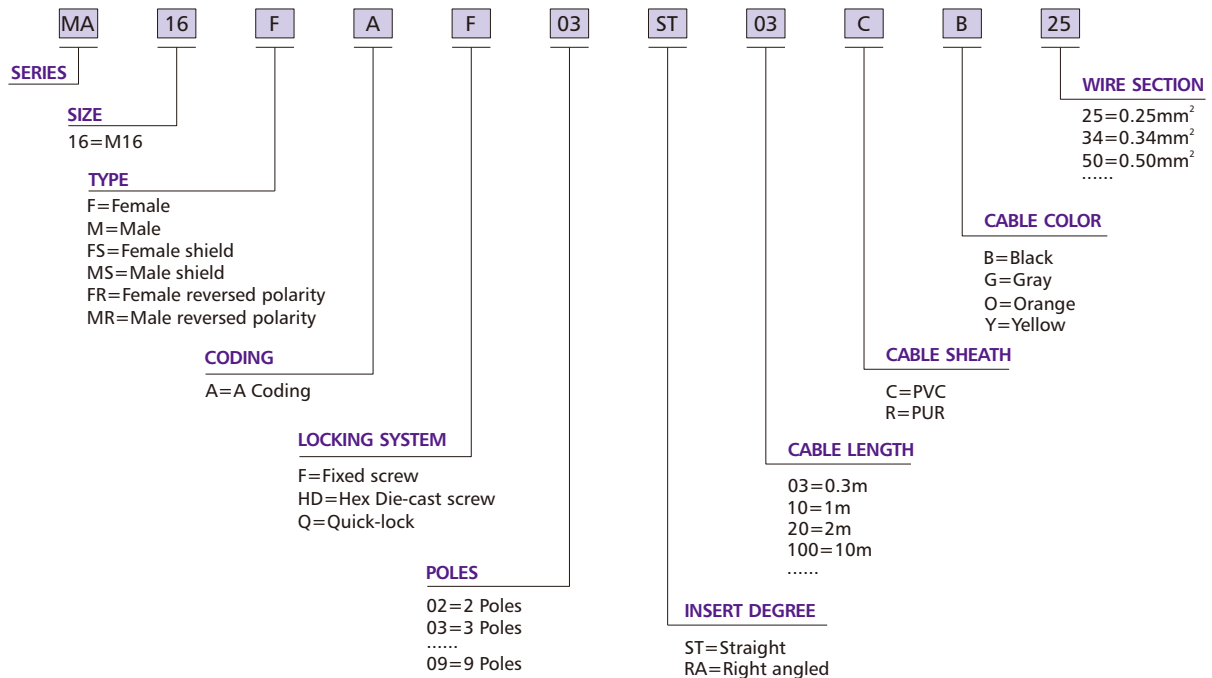
	Male Panel Mount Quick-lock Type Solder Front fastened	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	309	-	309	-
	Female Panel Mount Quick-lock Type Solder Front fastened	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	310	-	310
	Male Panel Mount Quick-lock Typ PCB Front fastened	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	311	-	311	-
	Female Panel Mount Quick-lock Typ PCB Front fastened	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	312	-	312

Protection Cap

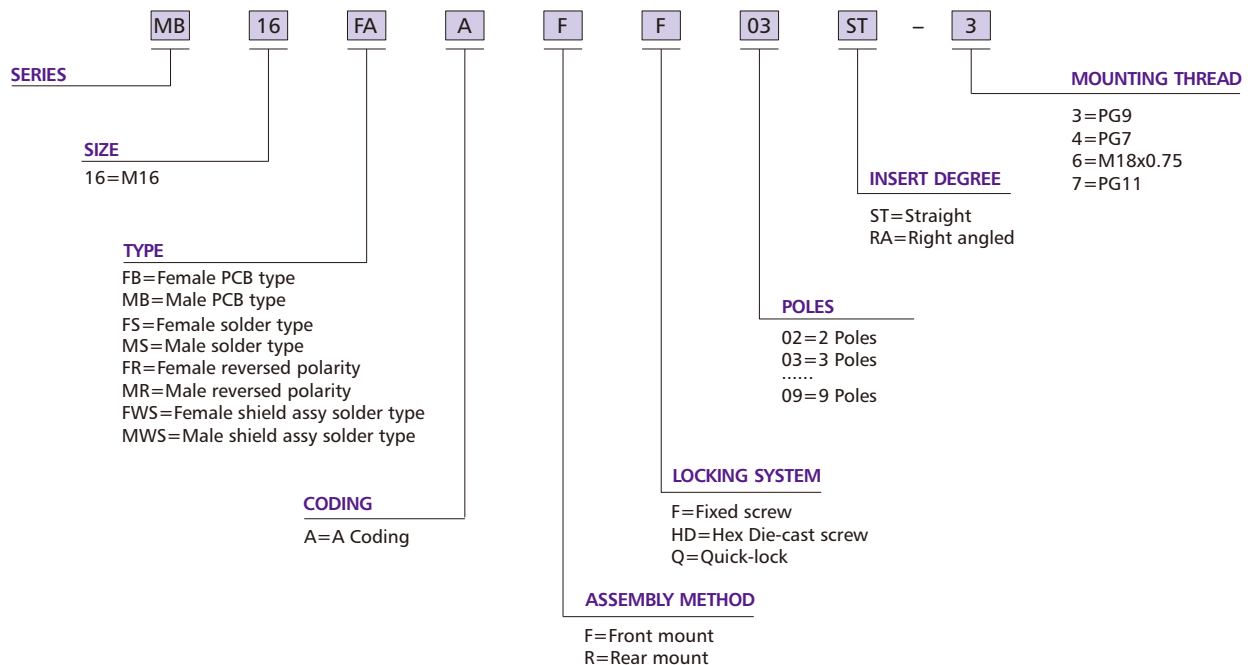
	Protection Cap for Male With Fix-Cap Cable Connector	313-1																									
	Protection Cap for Female Molded Cable Connector																										
	Protection Cap for Male/Female Panel mount Connector	314-1																									

