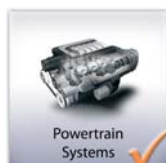
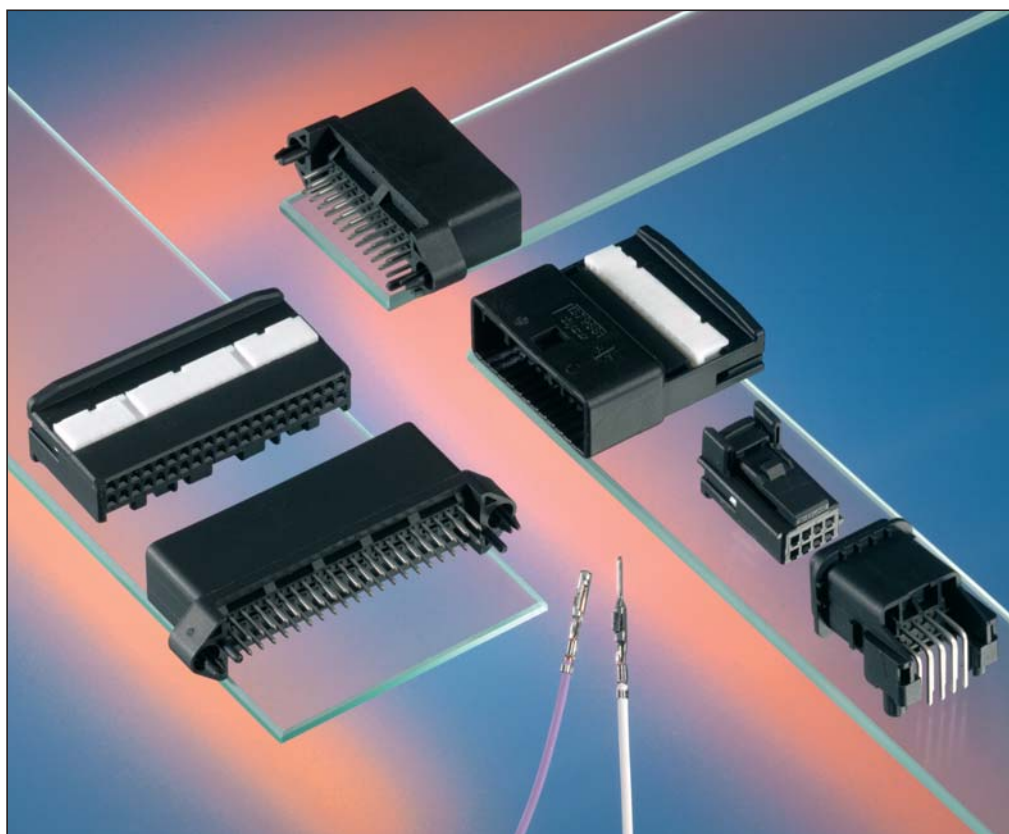


Introduction



TH/.025 Connector Series for Higher Density in Limited Spaces



Product Features

- TH/.025 Connectors were designed to provide better connections and performance while securing higher density in limited spaces as required in advanced electronic automotive control systems.
- Another feature is a unique contact design to resist fretting corrosion effectively while employing a lower contact force. As a result, the low insertion force of TH/.025 Connectors allows a lower connector mating force while offering high density for easy handling.
- This small pitch can help customers to reduce space and weight.
- TH/.025 Connectors feature a pitch of just 2.2 mm, compared to the current standard pitch of 2.54 mm.
- Contact Pitch: 2.2 mm
- Smaller space requirements
- TH/.025 Connector Series have been originally designed in Japan. A European version has been implemented, in order to fulfil the European customer requirements as:
 - Mechanical coding
 - Color coding
 - Reflow leadfree process for headers
- TH European Connectors are available in a full range from 4 to 40 positions.

Applications

- Wire-to-Wire, Wire-to-Board and ECU Applications
 - Mirror
 - Hand free cellphone
 - Immobilizer
 - Dashboard
 - Fuel flap
 - Electrically controlled trunk lid latch
 - Tyre pressure monitoring system
 - Body controller management

Receptacle Contacts

Technical Features

TH/.025 Contacts

- One piece contact designed to minimize fretting corrosion
- Terminal lance design to optimize cavity dimension

TH/.025 Receptacle Contacts:
 0.635 x 0.635 mm

Insertion Force:
 2.2 N max.

Contact Force:
 2.8 N (at an early stage),
 2.0 N (after ageing)

Current Carrying Capacity:
 5 A (to 7 A within some conditions)

Wire Size Range:
 from 0.22 to 0.5 mm², specific
 0.75 mm² application possible

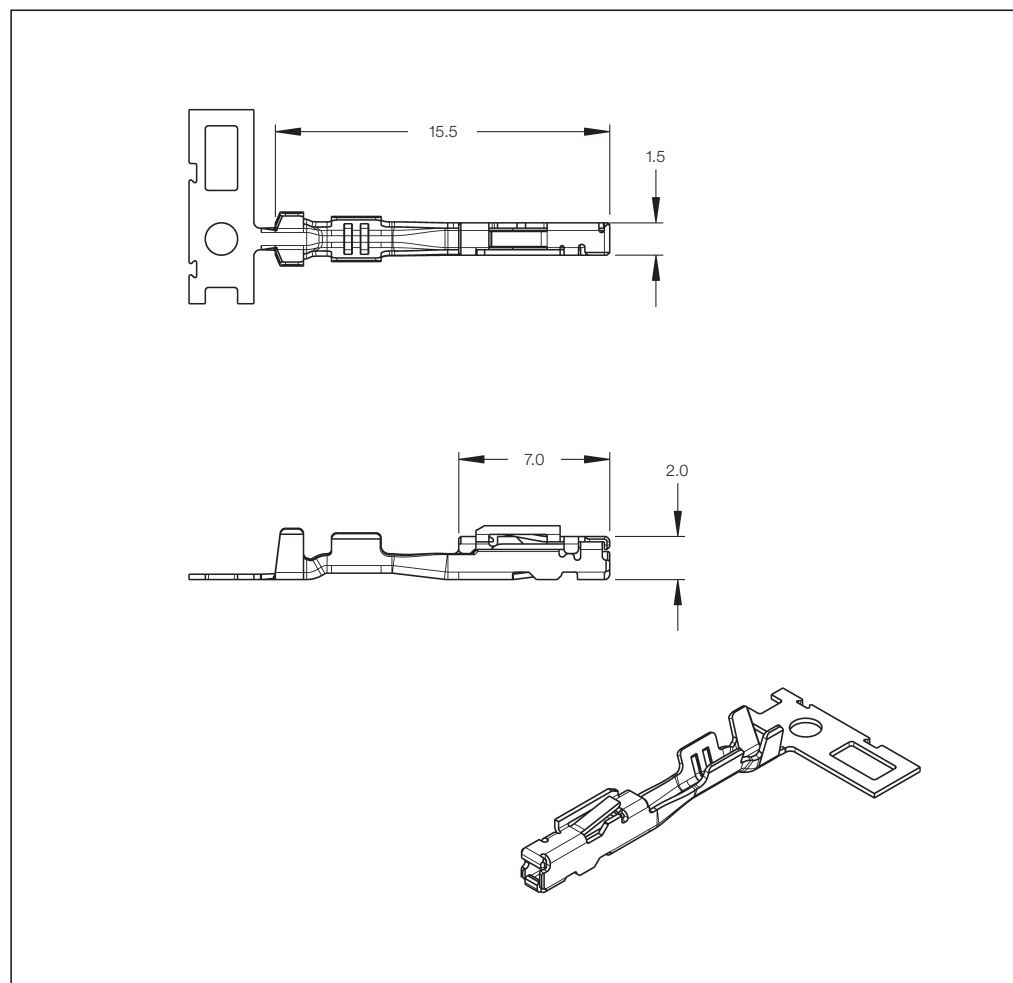
Contact Finish:
 Tin and gold plating

Material:
 Copper Alloy

Temperature Range:
 -40 °C up to +100 °C

Contact Retention Force:
 100 N (retainer block)

Application Specification:
 114-5250 & 114-15120 (for ISO wire)



Receptacle Contacts

Wire Size Range (mm ²)	Insulation Diameter (mm)	Material and Finish	Part Numbers			
			Strip Form	Package Quantity	Applicator	Hand Tool with Die Set
0.22–0.50	0.95–1.70	Copper alloy, pre-tin plated	1674298-1	10,000	x-1528438-x	1463260-1
0.22–0.50	0.95–1.70	Gold plated (0.8 µm)	1801069-2	10,000	Applicator restricted	1463260-1
0.22–0.50	0.95–1.70	Gold plated (0.38 µm)	1123343-2	10,000	x-1528240-x	1463260-1
0.50–0.75**	1.30–1.70	Gold plated (0.8 µm)	1801248-2*	10,000	on request	–

*) Recommended for Airbag Applications (0.5 mm²)

**) 0.75 mm² Application depending on Wire Function

Tab Contacts

Technical Features

TH/.025 Contacts

- One piece contact designed to minimize fretting corrosion
- Terminal lance design to optimize cavity dimension

TH/.025 Tab Contacts:

0.635 x 0.635 mm Pin

Insertion Force:

2.2 N max.

Contact Force:

2.8 N (at an early stage),
 2.0 N (after ageing)

Current Carrying Capacity:

