## **AP-10**

High-power supply terminal, high heat resistance board-to-board connection. Contribute to miniaturization of power electronics devices, height differences can be customized.

**Product Specifications:** 

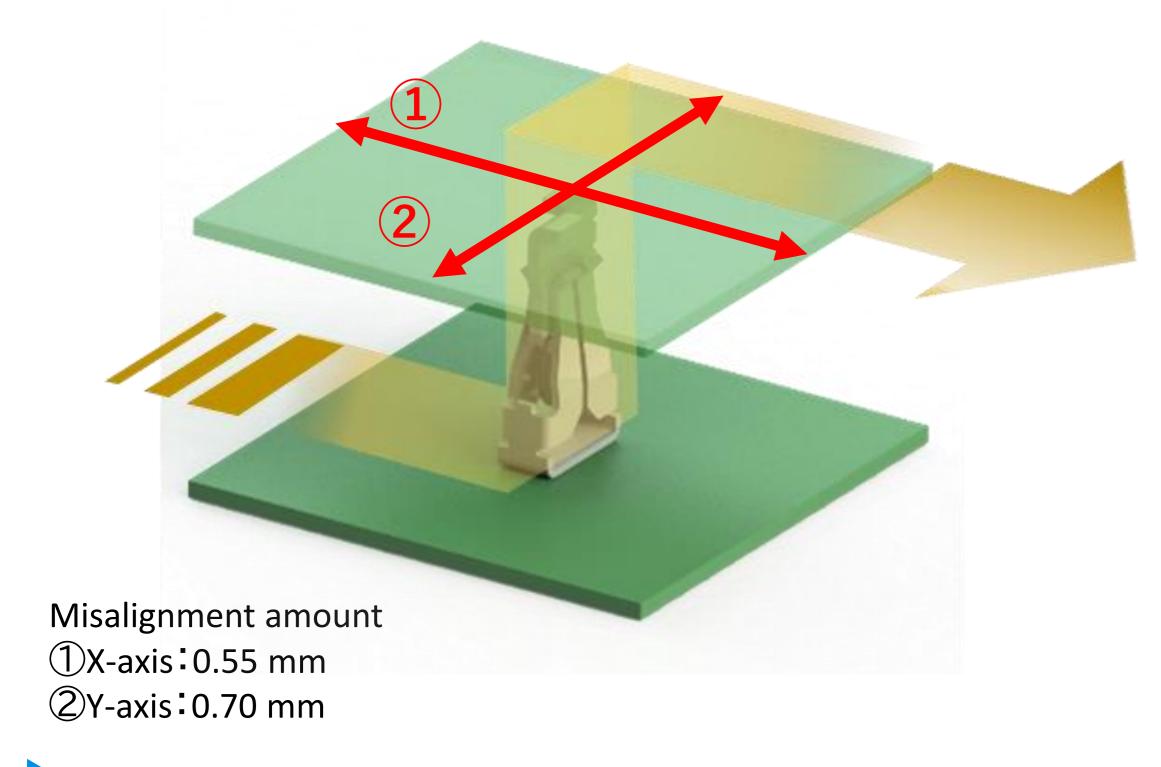
Mating type		Vertical			
Wiping Le	ngth (mm)	, , ,			
		4.80 (Flug 14.5)			
	Height (mm)	13.6 ~ 16.1 (Plug: 7.5)			
	rieigiit (iiiiii)	16.1 ~ 23.1 (Plug: 14.5)			
	7.6 (Rece) Width (mm) 3.4 (Plug: 7.5)	7.6 (Rece)			
Siza (mm)		3.4 (Plug: 7.5)			
Size (mm)		5.2 (Plug: 14.5)			
		3.4 +/- 0.2 (Rece)			
	Depth	16.1 ~ 23.1 (Plug: 14.5) 7.6 (Rece) 3.4 (Plug: 7.5) 5.2 (Plug: 14.5) 3.4 +/- 0.2 (Rece) 6.0 +/- 0.1 (Plug: 7.5) 7.6 +/- 0.1 (Plug: 14.5)			
		7.6 +/- 0.1 (Plug: 14.5)			
* Please inquire for pin counts not listed or outside of the pin count range.					

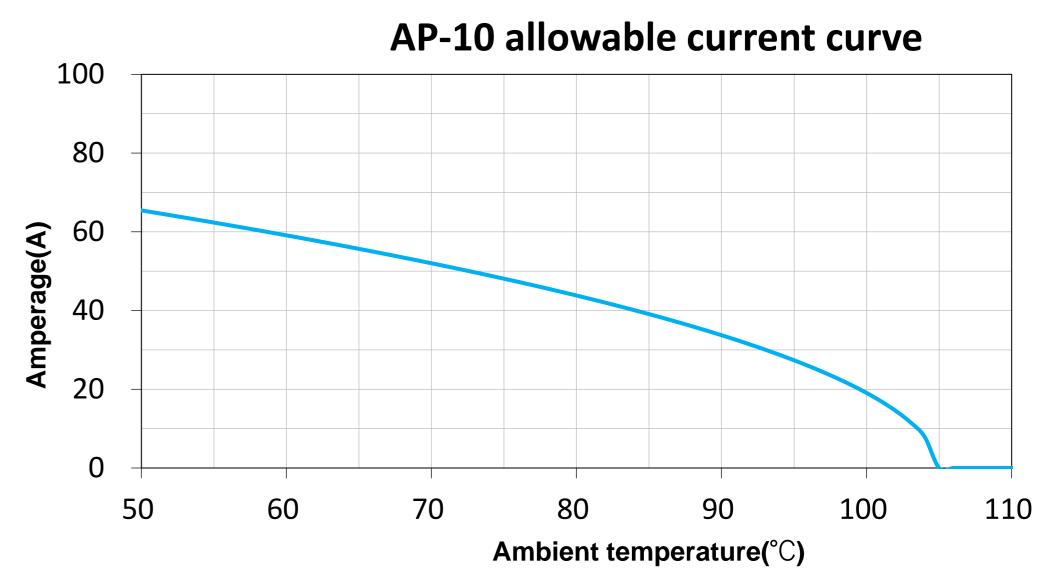
Product Specifications:		
Operating Temperature	-40 - 105°C	
Mating force	15N Max.	
Contact resistance	1.0 mΩ Max.	





