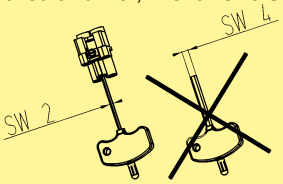
Contents

Features

- Compact design with axial screw terminal
- 16 coding options
- For hoods/housings size Han® 3 A
- Finger protected male and female contacts
- Assembly without special tool

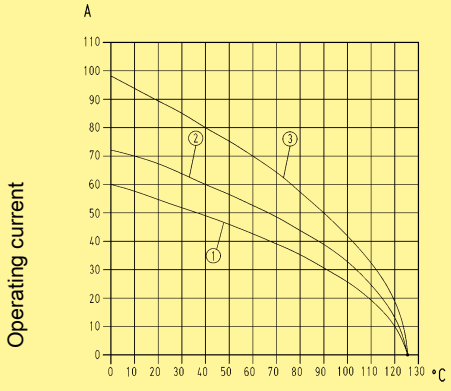
Attention

- For termination please use only hexagonal screw driver with wrench size SW 2.
- If PE contact is not used:
  Please screw the PE contact maximal on both sides clockwise with a hexagonal screwdriver, wrench size SW 2.



Current carrying capacity

The current carrying capacity of the connectors is limited by the thermal load capability of the contact element material including the connections and the insulating parts. The derating curve is therefore valid for currents which flow constantly (non-intermittent) through each contact element of the connector evenly, without exceeding the allowed maximum temperature.
Measuring and testing techniques according to DIN EN 60 512-5



Ambient temperature

Wire gauge:
① 4 mm²
② 6 mm²
③ 10 mm²

Technical characteristics

Specifications	DIN VDE 0110 DIN EN 61 984
Approvals	

Inserts

Number of contacts	2 + PE
Electrical data	
acc. to EN 61 984	**40 A 400 V 6 kV 3**
Rated current	40 A
Rated voltage	400 V
Rated impulse voltage	6 kV
Pollution degree	3
Rated voltage	
acc. to UL/CSA	600 V
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Mechanical working life	
- mating cycles	≥ 500

Contacts

Material	copper alloy
Surface	
- hard-silver plated	3 µm Ag
Contact resistance	≤ 1 mΩ
Axial screw termination	
- mm²	4 ... 6 mm² (10 mm optional)
- AWG	12 ... 10 (8 optional)
Tightening tourque	1.8 Nm
Stripping length	8 mm $^{+1}$

Hoods/Housings

Selection of hoods/housings	see chapter 30 / chapter 31

Plastic hoods/housings

Material	polycarbonate
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529 for coupled connector	IP 67

Hoods/Housings, metal

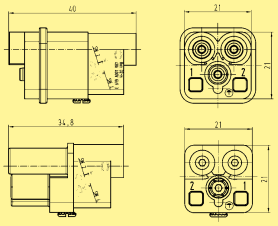
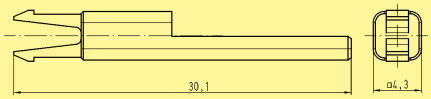
Material	zinc die-cast
Degree of protection acc. to DIN EN 60 529 for coupled connector	IP 44 IP 67 is achieved with seal screw 09 20 000 9918

Accessories

Cable clamps	chapter 40
Sealing screw	chapter 40

Number of contacts

2 + ⏚

Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Axial screw terminal	**09 12 002 2651**	**09 12 002 2751**		
Coding element	**09 12 000 9922**	**09 12 000 9922**		

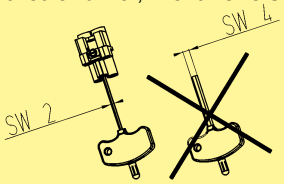
Identification	Part number	Drawing	Dimensions in mm
Hex key SW 2 for axial setscrew			
with grip	**09 99 000 0313**		
adapter 1/4“	**09 99 000 0369**		

Features

- Compact design with axial screw terminal
- 16 coding options
- For hoods/housings size Han® 3 A
- Finger protected male and female contacts
- For high voltages please use heat shrink tube (included in delivery range)

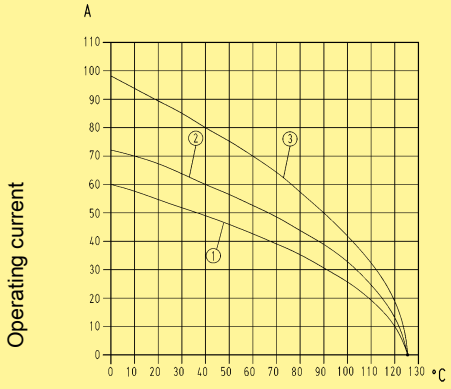
Attention

- For termination please use only hexagonal screw driver with wrench size SW 2.
- If PE contact is not used:
  Please screw the PE contact maximal on both sides clockwise with a hexagonal screwdriver, wrench size SW 2.