5 A (to 7 A within some conditions)

Wire Size Range:

from 0.22 to 0.5 mm²

Contact Finish:

Tin plating

Material:

Brass

Temperature Range:

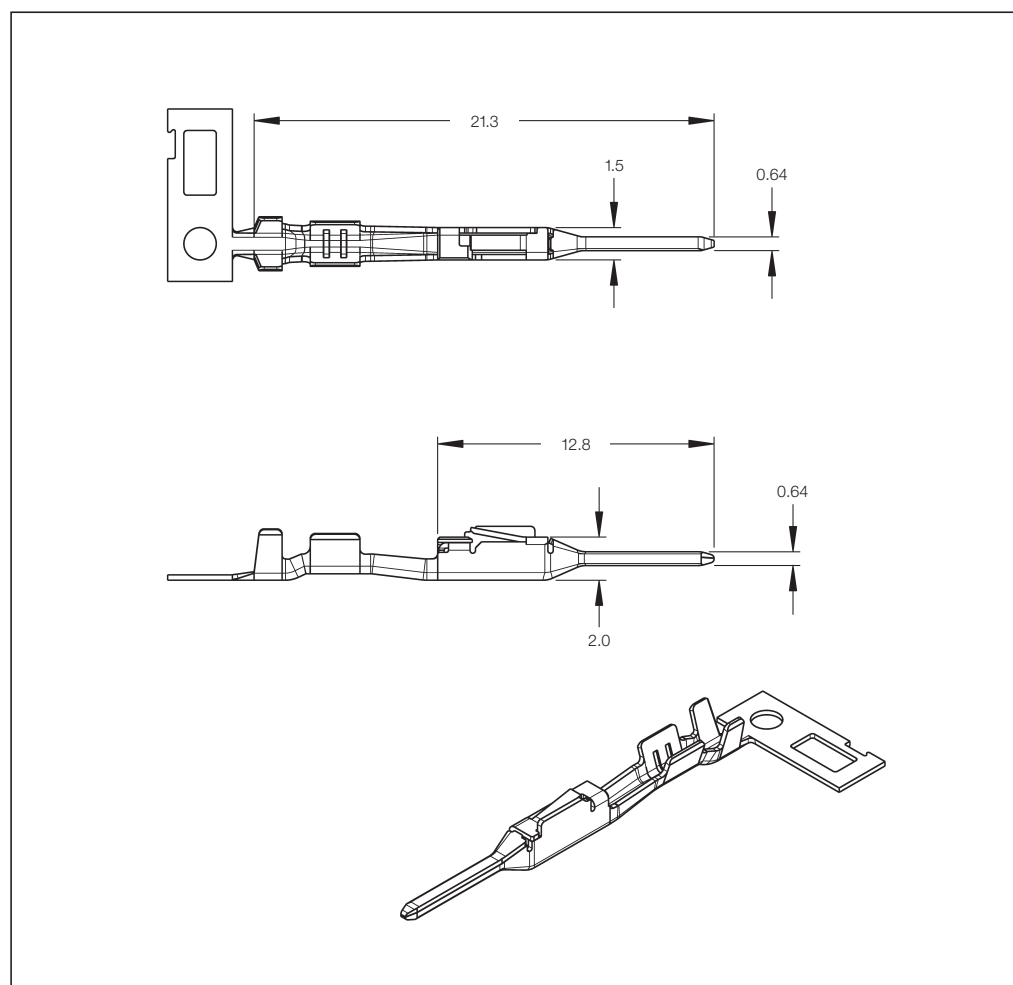
–40 °C up to +100 °C

Contact Retention Force:

100 N (retainer block)

Application Specification:

114-5302 & 114-15120 (for ISO wire)



Tab Contacts

Wire Size Range (mm ²)	Insulation Diameter (mm)	Material and Finish	Part Numbers			
			Strip Form	Package Quantity	Applicator	Hand Tool with Die Set
0.35–0.50	1.1–1.7	Brass, tin plated	1674742-1	10,000	x-1528265-x	1463260-1

Receptacle Housings

Technical Features

- Compact design with 2.2 mm pitch

Temperature Range:
 –40 °C up to +100 °C

Secondary Lock:
 Hinged Lid

Dielectric Strength:
 1000 V AC / 1 min.

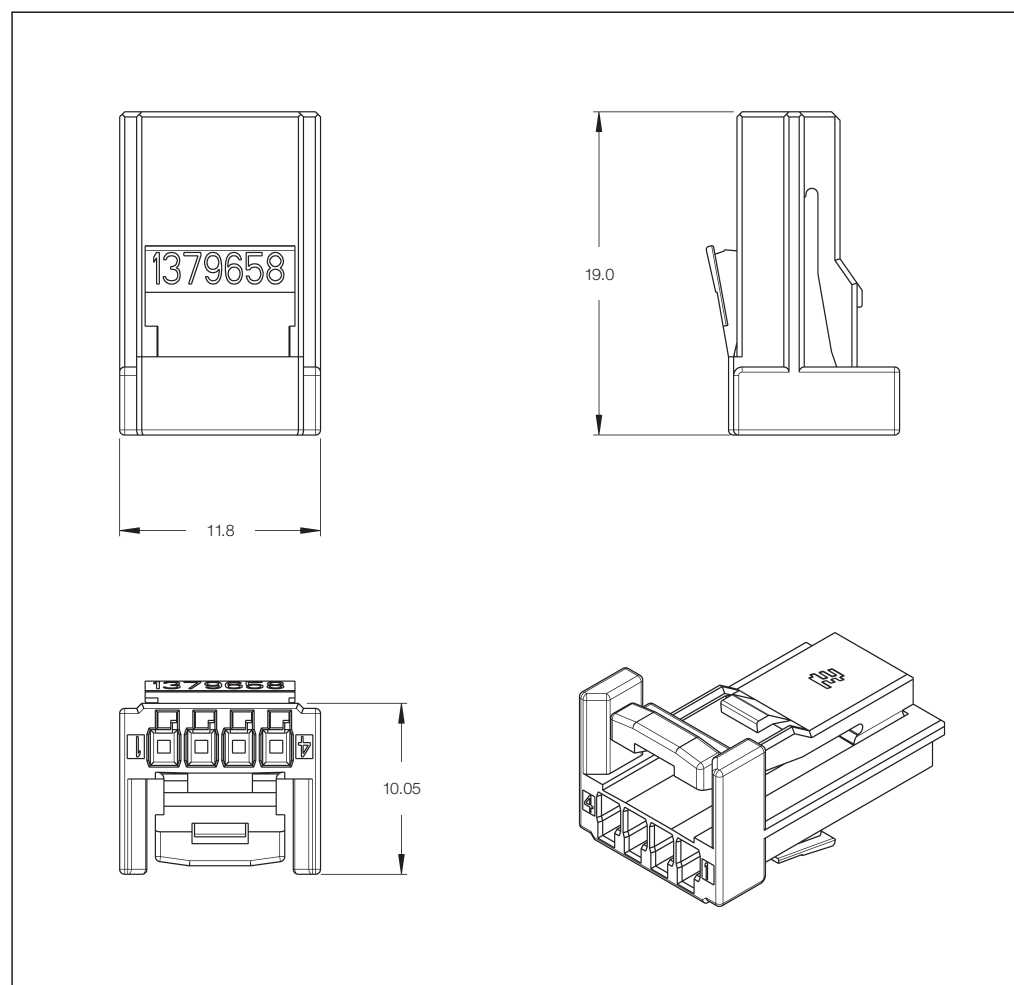
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-15299

Application Specification:
 411-15672



4 Position (1 Row) Receptacle Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Receptacle Housing	Package Quantity	Mating Tab Housing
4 (1 Row)	PBT	1	Black	1379658-1	900	1379674-1
		2	Gray	1379658-2	900	1379674-2

Receptacle Housings

Technical Features

- Compact design with 2.2 mm pitch
- Two Parts (Housing + Retainer Block) = 1 Piece

Temperature Range:
 –40 °C up to +100 °C

Secondary Lock:
 Housing Retainer Block

Dielectric Strength:
 1000 V AC / 1 min.