#### High current and temperature resistance, board-to-board power supply terminal



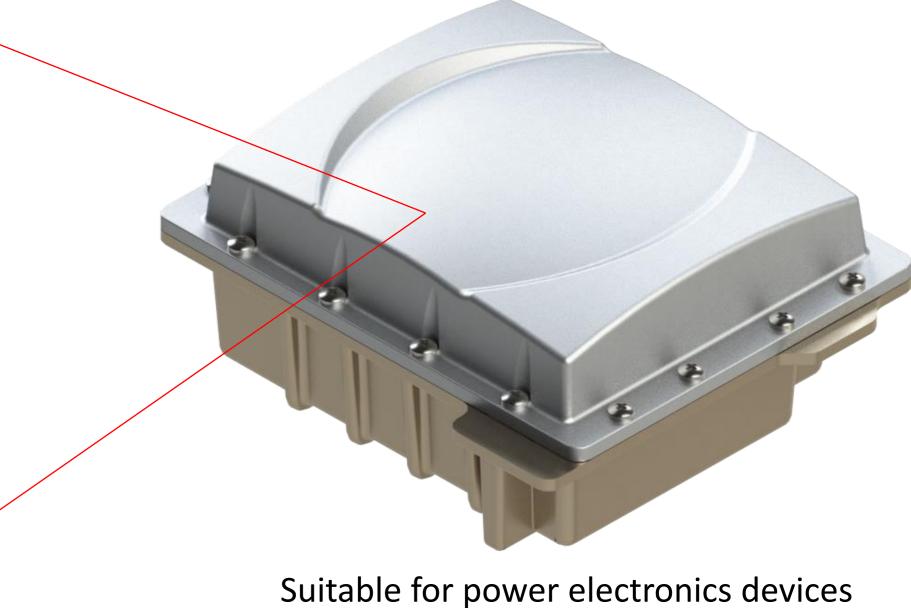


<sup>\*</sup>The above results are actual measurement results under the test conditions specified by I-PEX.

#### Contribute space-saving design on PCB achieved by miniaturization of connector

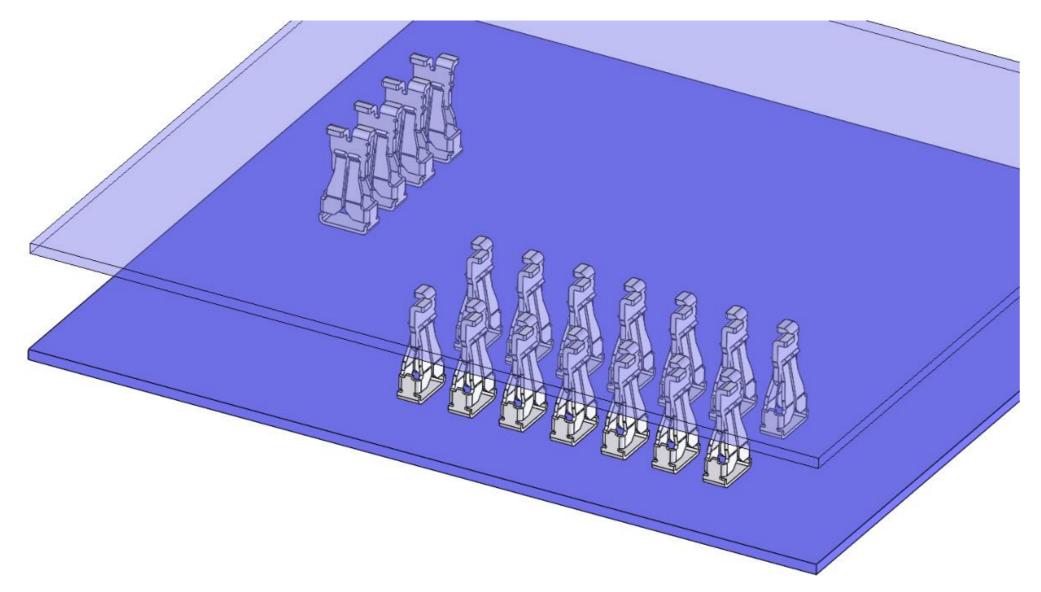
Comparison with traditional connect methods

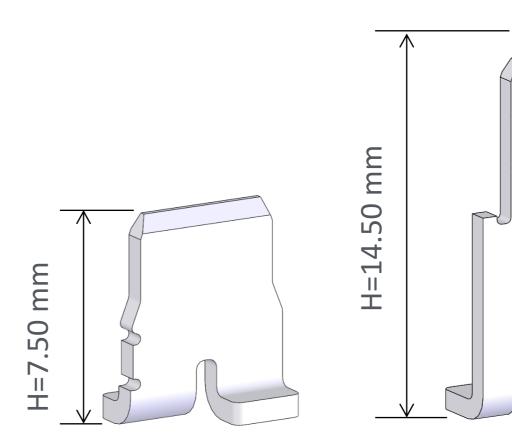
Category	Bus bar	BtoB connector
Drawing		
Size wise	X	Ο
Tact wise		0