How to Order Part Number

■ M16 Series with cable molded



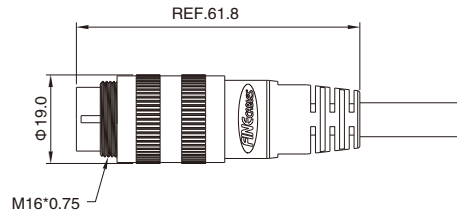
■ M16 Series Assembly / Panel-mount type



M16 Male Molded Cable, Straight

- Connector series: M16
- Gender: Male
- Locking type: Fix screw
- Mounting type: Straight
- Part No.: MA16MAF**STXXXXXX

** refers to pins number
X refers to cable specification



RoHS

General information

Standard:	IEC 61076-2-106
Ambient temperature:	-40℃ ~ +70℃(fixed installation) -25℃ ~ +70℃(flexible installation)
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector overmold:	TPU

Coupling screw:	Zinc alloy with nickel plated
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Available/Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
			A/C	D/C	AWG	mm ²		
02 pins		7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF02STXXXB75 MA16M\$AF02STXXXB75
03 pins		7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF03STXXXB75 MA16M\$AF03STXXXB75
04 pins		6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF04STXXXB75 MA16M\$AF04STXXXB75
05 pins-a		6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF05ASTXXXB75 MA16M\$AF05ASTXXXB75
05 pins-b		6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16MAF05BSTXXXB75 MA16M\$AF05BSTXXXB75
06 pins		5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF06STXXXB75 MA16M\$AF06STXXXB75
07 pins-a		5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MA16MAF07ASTXXXB75 MA16M\$AF07ASTXXXB75
07 pins-b		5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16MAF07BSTXXXB75 MA16M\$AF07BSTXXXB75
08 pins		5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16MAF08STXXXB75 MA16M\$AF08STXXXB75
14 pins		3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MA16MAF14STXXXXXX MA16M\$AF14STXXXXXX
19 pins		3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MA16MAF19STXXXXXX MA16M\$AF19STXXXXXX

Remarks

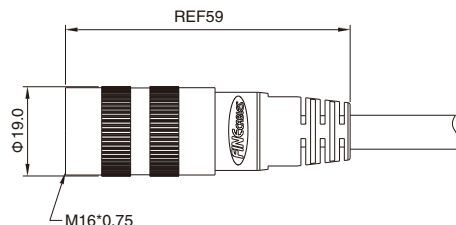
Note: X refers to cable specification, \$: Shielded

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Molded Cable, Straight

- Connector series: M16
- Gender: Female
- Locking type: Fix screw
- Mounting type: Straight
- Part No.: MA16FAF**STXXXXXX

** refers to pins number
X refers to cable specification



General information



Standard:	IEC 61076-2-106
Ambient temperature:	-40℃ ~ +70℃(fixed installation) -25℃ ~ +70℃(flexible installation)
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector overmold:	TPU

Seal/ O-ring:	Zinc alloy with nickel plated
Coupling screw:	NBR/FKM
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Available/Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
			A/C	D/C	AWG	mm ²		
02 pins		7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF02STXXXB75 MA16FSAF02STXXXB75
03 pins		7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF03STXXXB75 MA16FSAF03STXXXB75
04 pins		6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF04STXXXB75 MA16FSAF04STXXXB75
05 pins-a		6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF05ASTXXXB75 MA16FSAF05ASTXXXB75
05 pins-b		6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16FAF05BSTXXXB75 MA16FSAF05BSTXXXB75
06 pins		5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF06STXXXB75 MA16FSAF06STXXXB75
07 pins-a		5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MA16FAF07ASTXXXB75 MA16FSAF07ASTXXXB75
07 pins-b		5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16FAF07BSTXXXB75 MA16FSAF07BSTXXXB75
08 pins		5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16FAF08STXXXB75 MA16FSAF08STXXXB75
14 pins		3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MA16FAF14STXXXXXX MA16FSAF14STXXXXXX
19 pins		3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MA16FAF19STXXXXXX MA16FSAF19STXXXXXX

Remarks

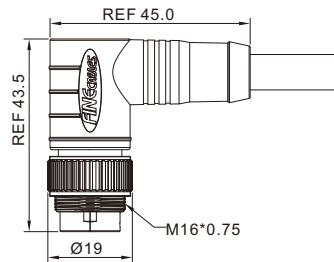
Note: X refers to cable specification, S : Shielded