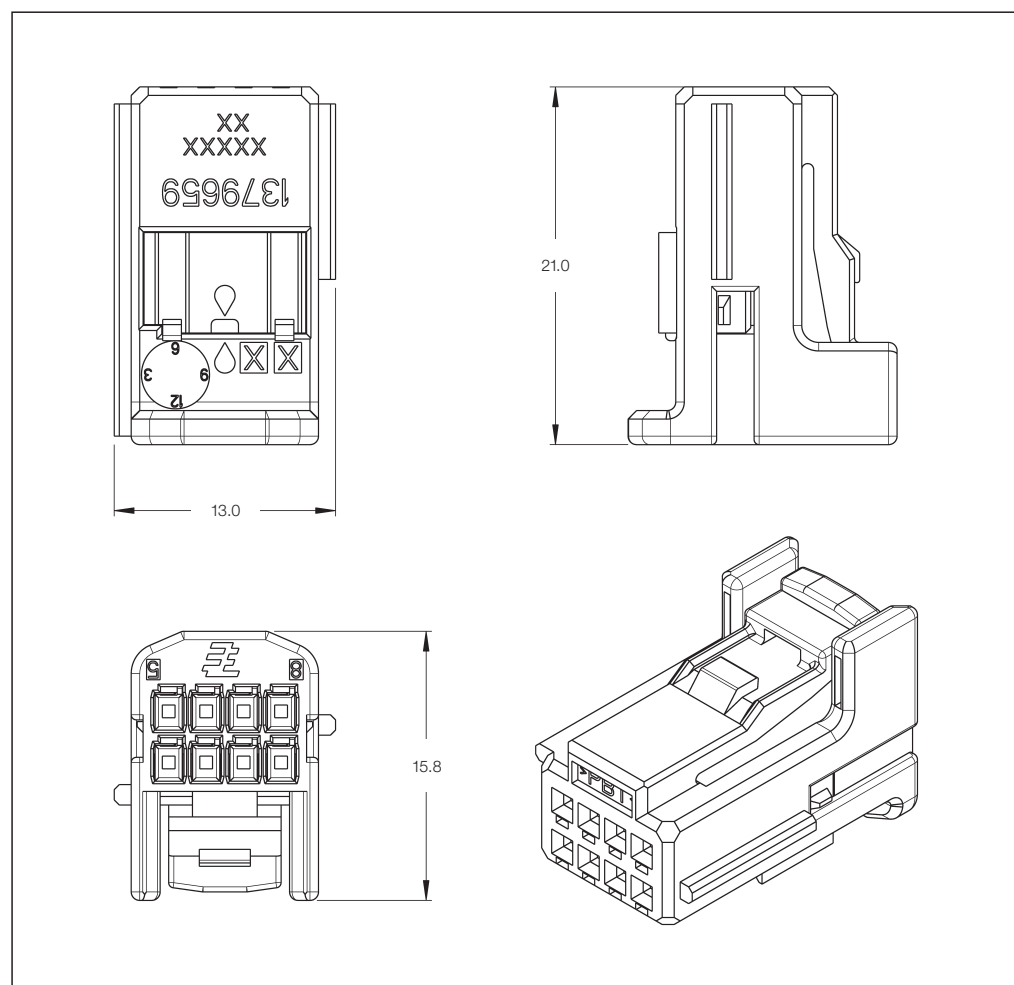
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-15299

Application Specification:
 411-15672



8 Position (2 Rows) Receptacle Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Receptacle Housing	Package Quantity	Mating Tab Housing
8 (2 Rows)	PBT	1	Black	1379659-1	1,100	–
		2	Gray	1379659-2	1,100	–
		3	Blue	1379659-3	1,100	–
		4	Green	1379659-4	1,100	–
		Neutral	Natural	1379659-5	1,100	1565804-2*

*) Japanese Version

Receptacle Housings

Technical Features

- Compact design with 2.2 mm pitch
- Two Parts (Housing + Retainer Block) = 1 Piece

Temperature Range:
 –40 °C up to +100 °C

Secondary Lock:
 Housing Retainer Block

Dielectric Strength:
 1000 V AC / 1 min.

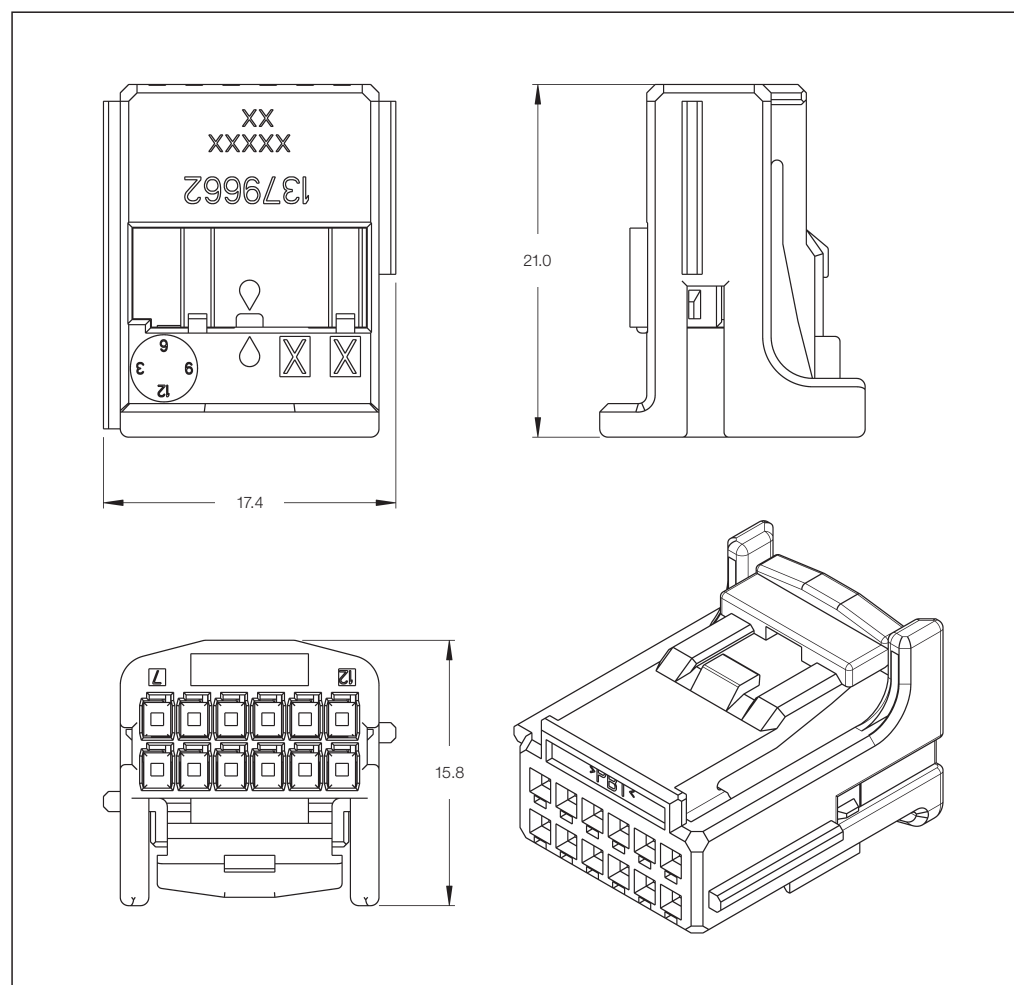
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-15299

Application Specification:
 411-15672



12 Position (2 Rows) Receptacle Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Receptacle Housing	Package Quantity	Mating Tab Housing
12 (2 Rows)	PBT	1	Black	1379662-1	800	1379675-1
		2	Gray	1379662-2	800	1379675-2
		Neutral	Natural	1379662-5	800	–

Receptacle Housings

Technical Features

- Compact design with 2.2 mm pitch
- Two Parts (Housing + Retainer Block) = 1 Piece

Temperature Range:
 –40 °C up to +100 °C

Secondary Lock:
 Housing Retainer Block

Dielectric Strength:
 1000 V AC / 1 min.

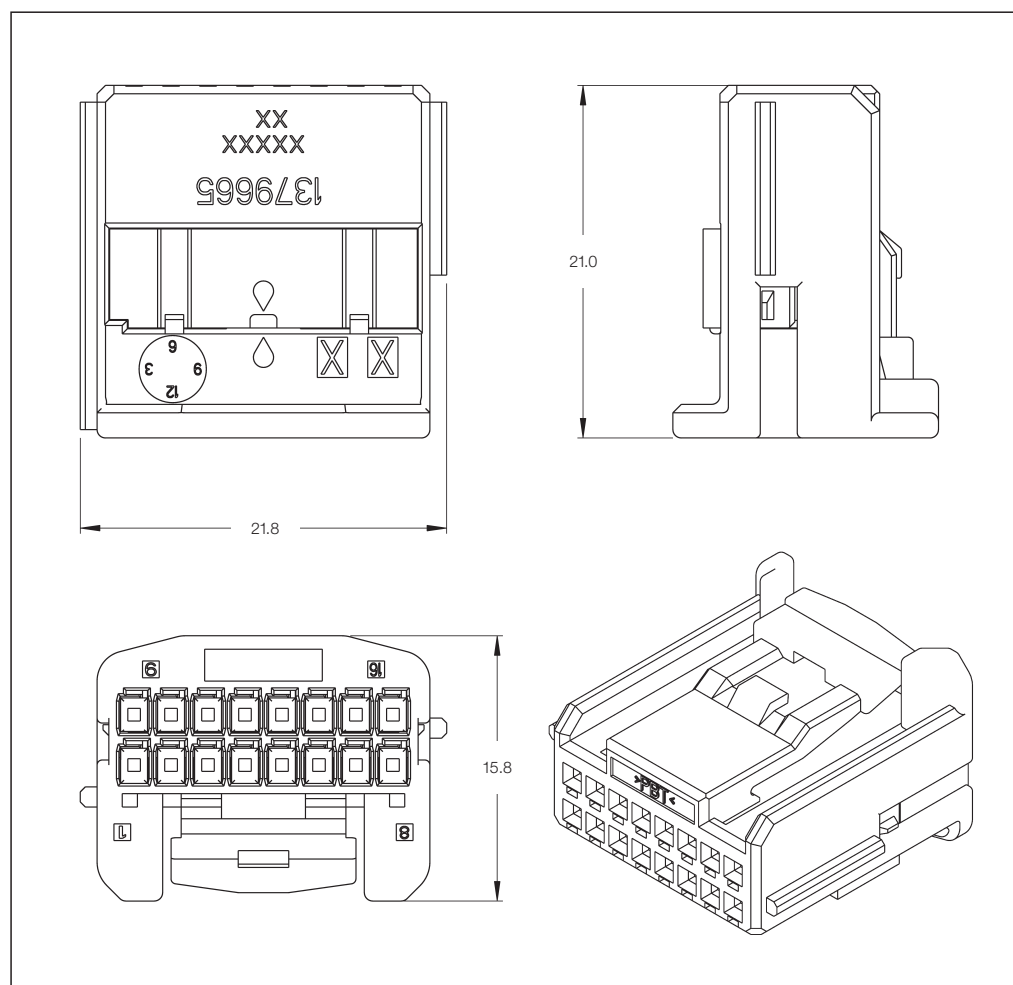
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-15299