Current carrying capacity

The current carrying capacity of the connectors is limited by the thermal load capability of the contact element material including the connections and the insulating parts. The derating curve is therefore valid for currents which flow constantly (non-intermittent) through each contact element of the connector evenly, without exceeding the allowed maximum temperature.
Measuring and testing techniques according to DIN EN 60 512-5



Ambient temperature

Wire gauge:
① 4 mm²
② 6 mm²
③ 10 mm²

Technical characteristics

Specifications	DIN VDE 0110 DIN EN 61 984
Approvals	c UL us

Inserts

Number of contacts	2 + PE
Electrical data	
acc. to EN 61 984	**40 A 830 V 6 kV 3**
Rated current	40 A
Rated voltage	830 V
Rated impulse voltage	6 kV
Pollution degree	3
Rated voltage	
acc. to UL/CSA	600 V
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Mechanical working life	
- mating cycles	≥ 500

Contacts

Material	copper alloy
Surface	
- hard-silver plated	3 µm Ag
Contact resistance	≤ 1 mΩ
Axial screw termination	
- mm²	4 ... 6 mm² (10 mm optional)
- AWG	12 ... 10 (8 optional)
Tightening tourque	1.8 Nm
Stripping length	8 mm +1

Hoods/Housings

Selection of hoods/housings	see chapter 30 / chapter 31

Plastic hoods/housings

Material	polycarbonate
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529 for coupled connector	IP 67

Hoods/Housings, metal

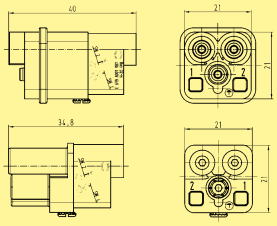
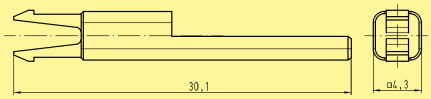
Material	zinc die-cast
Degree of protection acc. to DIN EN 60 529 for coupled connector	IP 44 IP 67 is achieved with seal screw 09 20 000 9918

Accessories

Cable clamps	chapter 40
Sealing screw	chapter 40

Number of contacts

2 + ⏚

Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Axial screw terminal with heat shrink tube	**09 12 002 2652**	**09 12 002 2752**		
Coding element	**09 12 000 9922**	**09 12 000 9922**		

Identification	Part number	Drawing	Dimensions in mm
Hex key SW 2 for axial setscrew			
with grip	**09 99 000 0313**		
			
adapter 1/4“	**09 99 000 0369**		
			

Stock items in bold type

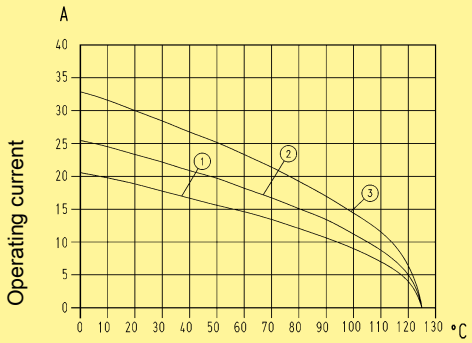
Features

- 5 contact chambers for crimp contacts of Han E® series
- Space-saving and compact design
- Leading protective ground with screw terminal
- Compatible with plastic and metal hoods of series Han® 3 A

Current carrying capacity

The current carrying capacity of the connectors is limited by the thermal load capability of the contact element material including the connections and the insulating parts. The derating curve is therefore valid for currents which flow constantly (non-intermittent) through each contact element of the connector evenly, without exceeding the allowed maximum temperature.