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Male Molded Cable, Angled

- Connector series: M16
- Gender: Male
- Locking type: Fix screw
- Mounting type: Right angled
- Part No.: MA16MAF**RAXXXXXX

** refers to pins number
X refers to cable specification



RoHS

General information

Standard:	IEC 61076-2-106
Ambient temperature:	-40℃ ~ +70℃(fixed installation) -25℃ ~ +70℃(flexible installation)
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector overmold:	TPU

Coupling screw:	Zinc alloy with nickel plated
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Available/Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
			A/C	D/C	AWG	mm ²		
02 pins		7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF02RAXXXB75 MA16M\$AF02RAXXXB75
03 pins		7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF03RAXXXB75 MA16M\$AF03RAXXXB75
04 pins		6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF04RAXXXB75 MA16M\$AF04RAXXXB75
05 pins-a		6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF05ARAXXXB75 MA16M\$AF05ARAXXXB75
05 pins-b		6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16MAF05BRAXXXB75 MA16M\$AF05BRAXXXB75
06 pins		5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16MAF06RAXXXB75 MA16M\$AF06RAXXXB75
07 pins-a		5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MA16MAF07ARAXXXB75 MA16M\$AF07ARAXXXB75
07 pins-b		5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16MAF07BRAXXXB75 MA16M\$AF07BRAXXXB75
08 pins		5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16MAF08RAXXXB75 MA16M\$AF08RAXXXB75
14 pins		3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MA16MAF14RAXXXXXX MA16M\$AF14RAXXXXXX
19 pins		3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MA16MAF19RAXXXXXX MA16M\$AF19RAXXXXXX

Remarks

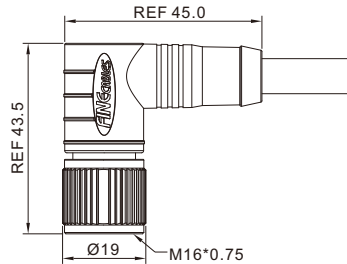
Note: X refers to cable specification, \$: Shielded

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Molded Cable, Angled

- Connector series: M16
- Gender: Female
- Locking type: Fix screw
- Mounting type: Right angled
- Part No.: MA16FAF**RAXXXXXX

** refers to pins number
X refers to cable specification



RoHS

General information

Standard:	IEC 61076-2-106
Ambient temperature:	-40℃ ~ +70℃(fixed installation) -25℃ ~ +70℃(flexible installation)
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector overmold:	TPU

Seal/ O-ring:	Zinc alloy with nickel plated
Coupling screw:	NBR/FKM
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Available/Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
			A/C	D/C	AWG	mm ²		
02 pins		7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF02RAXXXB75 MA16FSAF02RAXXXB75
03 pins		7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF03RAXXXB75 MA16FSAF03RAXXXB75
04 pins		6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF04RAXXXB75 MA16FSAF04RAXXXB75
05 pins-a		6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF05ARAXXXB75 MA16FSAF05ARAXXXB75
05 pins-b		6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16FAF05BRAXXXB75 MA16FSAF05BRAXXXB75
06 pins		5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MA16FAF06RAXXXB75 MA16FSAF06RAXXXB75
07 pins-a		5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MA16FAF07ARAXXXB75 MA16FSAF07ARAXXXB75
07 pins-b		5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16FAF07BRAXXXB75 MA16FSAF07BRAXXXB75
08 pins		5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MA16FAF08RAXXXB75 MA16FSAF08RAXXXB75
14 pins		3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MA16FAF14RAXXXXXX MA16FSAF14RAXXXXXX
19 pins		3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MA16FAF19RAXXXXXX MA16FSAF19RAXXXXXX

Remarks

Note: X refers to cable specification, S : Shielded

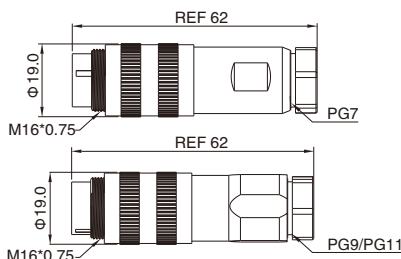
- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Male Field Wirable Assembly, Straight, Solder

- Connector series: M16
- Gender: Male
- Locking type: Fix screw
- Mounting type: Straight
- Part No.: MB16MWSAFF**ST-X

** refers to pins number

X Suitable cable Dia: 3=PG9, 4=PG7,
7=PG11



RoHS

General information

Standard:	IEC 61076-2-106
Ambient temperature:	-25℃ ~ +70℃
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector screw/body:	Zinc alloy with nickel plated
Coupling screw:	PA+GF

Seal/ O-ring:	NBR/FKM
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Available
Suitable cable Dia:	PG7:4~6; PG9:6~8; PG11:8~10mm
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
				A/C	D/C	AWG	mm ²		
02 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MWSAFF02ST-X
03 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MWSAFF03ST-X
04 pins		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MWSAFF04ST-X
05 pins-a		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MWSAFF05ST-X
05 pins-b		Solder version	6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16MWSAFF05ST-X
06 pins		Solder version	5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MWSAFF06ST-X
07 pins-a		Solder version	5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MB16MWSAFF07AST-X
07 pins-b		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16MWSAFF07BST-X
08 pins		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16MWSAFF08ST-X
14 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16MWSAFF14ST-X
19 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16MWSAFF19ST-X