Application Specification:
 411-15672



16 Position (2 Rows) Receptacle Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Receptacle Housing	Package Quantity	Mating Tab Housing
16 (2 Rows)	PBT	1	Black	1379665-1	700	1379678-1
		2	Gray	1379665-2	700	1379678-2
		3	Blue	1379665-3	700	–
		4	Green	1379665-4	700	–
		Neutral	Natural	1379665-5	700	–

Receptacle Housings

Technical Features

- Compact design with 2.2 mm pitch
- Two Parts (Housing + Retainer Block) = 1 Piece

Temperature Range:
 –40 °C up to +100 °C

Secondary Lock:
 Housing Retainer Block

Dielectric Strength:
 1000 V AC / 1 min.

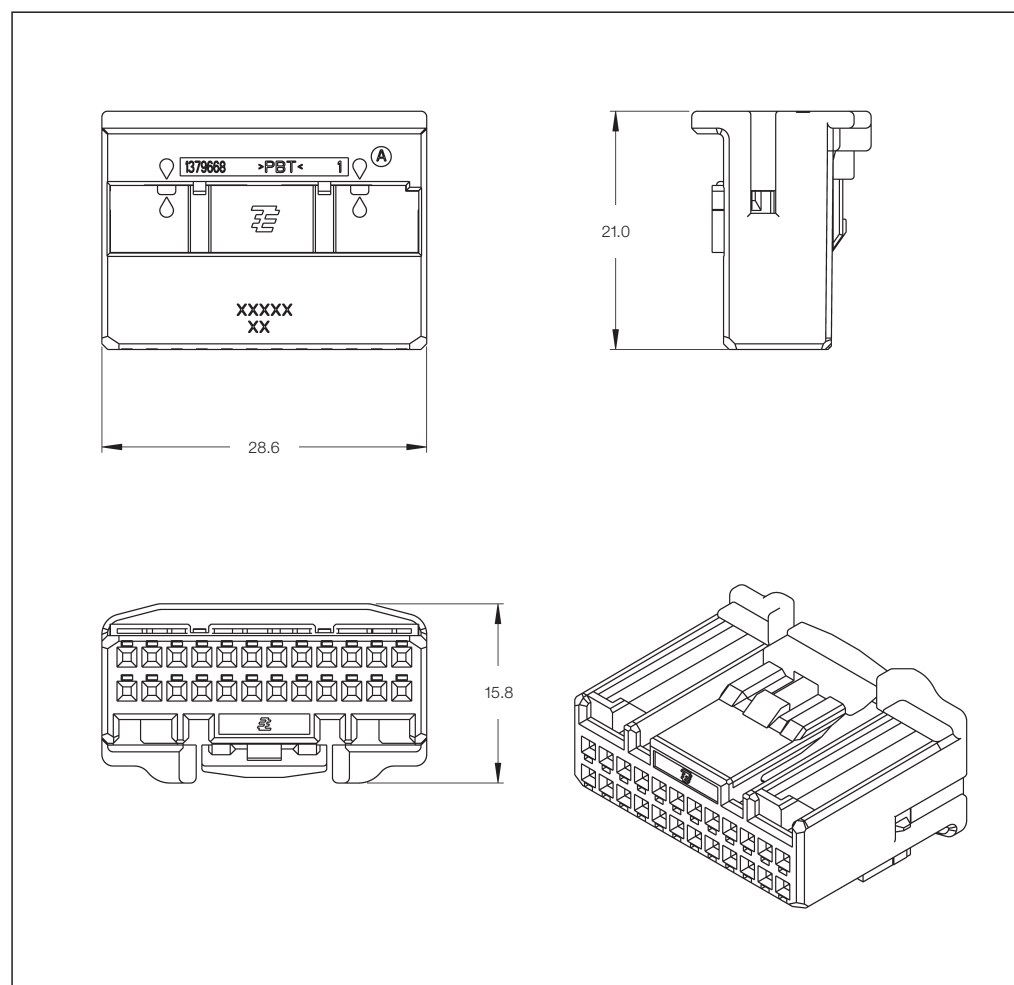
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-15299

Application Specification:
 411-15672



24 Position (2 Rows) Receptacle Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Receptacle Housing	Package Quantity	Mating Tab Housing
24 (2 Rows)	PBT	1	Black	1379668-1	500	1379681-1
		2	Gray	1379668-2	500	1379681-2
		Neutral	Natural	1379668-5	500	–

Receptacle Housings

Technical Features

- Compact design with 2.2 mm pitch
- Two Parts (Housing + Retainer Block) = 1 Piece

Temperature Range:
–40 °C up to +100 °C

Secondary Lock:
Housing Retainer Block

Dielectric Strength:
1000 V AC / 1 min.

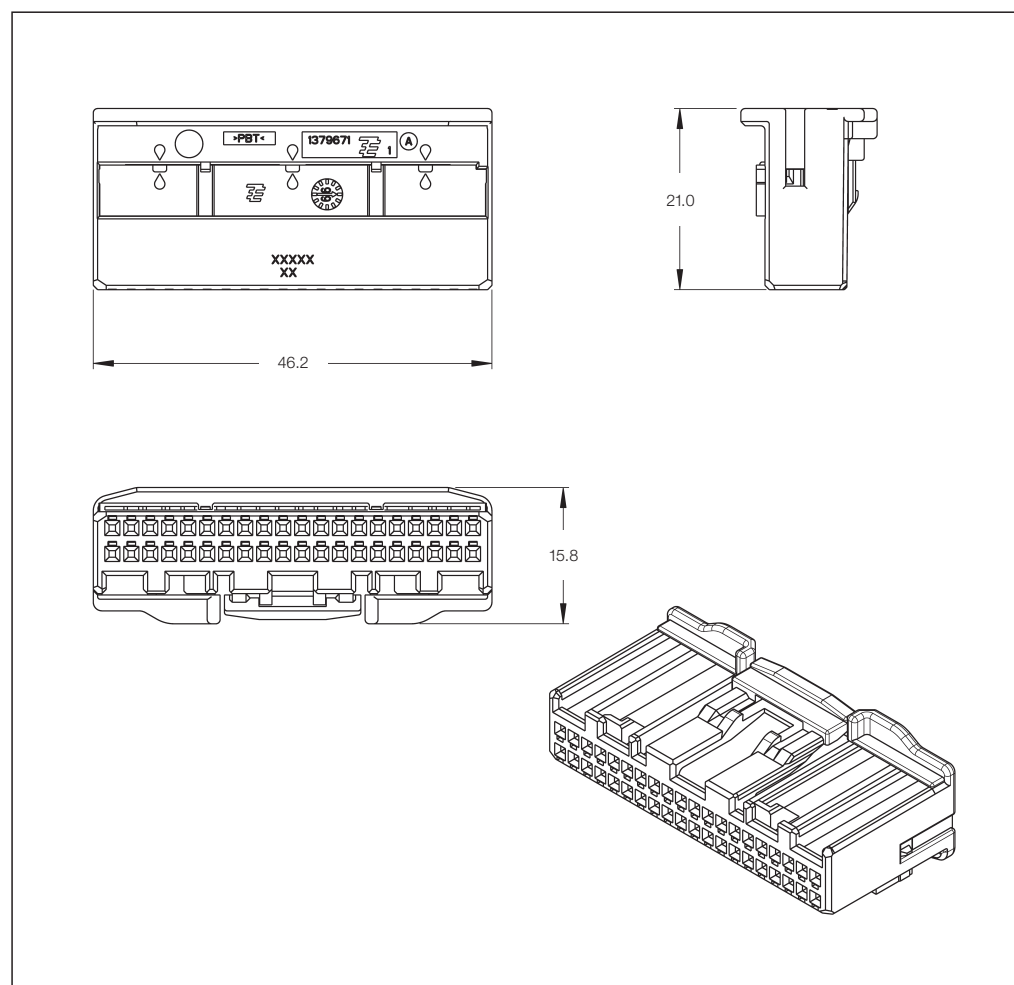
Insulation Resistance:
>100 MΩ

Housing Material:
PBT

Connector Mating Force:
Max. 100 N

Product Specification:
108-15299

Application Specification:
411-15672



40 Position (2 Rows) Receptacle Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Receptacle Housing	Package Quantity	Mating Tab Housing
40 (2 Rows)	PBT	1	Black	1379671-1	400	–
		2	Gray	1379671-2	400	–
		3	Blue	1379671-3	400	–
		4	Green	1379671-4	400	–
		Neutral	Natural	1379671-5	400	–

Tab Housings

Technical Features

- Compact design with 2.2 mm pitch

Temperature Range:
 –40 °C up to +100 °C

Secondary Lock:
 Hinged Lid

Dielectric Strength:
 1000 V AC / 1 min.