Measuring and testing techniques according to DIN EN 60 512-5



Ambient temperature

Wire gauge:
① 1.0 mm²
② 1.5 mm²
③ 2.5 mm²

Technical characteristics

Specifications	DIN VDE 0110 DIN EN 61 984
Approvals	c UL us

Inserts

Number of contacts	5 + PE
Electrical data	
acc. to EN 61 984	**16 A 230/400 V 4 kV 3**
Rated current	16 A
Rated voltage conductor - ground	230 V
Rated voltage conductor - conductor	400 V
Rated impulse voltage	4 kV
Pollution degree	3
Pollution degree 2 also	16 A 320/500 V 4 kV 2
Rated voltage	
acc. to UL/CSA	600 V
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Mechanical working life	
- mating cycles	≥ 500

Contacts

Material	copper alloy
Surface	
- hard-silver plated	3 µm Ag
- hard-gold plated	2 µm Au over 3 µm Ni
Contact resistance	≤ 1 mΩ
Crimp terminal	
- mm²	0.14 ... 2.5 mm²
- AWG	26 ... 14
PE screw terminal	
- mm²	2.5 mm²
- AWG	14

Hoods/Housings

Selection of hoods/housings	see chapter 30 / chapter 31

Plastic hoods/housings

Material	polycarbonate
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 67

Hoods/Housings, metal

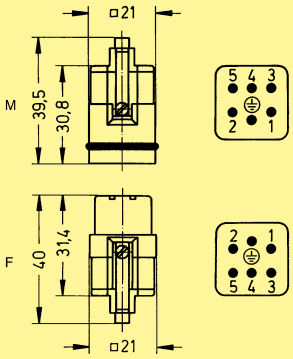
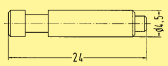
Material	zinc die-cast
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 44 IP 67 is achieved with seal screw 09 20 000 9918

Accessories

Crimping tools	chapter 99
Cable clamps	chapter 40
Sealing screw	chapter 40

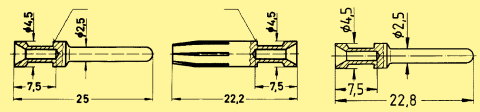
Number of contacts

5 + ⏚

Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Crimp terminal Order crimp contacts separately	**09 12 005 3001**	**09 12 005 3101**	 Contact arrangement view from termination side	
Coding pin		09 33 000 9954		Use of the coding pin prevents incorrect mating to other connectors of the same type. The male pin should be omitted from the opposing cavity in the male insert.

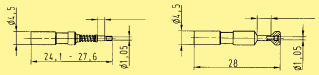
Han Q

Identification	Wire gauge (mm²)	Part number Male contact	Part number Female contact	Drawing	Dimensions in mm
Crimp contacts				Operating contact Identification / Relay contact	
Power contacts					
silver plated	0.14-0.37	09 33 000 6127	09 33 000 6227		
	0.5	**09 33 000 6121**	**09 33 000 6220**		
	0.75	**09 33 000 6114**	**09 33 000 6214**		
	1	**09 33 000 6105**	**09 33 000 6205**		
	1.5	**09 33 000 6104**	**09 33 000 6204**		
	2.5	**09 33 000 6102**	**09 33 000 6202**		
gold plated	0.14-0.37	09 33 000 6117	09 33 000 6217		
	0.5	**09 33 000 6122**	**09 33 000 6222**		
	0.75	**09 33 000 6115**	**09 33 000 6215**		
	1	**09 33 000 6118**	**09 33 000 6218**		
	1.5	**09 33 000 6116**	**09 33 000 6216**		
	2.5	**09 33 000 6123**	**09 33 000 6223**		
Relay contact silver plated	0.75-1	09 33 000 6109			
	1.5	09 33 000 6110			
	2.5	09 33 000 6111			
F.O. contacts				Crimp zone / Crimp zone	
for 1 mm plastic fibre		20 10 001 3311	20 10 001 3321		



Identification	Wire gauge		Stripping length
no groove	0.14-0.37 mm²	AWG 26-22	7.5 mm
no groove	0.5 mm²	AWG 20	7.5 mm
1 groove*	0.75 mm²	AWG 18	7.5 mm
1 groove	1 mm²	AWG 18	7.5 mm
2 grooves	1.5 mm²	AWG 16	7.5 mm
3 grooves	2.5 mm²	AWG 14	7.5 mm

* on the back crimp collar



Crimp contacts 0.14 ... 0.37 mm² only used with BUCHANAN crimping tool 09 99 000 0001