Remarks

Note: X Suitable cable Dia: 3=PG9, 4=PG7, 7=PG11

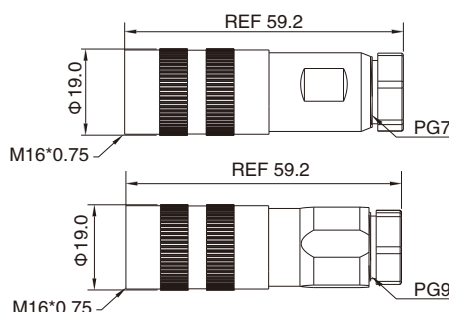
- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Field Wirable Assembly, Straight, Solder

- Connector series: M16
- Gender: Female
- Locking type: Fix screw
- Mounting type: Straight
- Part No.: MB16FWSAFF**ST-X

** refers to pins number

X Suitable cable Dia: 3=PG9, 4=PG7,
7=PG11



RoHS

General information

Standard:	IEC 61076-2-106
Ambient temperature:	-25℃ ~ +70℃
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector screw/body:	Zinc alloy with nickel plated
Coupling screw:	PA+GF

Seal/ O-ring:	NBR/FKM
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Available
Suitable cable Dia:	PG7:4~6; PG9:6~8; PG11:8~10mm
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
				A/C	D/C	AWG	mm ²		
02 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FWSAFF02ST-X
03 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FWSAFF03ST-X
04 pins		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FWSAFF04ST-X
05 pins-a		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FWSAFF05AST-X
05 pins-b		Solder version	6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16FWSAFF05BST-X
06 pins		Solder version	5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FWSAFF06ST-X
07 pins-a		Solder version	5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MB16FWSAFF07AST-X
07 pins-b		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16FWSAFF07BST-X
08 pins		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16FWSAFF08ST-X
14 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16FWSAFF14ST-X
19 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16FWSAFF19ST-X

Remarks

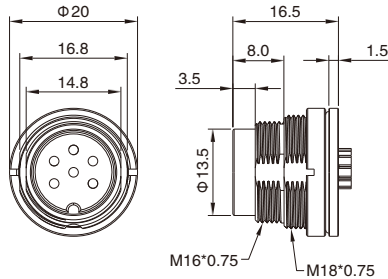
Note: X Suitable cable Dia: 3=PG9, 4=PG7, 7=PG11

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Male Panel Mount, Die-cast Screw, Solder, Front fastened

- Connector series: M16
- Gender: Male
- Locking type: Fix screw
- Mounting type: Front fastened
- Part No.: MB16MSAFHD**ST-6

** refers to pins number



RoHS

General information

Standard:	IEC 61076-2-106
Ambient temperature:	-25℃ ~ +70℃
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector screw/body:	Zinc alloy with nickel plated
Coupling screw:	Brass with nickel plated

Seal/ O-ring:	NBR/FKM
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
				A/C	D/C	AWG	mm ²		
02 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSAFHD02ST-6
03 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSAFHD03ST-6
04 pins		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSAFHD04ST-6
05 pins-a		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSAFHD05AST-6
05 pins-b		Solder version	6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16MSAFHD05BST-6
06 pins		Solder version	5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSAFHD06ST-6
07 pins-a		Solder version	5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MB16MSAFHD07AST-6
07 pins-b		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16MSAFHD07BST-6
08 pins		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16MSAFHD08ST-6
14 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16MSAFHD14ST-6
19 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16MSAFHD19ST-6

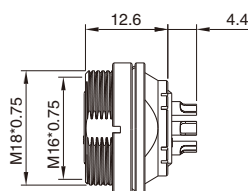
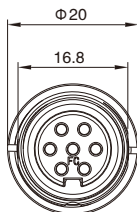
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Panel Mount, Die-cast Screw, Solder, Front fastened

- Connector series: M16
- Gender: Female
- Locking type: Fix screw
- Mounting type: Front fastened
- Part No.: MB16FSAFHD**ST-6

** refers to pins number



General information



Standard:	IEC 61076-2-106
Ambient temperature:	-25℃ ~ +70℃
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector screw/body:	Zinc alloy with nickel plated
Coupling screw:	Brass with nickel plated

Seal/ O-ring:	NBR/FKM
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
				A/C	D/C	AWG	mm ²		
02 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSAFHD02ST-6
03 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSAFHD03ST-6
04 pins		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSAFHD04ST-6
05 pins-a		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSAFHD05AST-6
05 pins-b		Solder version	6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16FSAFHD05BST-6
06 pins		Solder version	5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSAFHD06ST-6
07 pins-a		Solder version	5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MB16FSAFHD07AST-6
07 pins-b		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16FSAFHD07BST-6
08 pins		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16FSAFHD08ST-6
14 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16FSAFHD14ST-6
19 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16FSAFHD19ST-6

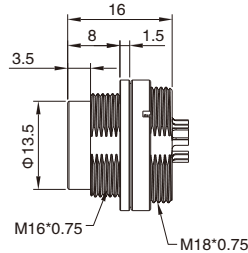
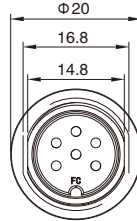
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Male Panel Mount, Die-cast Screw, Solder, Rear fastened