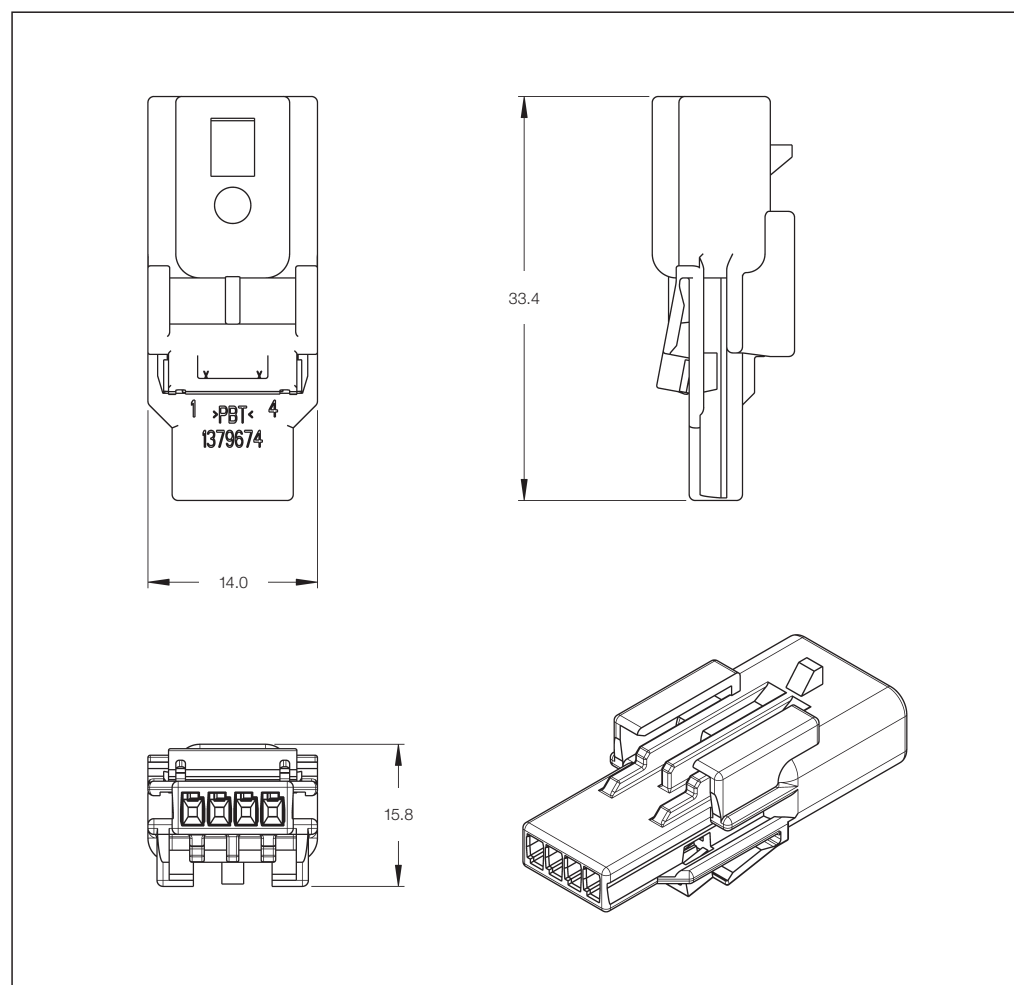
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-15299

Application Specification:
 411-15672



4 Position (1 Row) Tab Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Tab Housing	Package Quantity	Mating Receptacle Housing
4 (1 Row)	PBT	1	Black	1379674-1	800	1379658-1
		2	Gray	1379674-2	800	1379658-2

Tab Housings

Technical Features

- 2.2 mm pitch
(Japanese Version)
- Two Parts (Housing + Retainer Block) = 1 Piece

Temperature Range:
 -40 °C up to +100 °C

Secondary Lock:
 Housing Retainer Block

Dielectric Strength:
 1000 V AC / 1 min.

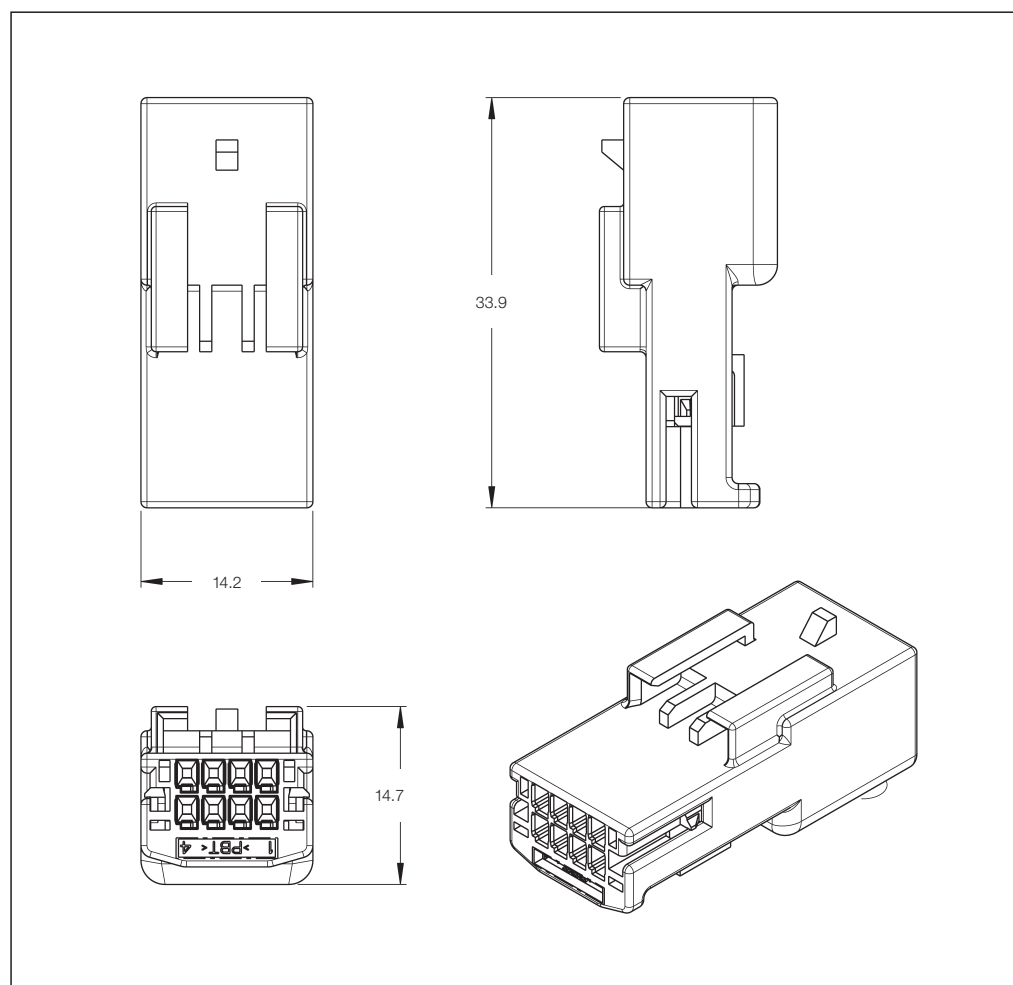
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-5787

Application Specification:
 411-78011



8 Position (2 Rows) Tab Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Tab Housing	Package Quantity	Mating Receptacle Housing
8 (2 Rows)	PBT	Neutral	Natural	1565804-2	200	1379659-5

Tab Housings

Technical Features

- Compact design with 2.2 mm pitch
- Two Parts (Housing + Retainer Block) = 1 Piece

Temperature Range:
 –40 °C up to +100 °C

Secondary Lock:
 Housing Retainer Block

Dielectric Strength:
 1000 V AC / 1 min.