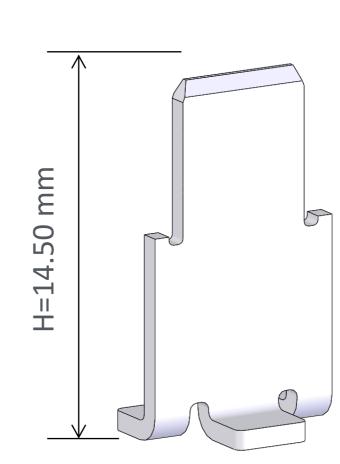


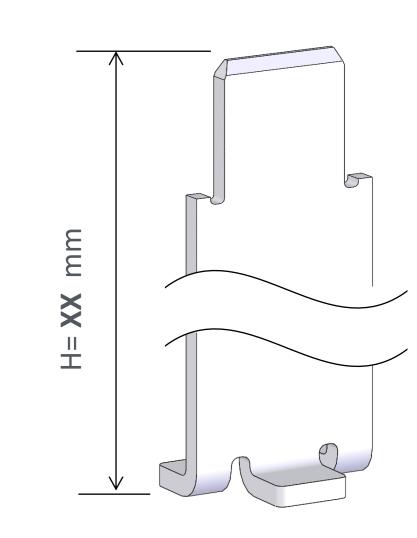
such as DC-DC converter or Inverter

#### Flexible board to board spacing





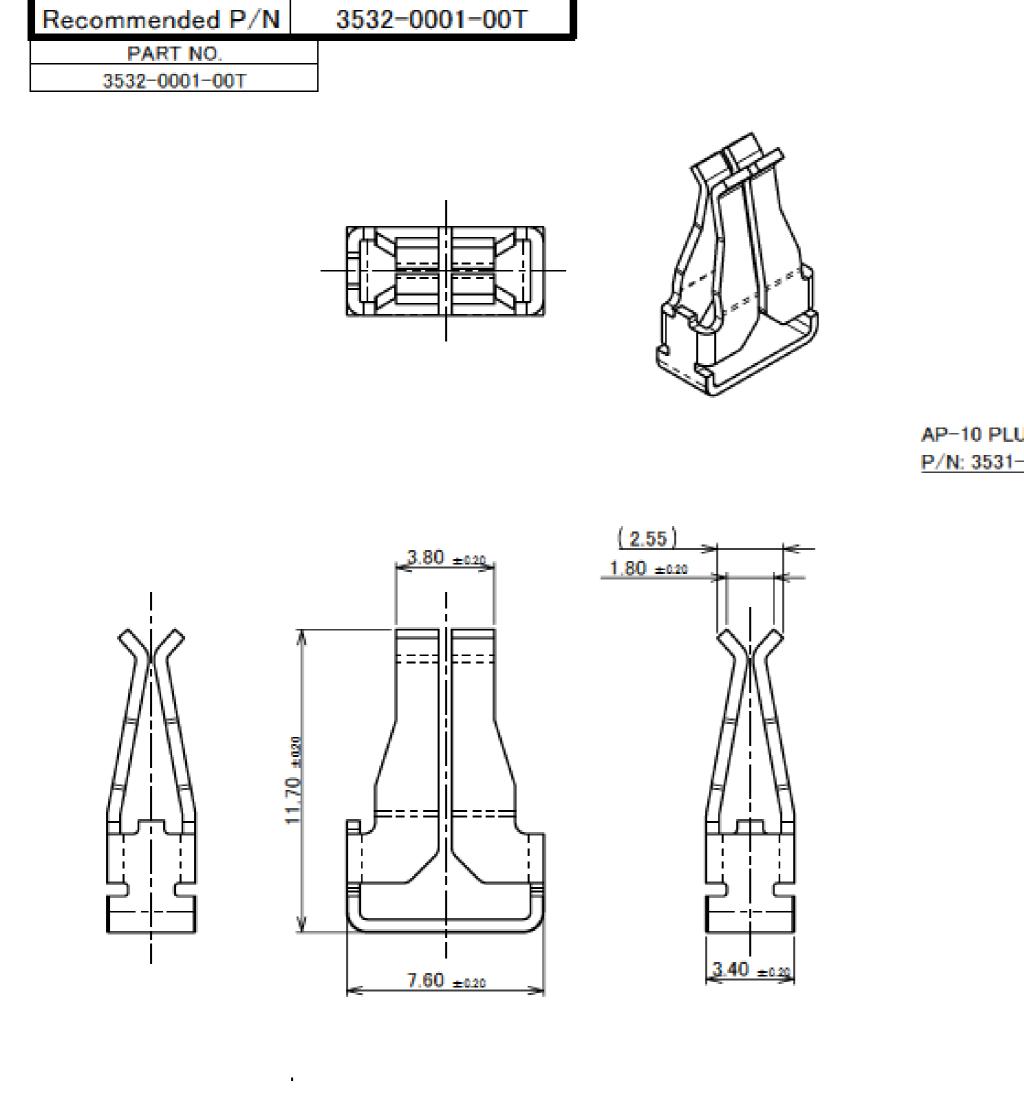




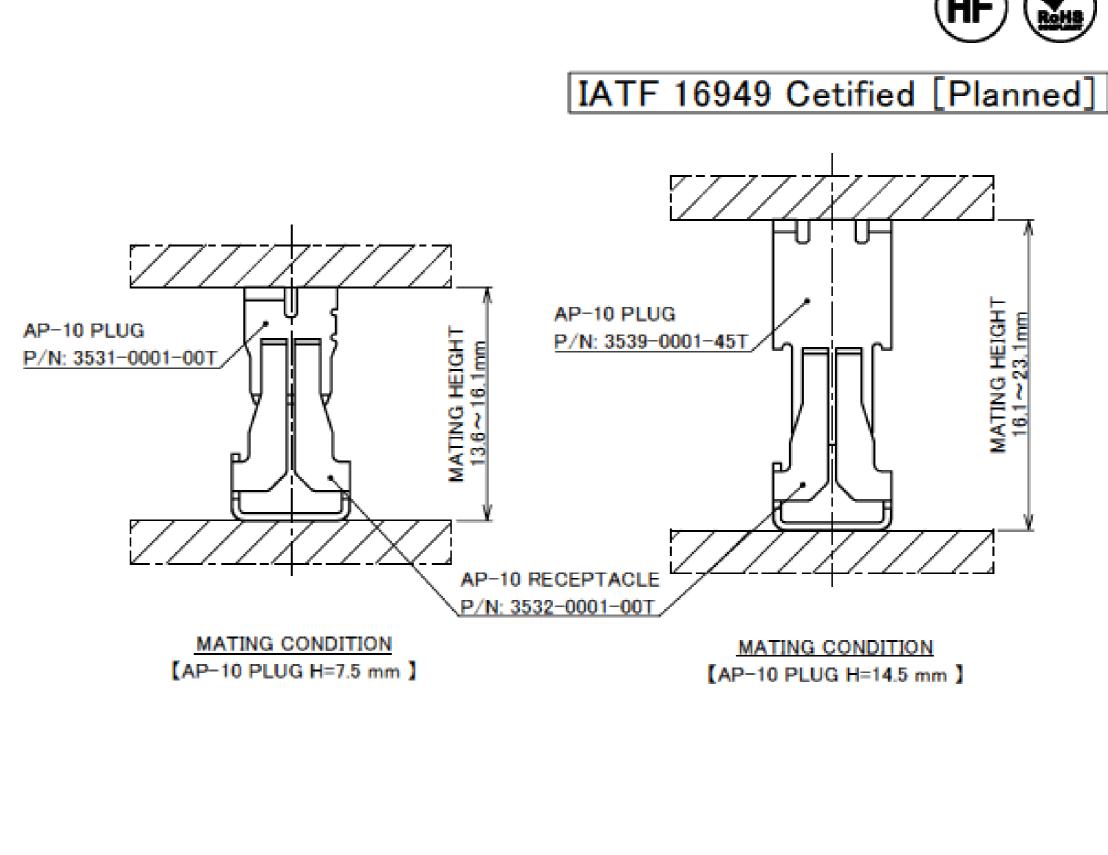
<sup>\*</sup>The results depend on the operating environment, so please contact us for details.