- Connector series: M16
- Gender: Male
- Locking type: Fix screw
- Mounting type: Rear fastened
- Part No.: MB16MSARHD**ST-6

** refers to pins number



RoHS

General information

Standard:	IEC 61076-2-106
Ambient temperature:	-25℃ ~ +70℃
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector screw/body:	Zinc alloy with nickel plated
Coupling screw:	Brass with nickel plated

Seal/ O-ring:	NBR/FKM
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
				A/C	D/C	AWG	mm ²		
02 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSARHD02ST-6
03 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSARHD03ST-6
04 pins		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSARHD04ST-6
05 pins-a		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSARHD05AST-6
05 pins-b		Solder version	6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16MSARHD05BST-6
06 pins		Solder version	5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16MSARHD06ST-6
07 pins-a		Solder version	5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MB16MSARHD07AST-6
07 pins-b		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16MSARHD07BST-6
08 pins		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16MSARHD08ST-6
14 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16MSARHD14ST-6
19 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	MB16MSARHD19ST-6

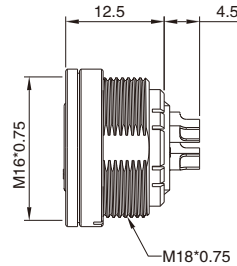
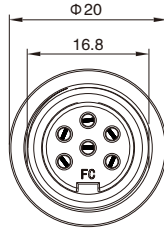
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Panel Mount, Die-cast Screw, Solder, Rear fastened

- Connector series: M16
- Gender: Female
- Locking type: Fix screw
- Mounting type: Rear fastened
- Part No.: MB16FSARHD**ST-6

** refers to pins number



General information



Standard:	IEC 61076-2-106
Ambient temperature:	-25℃ ~ +70℃
Connector insert:	BPT
Connector contacts:	Brass with gold plated
Connector screw/body:	Zinc alloy with nickel plated
Coupling screw:	Brass with nickel plated

Seal/ O-ring:	NBR/FKM
Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Cable jacket	Part No.
				A/C	D/C	AWG	mm ²		
02 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSARHD02ST-6
03 pins		Solder version	7A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSARHD03ST-6
04 pins		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSARHD04ST-6
05 pins-a		Solder version	6A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSARHD05AST-6
05 pins-b		Solder version	6A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16FSARHD05BST-6
06 pins		Solder version	5A(40℃)	250V	32V	18AWG	0.75	PUR/PVC	MB16FSARHD06ST-6
07 pins-a		Solder version	5A(40℃)	125V	32V	18AWG	0.75	PUR/PVC	MB16FSARHD07AST-6
07 pins-b		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16FSARHD07BST-6
08 pins		Solder version	5A(40℃)	60V	32V	18AWG	0.75	PUR/PVC	MB16FSARHD08ST-6
14 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	B16FSARHD14ST-6
19 pins		Solder version	3A(40℃)	60V	32V	Max.24AWG	Max.0.25	PUR/PVC	B16FSARHD19ST-6

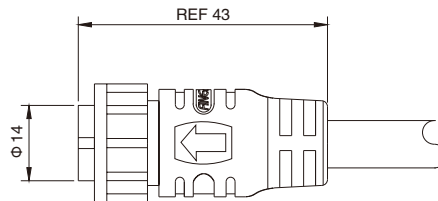
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Male Molded Cable, Straight, Quick-lock Type

- Connector series: M16
- Gender: Male
- Locking type: Quick-lock
- Mounting type: Straight
- Part No.: MA16MAQ**STXXX34

** refers to pins number
X refers to cable specification



RoHS

General information

Ambient temperature:	-40℃ ~ +80℃(fixed installation) -20℃ ~ +80℃(flexible installation)
Connector insert:	PA + GF
Connector contacts:	Brass with gold plated
Connector overmold:	TPU
Quick-lock fix cap:	PA+GF
Seal / O-ring:	FKM

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Rated current	Voltage		Wire gauge / size		Cable jacket	Wire insulation	Part No.
			A/C	D/C	AWG	mm ²			
08 pins		4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MA16MAQ08STXXXB34
09 pins		4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MA16MAQ09STXXXB34

Note: X refers to cable specification

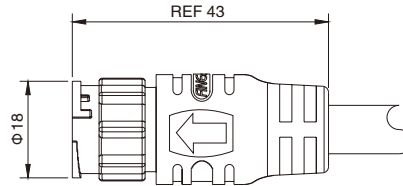
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Molded Cable, Straight, Quick-lock Type

- Connector series: M16
- Gender: Female
- Locking type: Quick-lock
- Mounting type: Straight
- Part No.: MA16FAQ**STXXX34

** refers to pins number
X refers to cable specification



General information



Ambient temperature:	-40℃ ~ +80℃(fixed installation) -20℃ ~ +80℃(flexible installation)
Connector insert:	PA + GF
Connector contacts:	Brass with gold plated
Connector overmold:	TPU

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Rated current	Voltage		Wire gauge / size		Cable jacket	Wire insulation	Part No.
			A/C	D/C	AWG	mm ²			
08 pins		4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MA16FAQ08STXXXB34
09 pins		4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MA16FAQ09STXXXB34