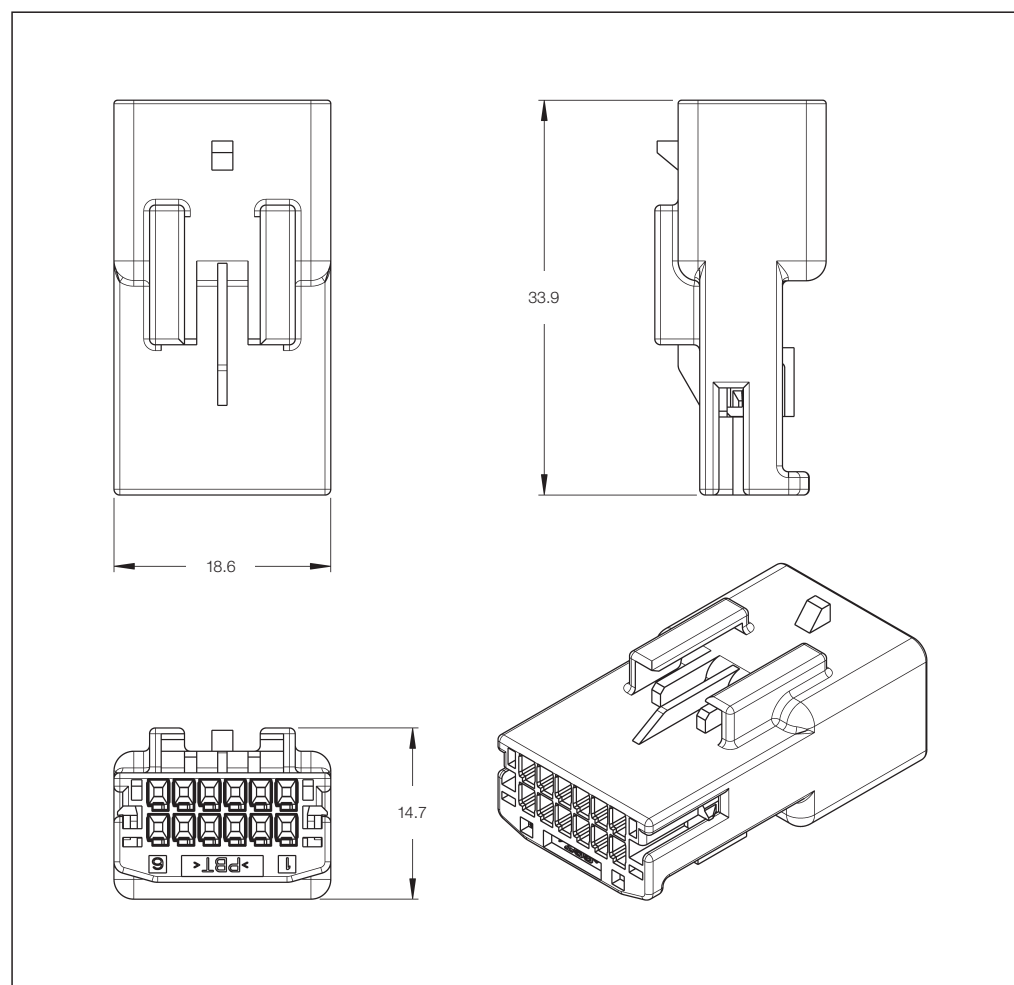
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-15299

Application Specification:
 411-15672



12 Position (2 Rows) Tab Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Tab Housing	Package Quantity	Mating Receptacle Housing
12 (2 Rows)	PBT	1	Black	1379675-1	500	1379662-1
		2	Gray	1379675-2	500	1379662-2

Tab Housings

Technical Features

- Compact design with 2.2 mm pitch
- Two Parts (Housing + Retainer Block) = 1 Piece

Temperature Range:
 –40 °C up to +100 °C

Secondary Lock:
 Housing Retainer Block

Dielectric Strength:
 1000 V AC / 1 min.

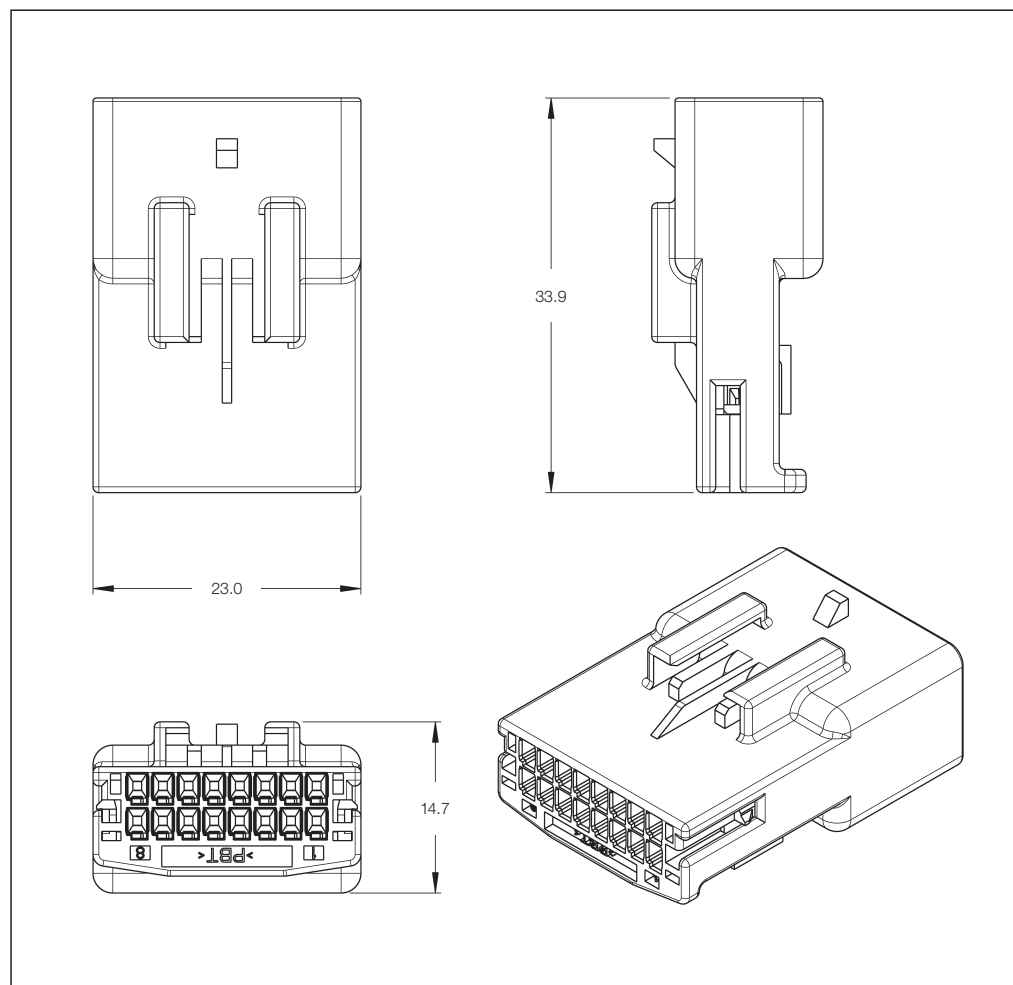
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-15299

Application Specification:
 411-15672



16 Position (2 Rows) Tab Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Tab Housing	Package Quantity	Mating Receptacle Housing
16 (2 Rows)	PBT	1	Black	1379678-1	400	1379665-1
		2	Gray	1379678-2	400	1379665-2

Tab Housings

Technical Features

- Compact design with 2.2 mm pitch
- Two Parts (Housing + Retainer Block) = 1 Piece

Temperature Range:
 –40 °C up to +100 °C

Secondary Lock:
 Housing Retainer Block

Dielectric Strength:
 1000 V AC / 1 min.