# Component Parts Details

### **AP Series Receptacle**



(7.60)



NOTES.

1. APPLICABLE CONNECTOR

AP-10 PLUG H=7.5 mm (P/N: 3531-0001-00T)

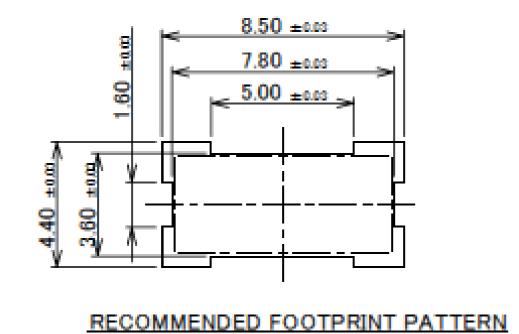
AP-10 PLUG H=14.5 mm (P/N: 3539-0001-45T)

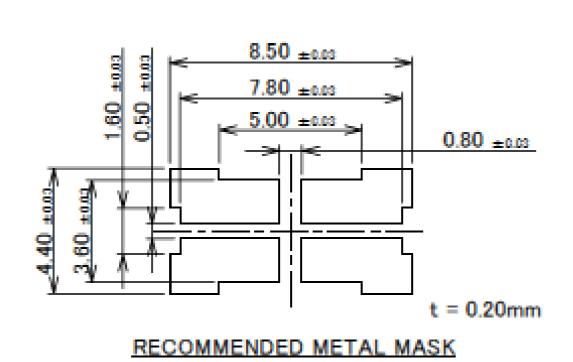
1	RECEPTACLE	COPPER ALLOY	Sn 1.00~4.50 μ m OVER Ni 1.00~4.50 μ m
NO.	DESCRIPTION	MATERIAL	FINISH, REMARKS

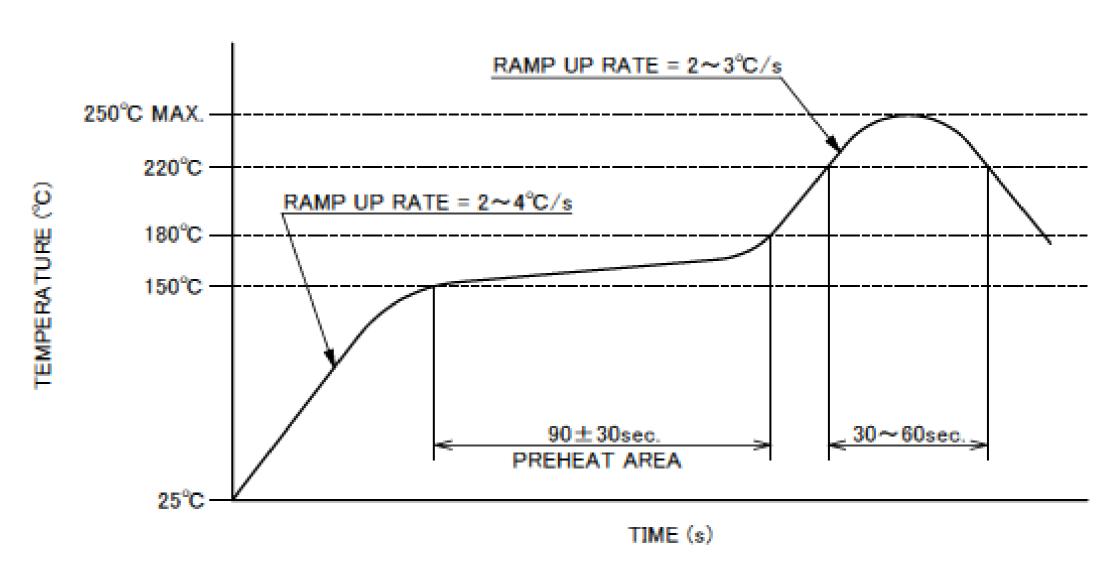


#### **AP Series Receptacle**

PART NO. 3532-0001-00T







REFLOW TEMPERATURE PROFILE
SENJU METAL INDUSTRY CO., LTD.: M705-SHF(Sn96.5 Ag3.0 Cu0.5)

Rev.5

ITEMS	SPECIFICATION
APPLICABLE CONNECTOR PART No.	3531-0001-00T 3539-0001-45T
RATING AMPERAGE	16A DC
TEMPERATURE RISE	<b>⊿</b> 15.0°C Max.
COMPONENT TEMPERATURE(ENERGIZATION)	233~378K(-40°C~+105°C)
OPERATING HUMIDITY	85% MAX.(NON-CONDENSING)
CONTACT RESISTANCE	INITIAL: 1.0 mohm MAX. / AFTER TEST: 1.0 mohm MAX.
DURABILITY	3 CYCLES
MATING FORCE	15.0 N MAX.
COPLANARITY	0.10mm MAX.
PRODUCT SPECIFICATION	PRS-2616
TEST REPORT	TR-19063
PACKING STANDARD	PST-17121
APPEARANCE CRITERIA No.	QLS-A***



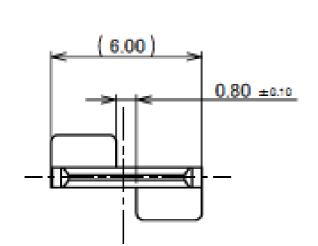
#### **AP Series Plug**

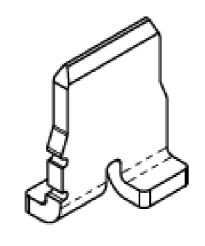
Recommended P/N	3531-0001-00T
PART NO.	
3531-0001-00T	

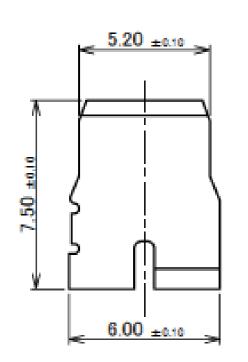


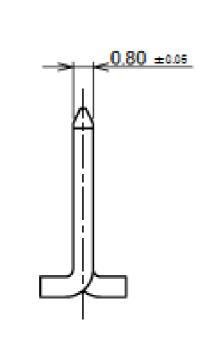


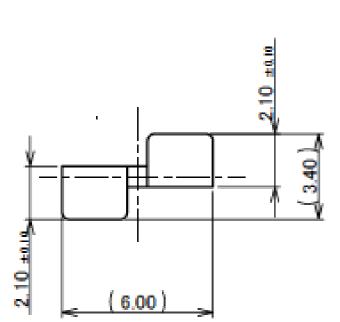
IATF 16949 Cetified [Planned]