Stock items in bold type

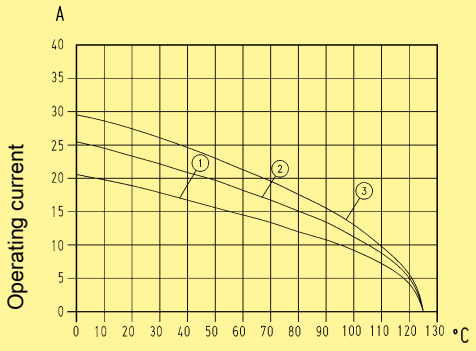
Features

- Innovative Han-Quick Lock® termination technology with up to 20% reduced wiring times
- Field assembly without special tools
- Compatible with Han® Q 5/0 standard inserts
- Compatible with plastic and metal hoods of series Han® 3 A
- Vibration and shock resistant

Current carrying capacity

The current carrying capacity of the connectors is limited by the thermal load capability of the contact element material including the connections and the insulating parts. The derating curve is therefore valid for currents which flow constantly (non-intermittent) through each contact element of the connector evenly, without exceeding the allowed maximum temperature.

Measuring and testing techniques according to DIN EN 60 512-5



Ambient temperature

Wire gauge:
① 1.0 mm²
② 1.5 mm²
③ 2.5 mm²

Technical characteristics

Specifications	DIN EN 60 664-1 DIN EN 61 984
Approvals	cULus

Inserts

Number of contacts	5 + PE
Electrical data	
acc. to EN 61 984	**16 A 230/400 V 4 kV 3**
Rated current	16 A
Rated voltage conductor - ground	230 V
Rated voltage conductor - conductor	400 V
Rated impulse voltage	4 kV
Pollution degree	3
Rated voltage	
acc. to UL/CSA	600 V
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Mechanical working life	
- mating cycles	≥ 500

Contacts

Material	copper alloy
Surface	
- hard-silver plated	3 µm Ag
Contact resistance	≤ 1 mΩ
Quick Lock termination	
- mm²	0.5 ... 2.5 mm²
- AWG	20 ... 14

Hoods/Housings

Selection of hoods/housings	see chapter 30 / chapter 31

Plastic hoods/housings

Material	polycarbonate
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 67

Hoods/Housings, metal

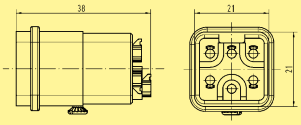
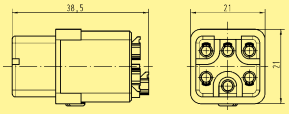
Material	zinc die-cast
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 44 IP 67 is achieved with seal screw 09 20 000 9918

Accessories

Cable clamps	chapter 40
Sealing screw	chapter 40

Number of contacts

5 + ⏚

Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Quick Lock termination Han-Quick Lock®	**09 12 005 2633**	**09 12 005 2733**	M  F 	

Stock items in bold type

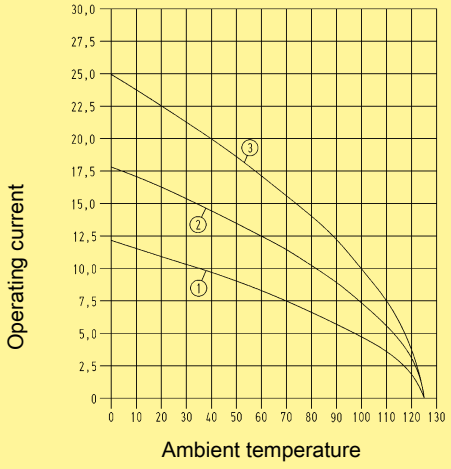
Features

- 7 contact chambers for crimp contacts of Han D® series
- Space-saving and compact design
- Leading protective ground with screw terminal
- Compatible with plastic and metal hoods of series Han® 3 A
- 6 different coding possibilities by means of coding pin

Current carrying capacity

The current carrying capacity of the connectors is limited by the thermal load capability of the contact element material including the connections and the insulating parts. The derating curve is therefore valid for currents which flow constantly (non-intermittent) through each contact element of the connector evenly, without exceeding the allowed maximum temperature.