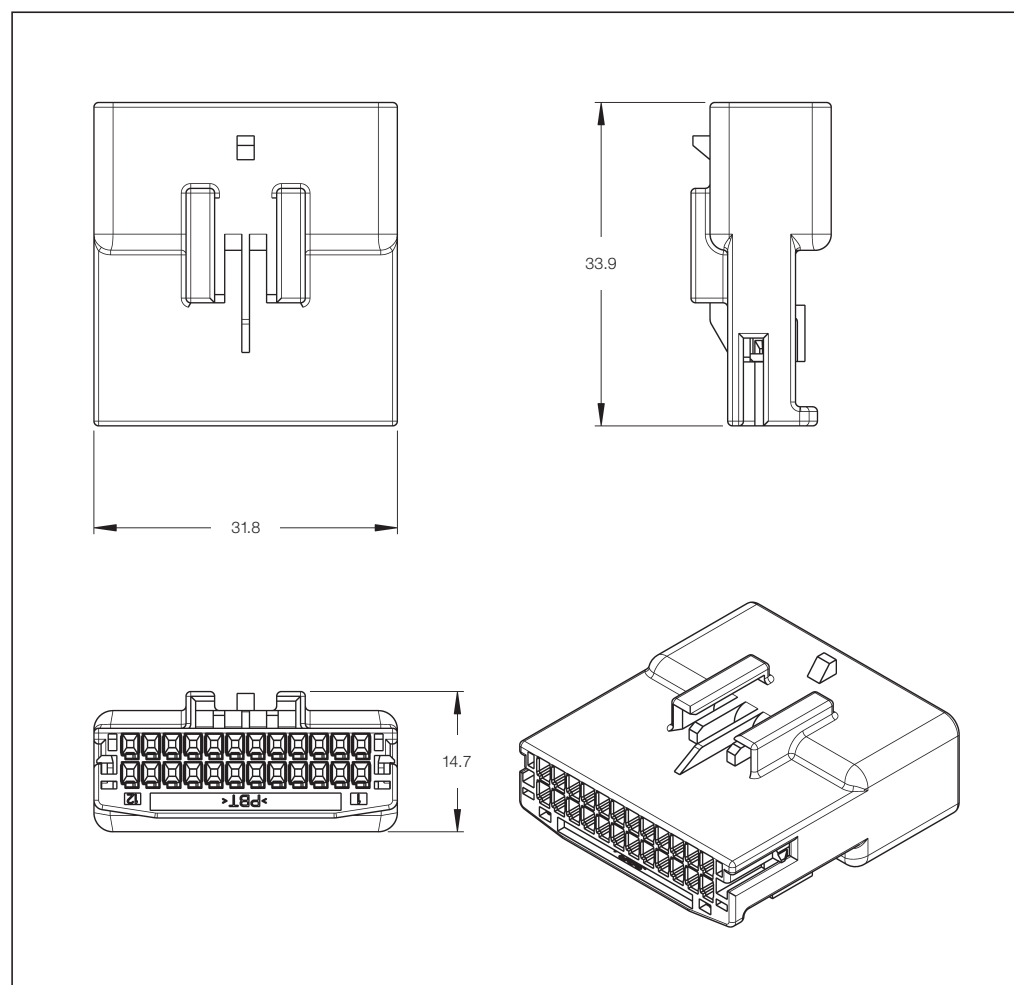
Insulation Resistance:
 >100 MΩ

Housing Material:
 PBT

Connector Mating Force:
 Max. 60 N

Product Specification:
 108-15299

Application Specification:
 411-15672



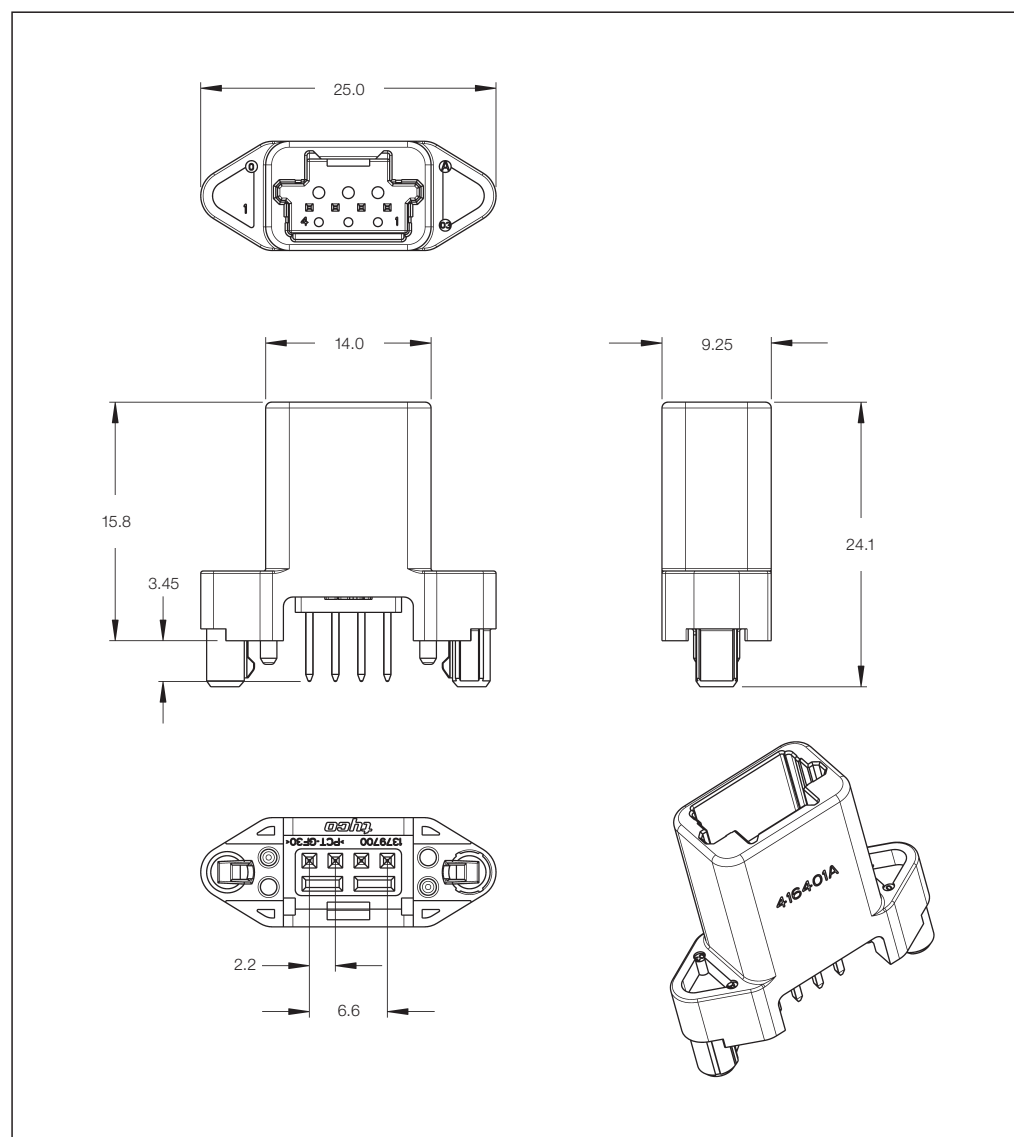
24 Position (2 Rows) Tab Housings

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers		
				Tab Housing	Package Quantity	Mating Receptacle Housing
24 (2 Rows)	PBT	1	Black	1379681-1	300	1379668-1
		2	Gray	1379681-2	300	1379668-2

Headers – Vertical Type

Technical Features

- Compact design with 2.2 mm pitch
- Designed for Reflow Leadfree Process
- PCT Raw Material
- Board Locks
- Locating Pin (PCB Mechanical Coding)
- Pin Material: Bronze
- Product Specification: 108-15326



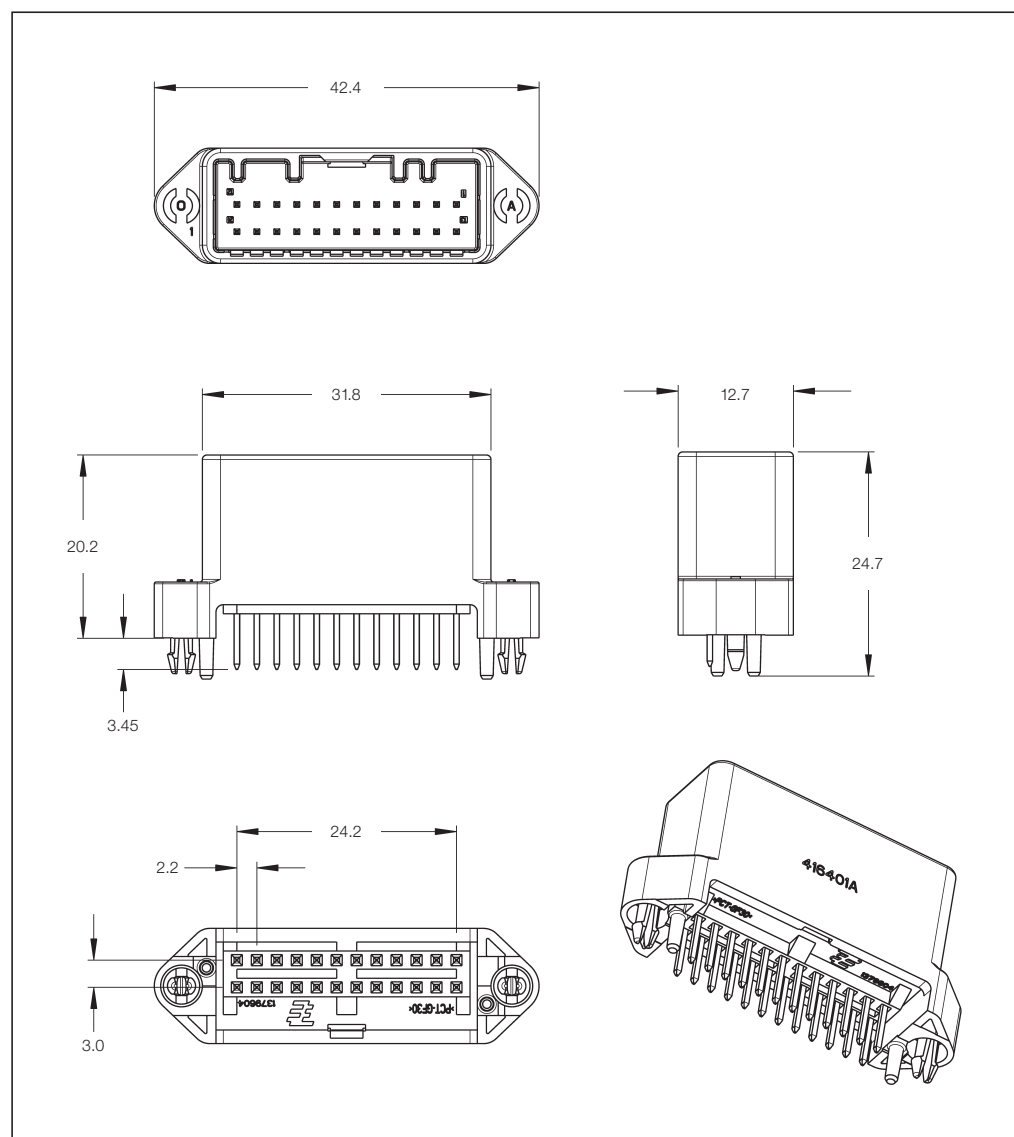
4 Position Straight Header – Vertical Type

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers			
				Header	Package Quantity	Packaging	Mating Receptacle Housing
4	PCT	1	Black	1379700-1	1440	Tray	1379658-1

Headers – Vertical Type

Technical Features

- Compact design with 2.2 mm pitch
- Designed for Reflow Leadfree Process
- PCT Raw Material
- Board Locks
- Locating Pin (PCB Mechanical Coding)
- Pin Material: Bronze
- Product Specification: 108-15326