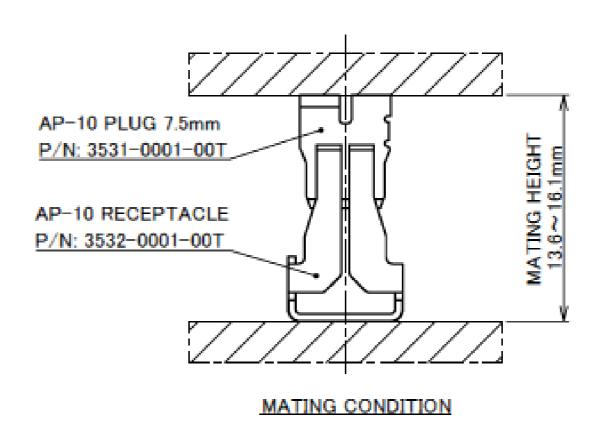












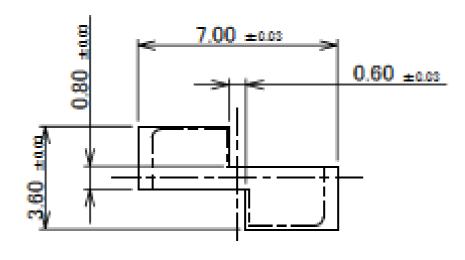
NOTES.

1. APPLICABLE CONNECTOR AP-10 RECEPTACLE (P/N: 3532-0001-00T)

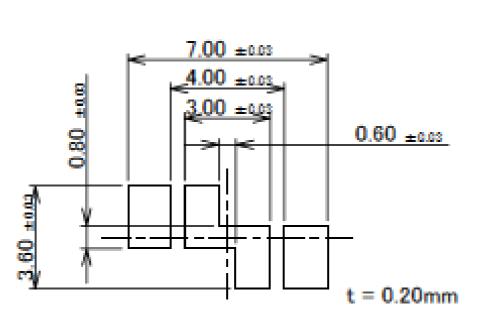
1	PLUG	BRASS	Sn 1.00 μ m ~ 4.50 μ m OVER Ni 1.00 μ m ~ 4.50 μ m
NO.	DESCRIPTION	MATERIAL	FINISH, REMARKS

Rev.5

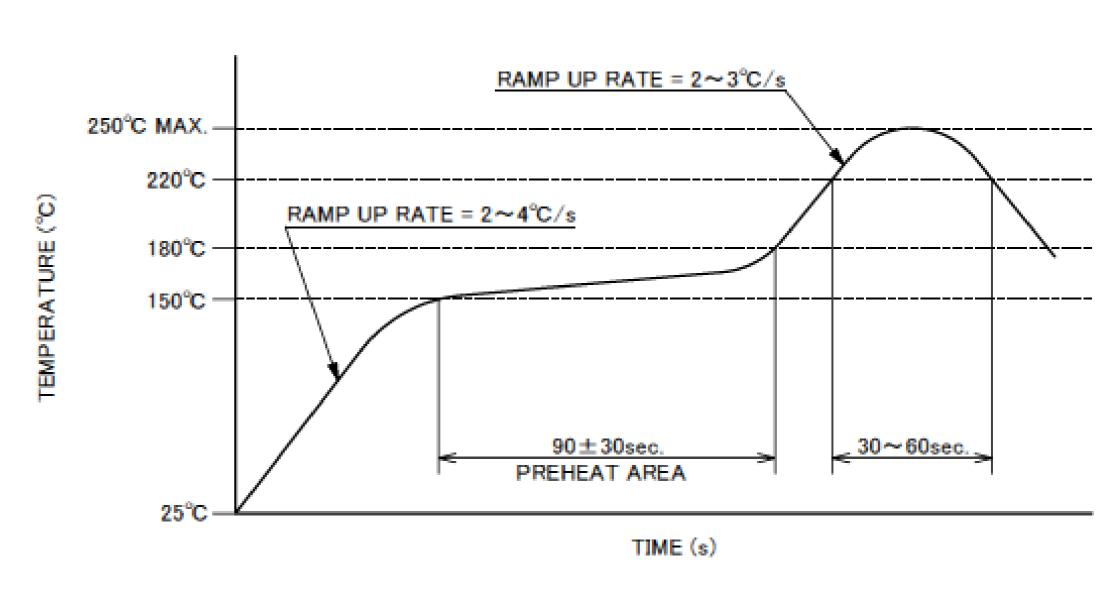
PART NO. 3531-0001-00T



RECOMMENDED FOOTPRINT PATTERN



RECOMMENDED METAL MASK



REFLOW TEMPERATURE PROFILE
SENJU METAL INDUSTRY CO., LTD.: M705-SHF(Sn96.5 Ag3.0 Cu0.5)



#### **AP Series Plug**

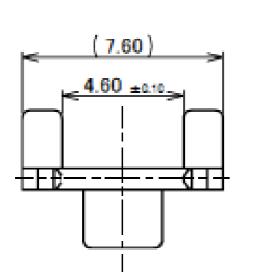
ITEMS	SPECIFICATION
APPLICABLE CONNECTOR PART No.	3532-0001-00T
RATING AMPERAGE	16A DC
TEMPERATURE RISE	∠15.0°C MAX.
COMPONENT TEMPERATURE(ENERGIZATION)	233~378K(-40°C~+105°C)
OPERATING HUMIDITY	85% MAX.(NON-CONDENSING)
CONTACT RESISTANCE	INITIAL: 1.0 mohm MAX. / AFTER TEST: 1.0 mohm MAX.
DURABILITY	3 CYCLES
MATING FORCE/UNMATING FORCE	15.0 N MAX./15.0 N MAX.
COPLANARITY	0.10mm MAX.
PRODUCT SPECIFICATION	PRS-2616
TEST REPORT	TR-19063
PACKING STANDARD	PST-17120
APPEARANCE CRITERIA No.	QLS-A***