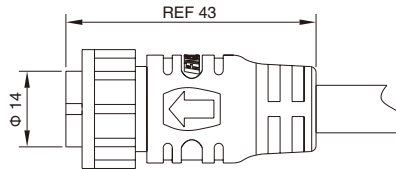
Note: X refers to cable specification

Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Molded Cable, Straight, Quick-lock Type, With Fix-cap

- Connector series: M16
 - Gender: Female
 - Locking type: Quick-lock
 - Mounting type: Straight
 - Part No.: MA16FRQ**STXXX34
(Reversed polarity)
- ** refers to pins number
X refers to cable specification



General information

RoHS

Ambient temperature:	-40℃ ~ +80℃(fixed installation) -20℃ ~ +80℃(flexible installation)
Connector insert:	PA + GF
Connector contacts:	Brass with gold plated
Connector overmold:	TPU
Quick-lock fix cap:	PA+GF
Seal / O-ring:	FKM

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Rated current	Voltage		Wire gauge / size		Cable jacket	Wire insulation	Part No.
			A/C	D/C	AWG	mm ²			
08 pins		4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MA16FRQ08STXXXB34
09 pins		4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MA16FRQ09STXXXB34

Note: X refers to cable specification

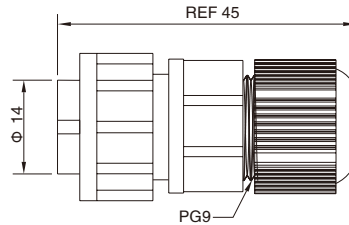
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Male Field Wirable Assembly, Straight, Quick-lock Type, Solder

- Connector series: M16
- Gender: Male
- Locking type: Quick-lock
- Mounting type: Plastic mounting
- Part No.: MB16MAAQ**ST

** refers to pins number



General information

RoHS 

Ambient temperature:	-25°C ~ +90°C
Connector insert/body:	PA + GF
Connector contacts:	Brass with gold plated
Quick-lock fix cap:	PA+GF
O-ring:	FKM

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
Suitable cable Dia:	5.0~8.5mm
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Cable jacket	Wire insulation	Part No.
				A/C	D/C	AWG	mm ²			
08 pins		Solder version	4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MB16MAAQ08ST
09 pins		Solder version	4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MB16MAAQ09ST

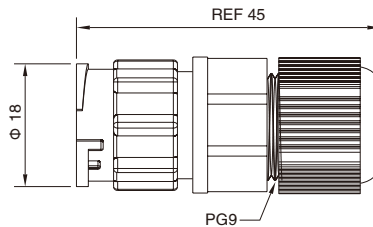
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Field Wirable Assembly, Straight, Quick-lock Type, Solder

- Connector series: M16
- Gender: Female
- Locking type: Quick-lock
- Mounting type: Plastic mounting
- Part No.: MB16FAAQ**ST

** refers to pins number



General information

RoHS

Ambient temperature:	-25℃ ~ +90℃
Connector insert/body:	PA + GF
Connector contacts:	Brass with gold plated
O-ring:	FKM

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
Suitable cable Dia:	5.0~8.5mm
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

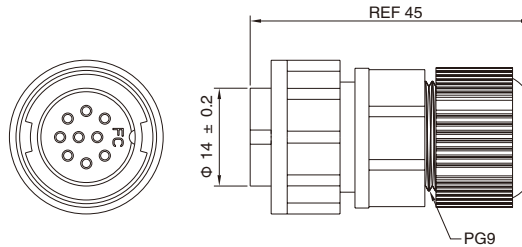
Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Cable jacket	Wire insulation	Part No.
				A/C	D/C	AWG	mm²			
08 pins		Solder version	4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MB16FAAQ08ST
09 pins		Solder version	4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MB16FAAQ09ST

Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Field Assembly, Straight, Quick-lock Type, Solder, With Fix-cap

- Connector series: M16
 - Gender: Female
 - Locking type: Quick-lock
 - Mounting type: Plastic mounting
 - Part No.: MB16FRAMQ**ST
(Reversed polarity)
- ** refers to pins number



General information



Ambient temperature:	-25℃ ~ +90℃
Connector insert/body:	PA + GF
Connector contacts:	Brass with gold plated
Quick-lock fix cap:	PA+GF
O-ring:	FKM

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
Suitable cable Dia:	5.0~8.5mm
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Cable jacket	Wire insulation	Part No.
				A/C	D/C	AWG	mm ²			
08 pins		Solder version	4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MB16FRAMQ08ST
09 pins		Solder version	4A	250V	300V	22AWG	0.34	PUR/PVC	PVC	MB16FRAMQ09ST

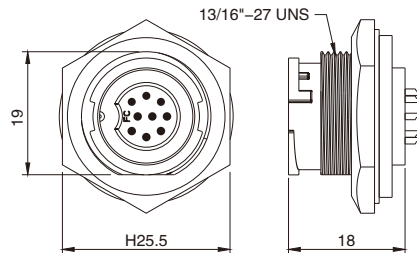
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Male Panel Mount, Straight, Quick-lock Type, Solder, Front fastened