24 Position Straight Header – Vertical Type

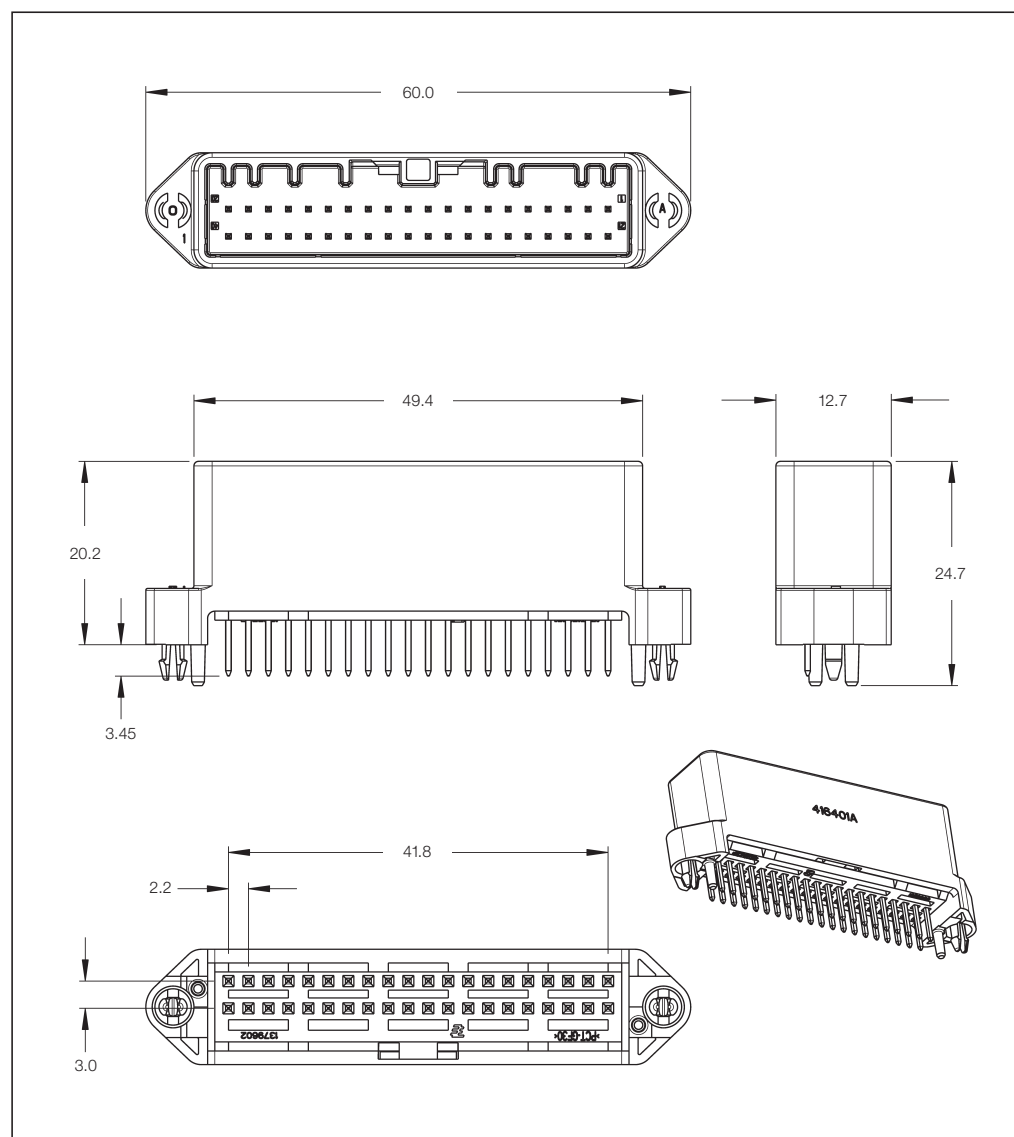
No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers			
				Header	Package Quantity	Packaging	Mating Receptacle Housing
24	PCT	1	Black	1379604-1	650	Tray	1379668-1
		2	Gray	1379604-2	650	Tray	1379668-2

Other designs available.

Headers – Vertical Type

Technical Features

- Compact design with 2.2 mm pitch
- Designed for Reflow Leadfree Process
- PCT Raw Material
- Board Locks
- Locating Pin (PCB Mechanical Coding)
- Pin Material: Bronze
- Product Specification: 108-15326



40 Position Straight Header – Vertical Type

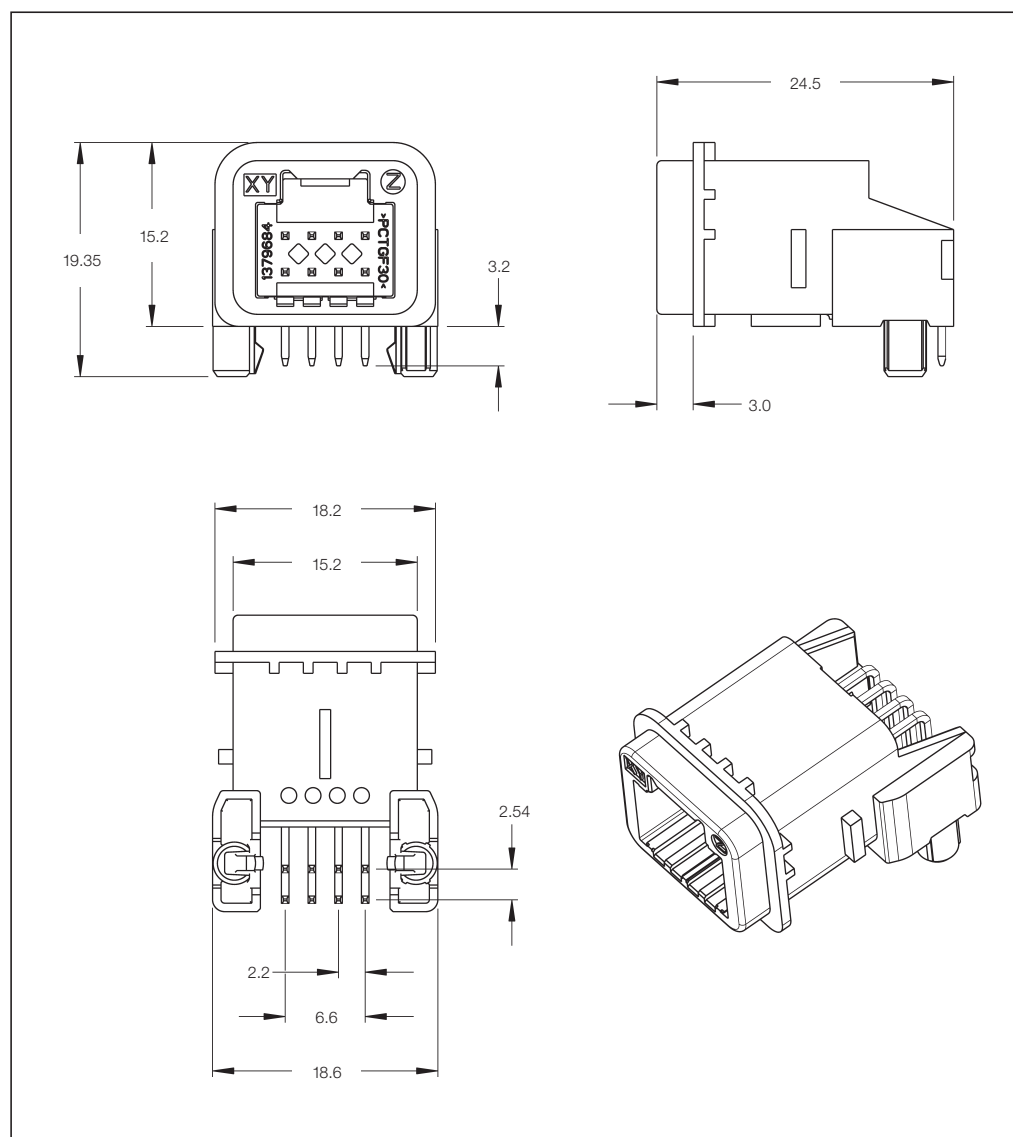
No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers			
				Header	Package Quantity	Packaging	Mating Receptacle Housing
40	PCT	1	Black	1-1379602-1	390	Tray	1379671-1
		2	Gray	1-1379602-2	390	Tray	1379671-2
		4	Green	1-1379602-4	390	Tray	1379671-4

Other designs available.

Headers – Horizontal Type

Technical Features

- Compact design with 2.2 mm pitch
- Designed for Reflow Leadfree Process
- PCT Raw Material
- Board Locks
- Locating Pin (PCB Mechanical Coding)
- Pin Material: Bronze
- Product Specification: 108-15383



8 Position Right-Angle Header – Horizontal Type

No. of Positions	Housing Material	Keying Options	Housing Color	Part Numbers			
				Header	Package Quantity	Packaging	Mating Receptacle Housing
8	PCT	1	Black	1379684-1	1,210	Tray	1379659-1
		2	Gray	1379684-2	1,100	Special Tray	1379659-2
		3	Blue	1379684-3	1,100	Special Tray	1379659-3
		1	Black	1379684-4	1,600	Tubes	1379659-1
		2	Gray	1379684-5	1,600	Tubes	1379659-2
		3	Blue	1379684-6	1,600	Tubes	1379659-3
		3	Blue	1379684-7	1,210	Tray	1379659-3
		1	Black	1-1379684-1	1,100	Special Tray	1379659-1