Measuring and testing techniques according to DIN EN 60 512-5



Wire gauge:
① 0.75 mm²
② 1.5 mm²
③ 2.5 mm²

Technical characteristics

Specifications	DIN VDE 0110 DIN EN 61 984
Approvals	c UL us

Inserts

Number of contacts	7 + PE
Electrical data	
acc. to EN 61 984	**10 A 400 V 6 kV 3**
Rated current	10 A
Rated voltage	400 V
Rated impulse voltage	6 kV
Pollution degree	3
Pollution degree 2 also	10 A 400/690 V 6 kV 2
Rated voltage	
acc. to UL/CSA	600 V
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Mechanical working life	
- mating cycles	≥ 500

Contacts

Material	copper alloy
Surface	
- hard-silver plated	3 µm Ag
- hard-gold plated	2 µm Au over 3 µm Ni
Contact resistance	≤ 3 mΩ
Crimp terminal	
- mm²	0.14 ... 2.5 mm²
- AWG	26 ... 14
PE screw terminal	
- mm²	2.5 mm²
- AWG	14

Hoods/Housings

Selection of hoods/housings	see chapter 30 / chapter 31

Plastic hoods/housings

Material	polycarbonate
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 67

Hoods/Housings, metal

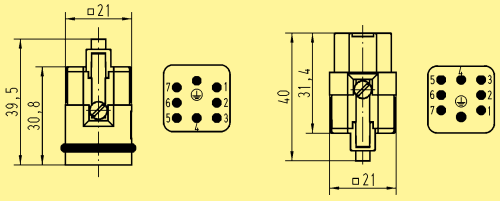
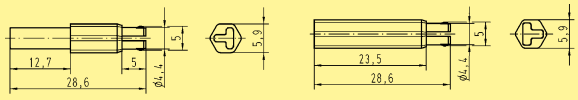
Material	zinc die-cast
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 44 IP 67 is achieved with seal screw 09 20 000 9918

Accessories

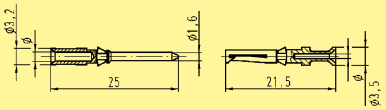
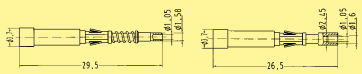
Crimping tools	chapter 99
Cable clamps	chapter 40
Sealing screw	chapter 40

Number of contacts

7 + ⏚

Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Crimp terminal Order crimp contacts separately	**09 12 007 3001**	**09 12 007 3101**	 Contact arrangement view from termination side	
Coding pins	09 12 000 9901	09 12 000 9902		

Han Q

Identification	Wire gauge (mm²)	Part number Male contact	Part number Female contact	Drawing	Dimensions in mm
Crimp contacts Power contacts silver plated	0.14-0.37	**09 15 000 6104**	**09 15 000 6204**		
	0.5	**09 15 000 6103**	**09 15 000 6203**		
	0.75	**09 15 000 6105**	**09 15 000 6205**		
	1	**09 15 000 6102**	**09 15 000 6202**		
	1.5	**09 15 000 6101**	**09 15 000 6201**		
	2.5*	**09 15 000 6106**	**09 15 000 6206**		
gold plated	0.14-0.37	**09 15 000 6124**	**09 15 000 6224**		
	0.5	**09 15 000 6123**	**09 15 000 6223**		
	0.75	**09 15 000 6125**	**09 15 000 6225**		
	1	**09 15 000 6122**	**09 15 000 6222**		
	1.5	**09 15 000 6121**	**09 15 000 6221**		
	2.5*	**09 15 000 6126**	**09 15 000 6226**		
F.O. contacts for 1 mm plastic fibre		20 10 001 3211	20 10 001 3221		

Wire gauge		∅	Stripping length
0.14-0.37 mm²	AWG 26-22	0.9	8 mm
0.5 mm²	AWG 20	1.1	8 mm
0.75 mm²	AWG 18	1.3	8 mm
1 mm²	AWG 18	1.45	8 mm
1.5 mm²	AWG 16	1.75	8 mm
2.5 mm²	AWG 14	2.25	6 mm

* Insert with crimp contacts 2.5 mm² partly loaded

Stock items in bold type

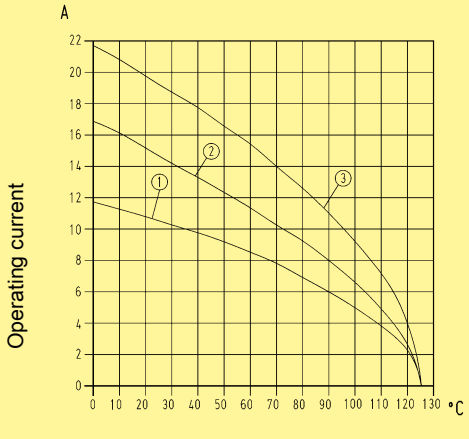
Features

- 12 contact chambers taking the control contacts of the series Han D® with crimp termination
- 1 PE contact with innovative Han-Quick Lock® termination technology
- 2 coding pins offering 16 cosing possibilities
- Inserts suitable for metal and plastic hoods and housings of the series Han® 3 A