- Connector series: M16
- Gender: Male
- Locking type: Quick-lock
- Mounting type: Front fastened
- Part No.: MB16MSAFQ**ST

** refers to pins number



General information



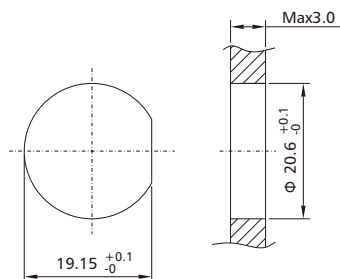
Ambient temperature:	-25°C ~ +90°C
Connector insert:	PA + GF
Connector contacts:	Brass with gold plated
Coupling nut/screw:	PA+GF
Seal / O-ring:	Epoxy resin / FKM

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Wire insulation	Part No.
				A/C	D/C	AWG	mm ²		
08 pins		Solder version	4A	250V	300V	22AWG	0.34	PVC wire or customized	MB16MSAFQ08ST
09 pins		Solder version	4A	250V	300V	22AWG	0.34	PVC wire or customized	MB16MSAFQ09ST

Panel Cut-out Dimensions



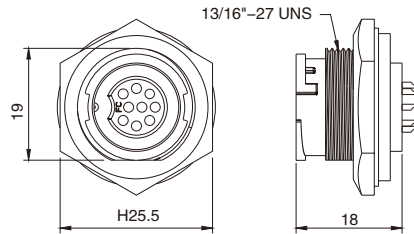
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Female Panel Mount, Quick-lock Type, Solder, Front fastened

- Connector series: M16
- Gender: Female
- Locking type: Quick-lock
- Mounting type: Front fastened
- Part No.: MB16FSAFQ**ST

** refers to pins number



General information



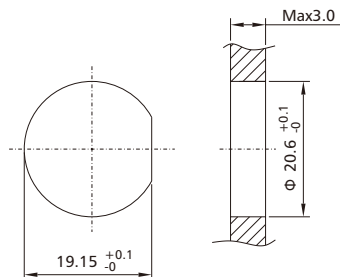
Ambient temperature:	-25°C ~ +90°C
Connector insert:	PA + GF
Connector contacts:	Brass with gold plated
Coupling nut/screw:	PA+GF
Seal / O-ring:	Epoxy resin / FKM

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Wire gauge / size		Wire insulation	Part No.
				A/C	D/C	AWG	mm ²		
08 pins		Solder version	4A	250V	300V	22AWG	0.34	PVC wire or customized	MB16FSAFQ08ST
09 pins		Solder version	4A	250V	300V	22AWG	0.34	PVC wire or customized	MB16FSAFQ09ST

Panel Cut-out Dimensions



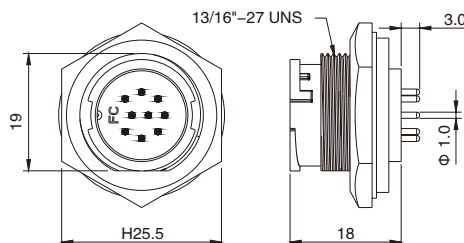
Remarks

- Please refer to Page 578 for the Conversion between American Wire Gauge AWG and Wire Cross-section mm².
- Please Refer to page 292 for products' part number encoding rule.

M16 Male Panel Mount, Quick-lock Type, PCB Type, Front fastened

- Connector series: M16
- Gender: Male
- Locking type: Quick-lock
- Mounting type: Front fastened
- Part No.: MB16MBAFQ**ST

** refers to pins number



General information

RoHS

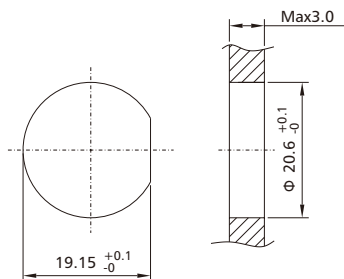
Ambient temperature:	-25°C ~ +90°C
Connector insert:	PA + GF
Connector contacts:	Brass with gold plated
Coupling nut/screw:	PA+GF
Seal / O-ring:	Epoxy resin / FKM

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

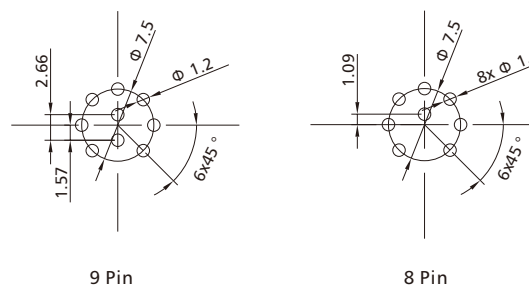
Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Part No.
				A/C	D/C	
08 pins		PCB version	4A	250V	300V	MB16MBAFQ08ST
09 pins		PCB version	4A	250V	300V	MB16MBAFQ09ST

Panel Cut-out Dimensions



PCB Layout



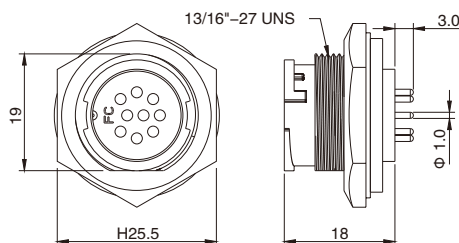
Remarks

- Please Refer to page 292 for products' part number encoding rule.