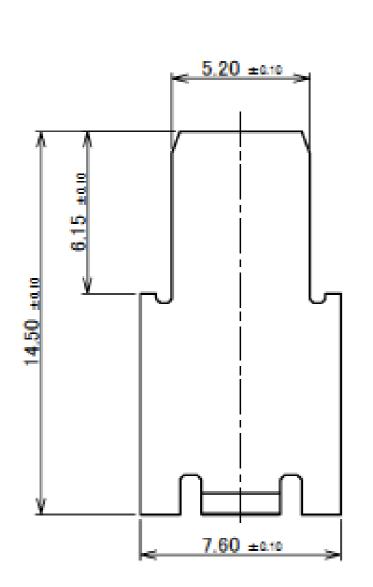
Rev.5

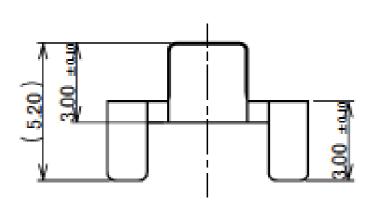
	Recommended P/N	3539-0001-45T
1	PART NO.	
	3539-0001-45T	

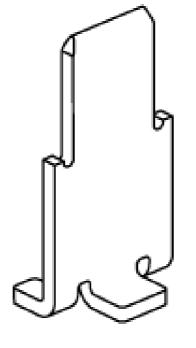


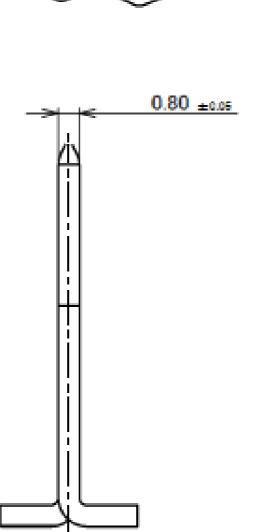


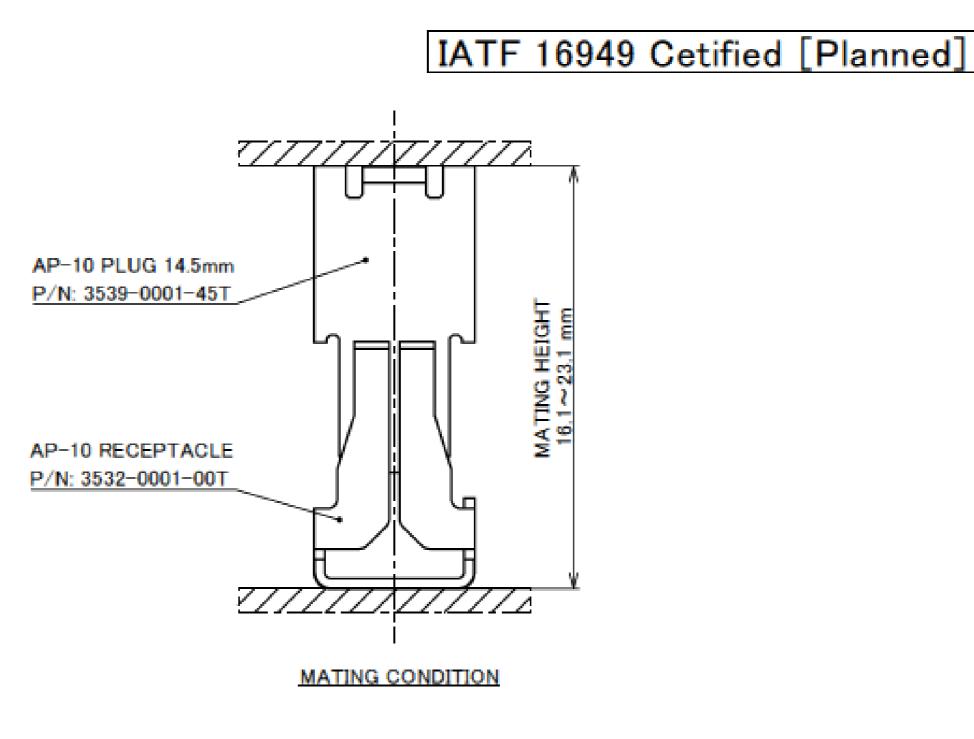












NOTES.

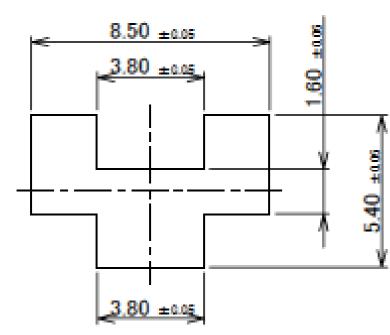
 APPLICABLE CONNECTOR AP-10 RECEPTACLE (P/N: 3532-0001-00T)

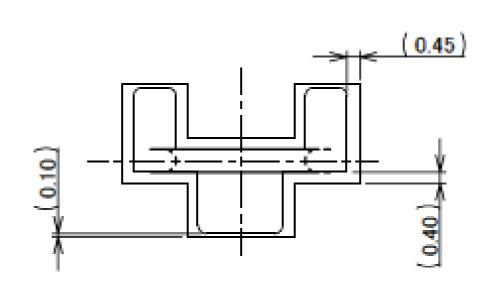
1	PLUG	BRASS	Sn 1.00~4.50 μ m OVER Ni 1.00~4.50 μ m
NO.	DESCRIPTION	MATERIAL	REMARKS, FINISH



#### **AP Series Plug**

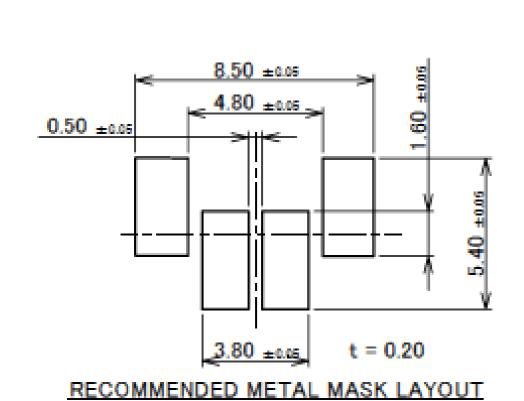
#### PART NO. 3539-0001-45T

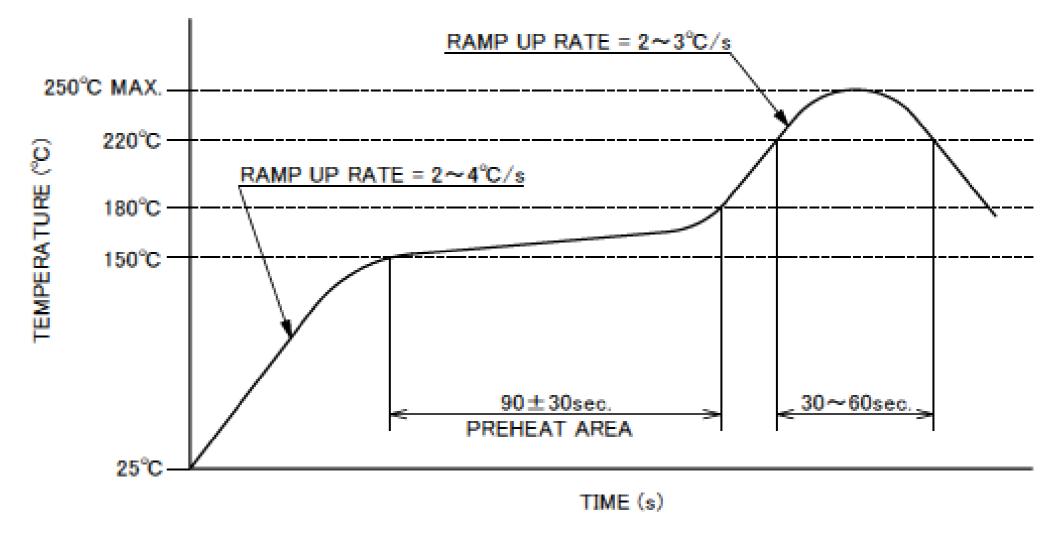




RECOMMENDED PATTERN LAYOUT

CONNECTOR ON RECOMMENDED PATTERN





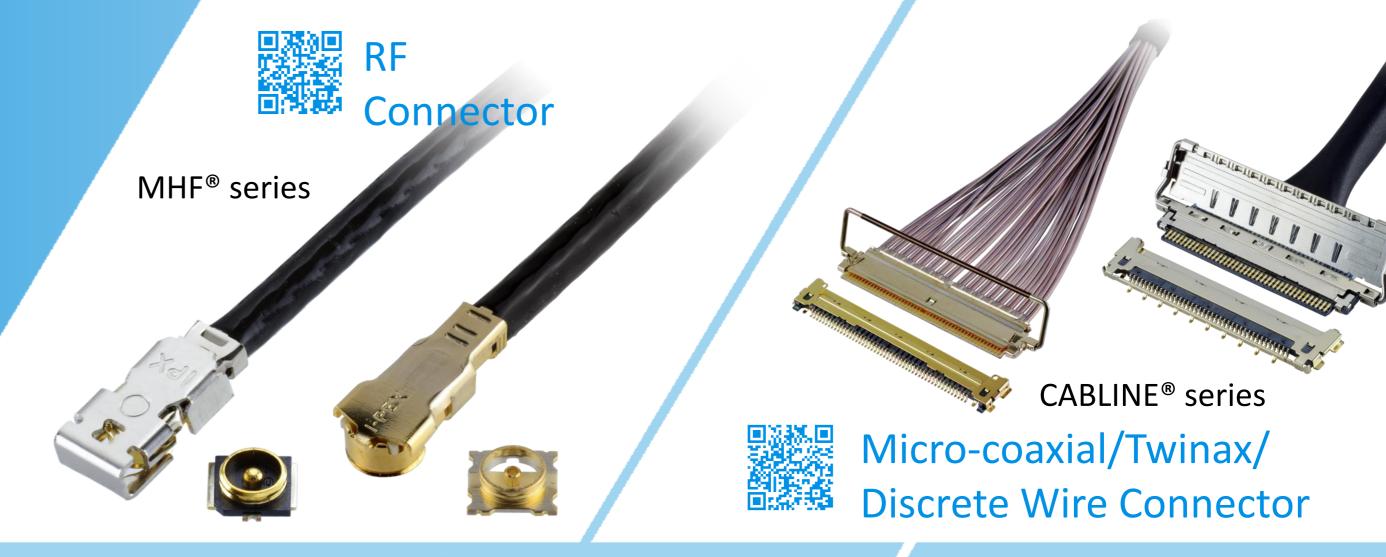
REFLOW TEMPERATURE PROFILE
SENJU METAL INDUSTRY CO., LTD.: M705-SHF(Sn96.5 Ag3.0 Cu0.5)