M16 Female Panel Mount, Quick-lock Type, PCB Type, Front fastened

- Connector series: M16
- Gender: Female
- Locking type: Quick-lock
- Mounting type: Front fastened
- Part No.: MB16FBAFQ**ST

** refers to pins number



General information



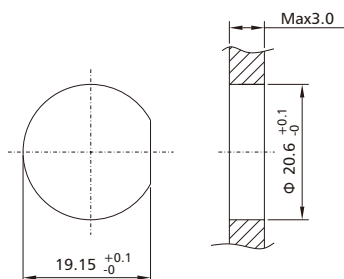
Ambient temperature:	-25°C ~ +90°C
Connector insert:	PA + GF
Connector contacts:	Brass with gold plated
Coupling nut/screw:	PA+GF
Seal / O-ring:	Epoxy resin / FKM

Insulation resistance:	≥ 100MΩ
Contact resistance :	≤ 5mΩ
Shielding:	Unavailable
IP rating:	IP65, IP67 in locked condition
Mating endurance:	>100 cycles

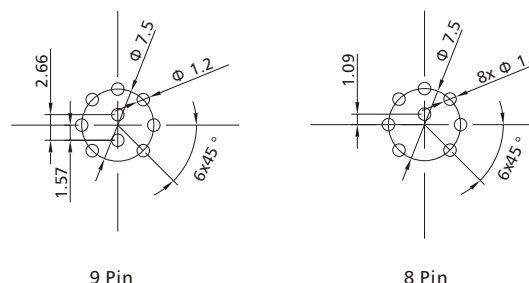
Electrical data & Mechanical data

Contacts		Contact termination	Rated current	Voltage		Part No.
				A/C	D/C	
08 pins		PCB version	4A	250V	300V	MB16FBAFQ08ST
09 pins		PCB version	4A	250V	300V	MB16FBAFQ09ST

Panel Cut-out Dimensions



PCB Layout

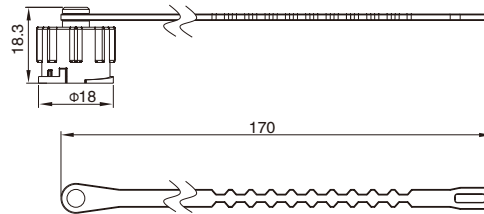


Remarks

- Please Refer to page 292 for products' part number encoding rule.

M16 Protection Cap for Male With Fix-Cap Cable Connector

- Connector series: M16
- Gender: for Male
- Locking type: Quick-lock
- Part No.: PCSM16-1

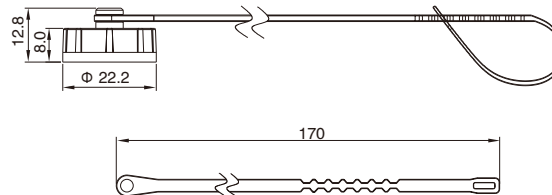


General information

Material:	PA+GF
Loop:	TPU
Color:	Black
Degree of protection:	IP65, IP67 in locked condition

M16 Protection Cap for female Molded cable connector without fix cap

- Connector series: M16
- Gender: for Female
- Locking type: Quick-lock
- Part No.: PCNM16-1

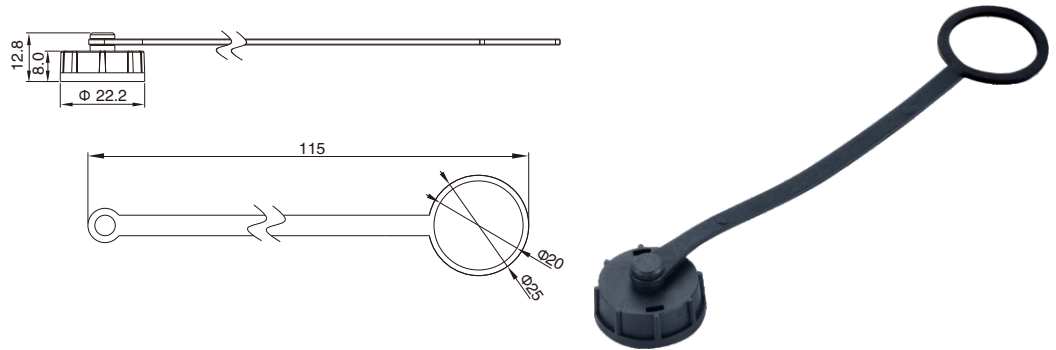


General information

Material:	PA+GF
Gasket:	FKM
Loop:	TPU
Color:	Black
Degree of protection:	IP65, IP67 in locked condition

M16 Protection Cap for Male/ Female Panel-mount Connector

- Connector series: M16
- Gender: for Male/Female
- Locking type: Quick-lock
- Part No.: PCNM16-2



General information

Material:	PA+GF
Gasket:	FKM
Loop:	TPU
Color:	Black
Degree of protection:	IP65, IP67 in locked condition

M16 Connector Accessories

Type

Part number

Accessories

Assembly tool for M16 connectors
For connectors with female thread

M16-TOOL-1



Type

Part number

Accessories

Assembly tool for M16 connectors
For connectors with male thread

M16-TOOL-2