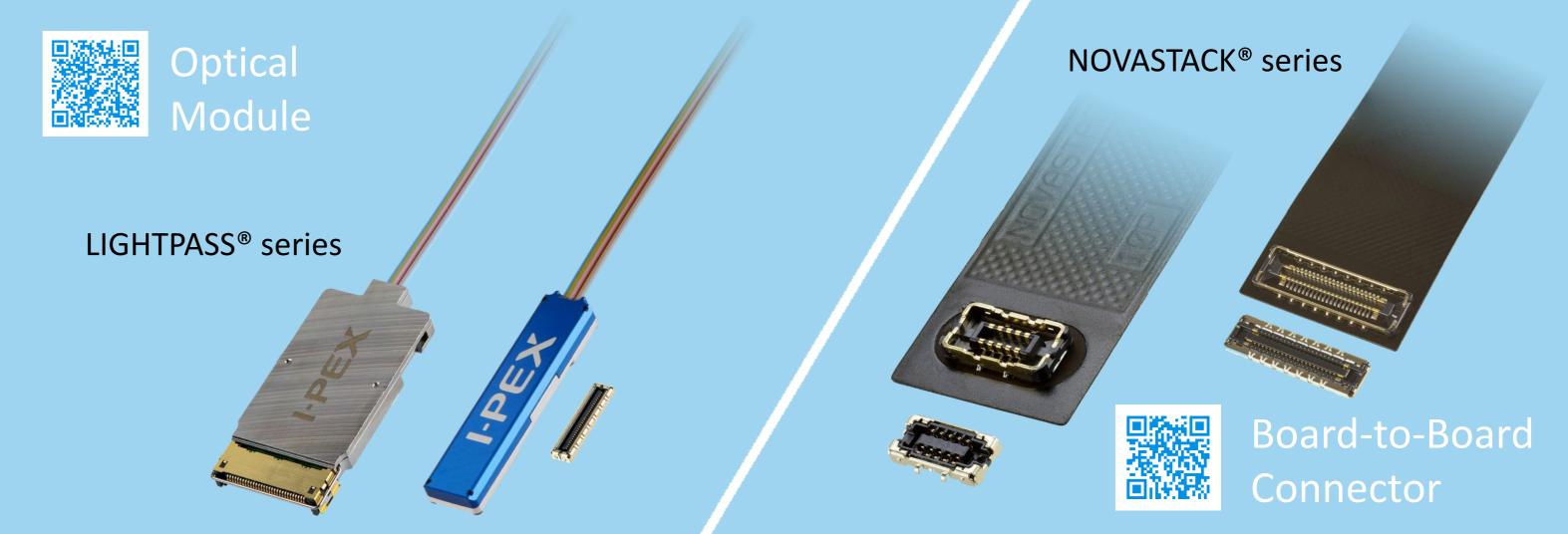
Rev.2

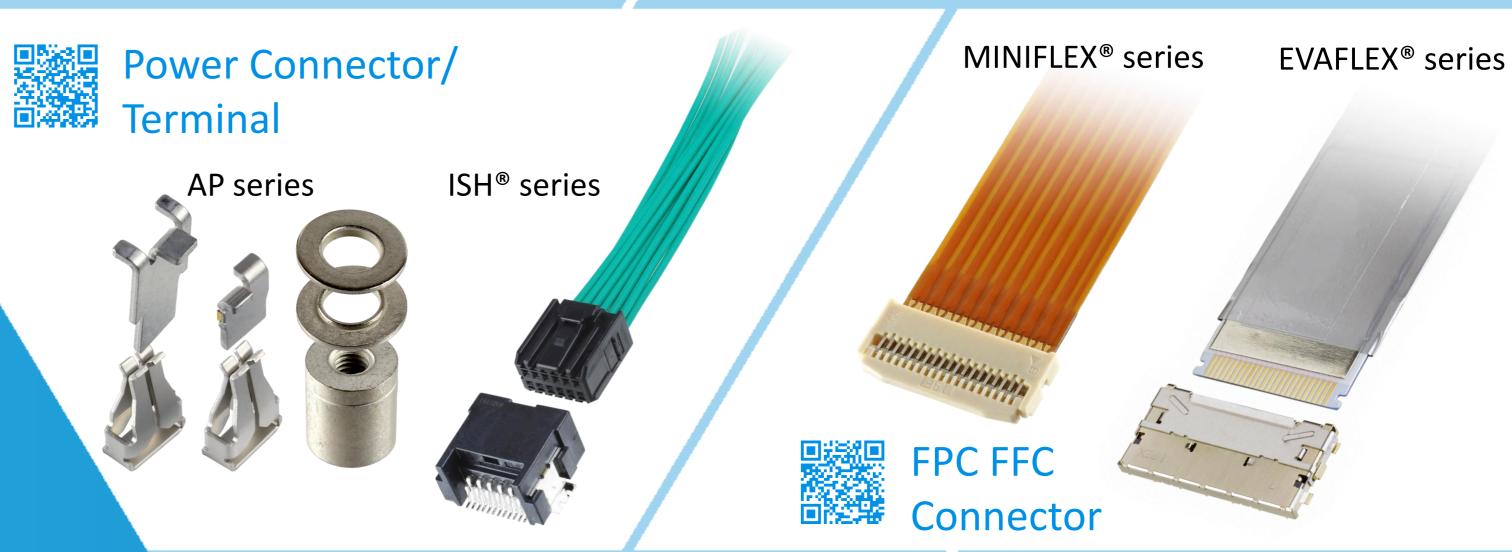
ITEMS	SPECIFICATION
APPLICABLE CONNECTOR PART No.	3532-0001-00T
RATING AMPERAGE	16A DC
TEMPERATURE RISE	∠15.0°C MAX
COMPONENT TEMPERATURE (ENERGIZATION)	233~378K(-40°C~105°C)
OPERATING HUMIDITY	85% MAX.(NON-CONDENSING)
CONTACT RESISTANCE	INITIAL: 1.0 mohm MAX. / AFTER TEST: 1.0 mohm MAX.
DURABILITY	3 CYCLES
MATING FORCE/UNMATING FORCE	15.0 N MAX./15.0 N MAX.
COPLANARITY	0.10mm MAX.
PRODUCT SPECIFICATION	PRS-2616
TEST REPORT	TR-19063
PACKING STANDARD	PST-22010
APPEARANCE CRITERIA No.	QLS-A***

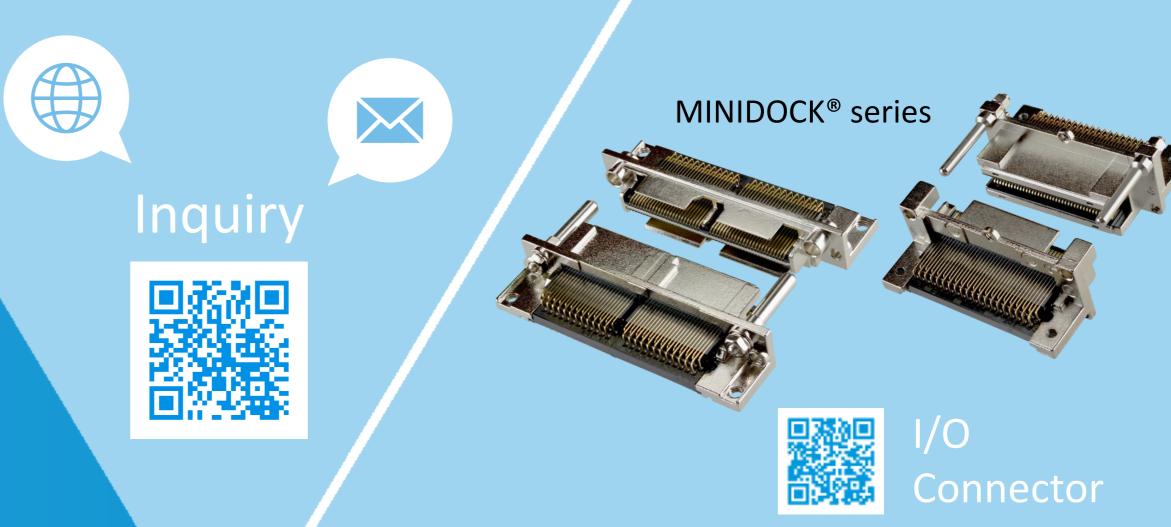


# Custom Connectors Available









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