Current carrying capacity

The current carrying capacity of the connectors is limited by the thermal load capability of the contact element material including the connections and the insulating parts. The derating curve is therefore valid for currents which flow constantly (non-intermittent) through each contact element of the connector evenly, without exceeding the allowed maximum temperature.

Measuring and testing techniques according to DIN EN 60 512-5



Wire gauge:
① 0.75 mm²
② 1.5 mm²
③ 2.5 mm²

Technical characteristics

Specifications	DIN VDE 0627 DIN VDE 0110 DIN EN 61 984
Approvals	c UL us

Inserts

Number of contacts	12 + PE
Electrical data	
acc. to EN 61 984	**10 A 400 V 6 kV 3**
Rated current	10 A
Rated voltage	400 V
Rated impulse voltage	6 kV
Pollution degree	3
Pollution degree 2 also	10 A 400/690 V 6 kV 2
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Mechanical working life	
- mating cycles	≥ 500

Contacts

Material	copper alloy
Surface	
- hard-silver plated	3 µm Ag
- hard-gold plated	2 µm Au over 3 µm Ni
Contact resistance	≤ 3 mΩ
Crimp terminal	
- mm²	0.14 ... 2.5 mm²
- AWG	26 ... 14
PE contact	Quick Lock termination
- mm²	0.5 ... 2.5 mm²
- AWG	20 ... 14

Hoods/Housings

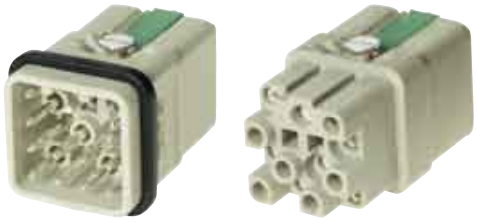
Selection of hoods/housings	see chapter 30 / chapter 31
Plastic hoods/housings	
Material	polycarbonate
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 67
Hoods/Housings, metal	
Material	zinc die-cast
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 44 IP 67 is achieved with seal screw 09 20 000 9918

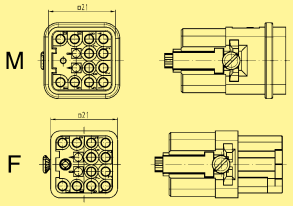
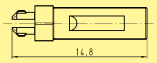
Accessories

Crimping tools	chapter 99
Cable clamps	chapter 40
Sealing screw	chapter 40

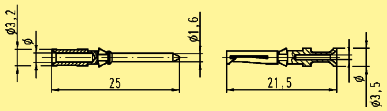
Number of contacts

12 + ⏚



Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Crimp terminal Order crimp contacts separately PE contact: Quick Lock termination Han-Quick Lock®	**09 12 012 3001**	**09 12 012 3101**		
Coding pins 	**09 12 000 9924**	**09 12 000 9924**		

Han Q

Identification	Wire gauge (mm²)	Part number Male contact	Part number Female contact	Drawing	Dimensions in mm
Crimp contacts Power contacts silver plated 	0.14-0.37	**09 15 000 6104**	**09 15 000 6204**		
	0.5	**09 15 000 6103**	**09 15 000 6203**		
	0.75	**09 15 000 6105**	**09 15 000 6205**		
	1	**09 15 000 6102**	**09 15 000 6202**		
	1.5	**09 15 000 6101**	**09 15 000 6201**		
	2.5	**09 15 000 6106**	**09 15 000 6206**		
gold plated 	0.14-0.37	**09 15 000 6124**	**09 15 000 6224**		
	0.5	**09 15 000 6123**	**09 15 000 6223**		
	0.75	**09 15 000 6125**	**09 15 000 6225**		
	1	**09 15 000 6122**	**09 15 000 6222**		
	1.5	**09 15 000 6121**	**09 15 000 6221**		
	2.5	**09 15 000 6126**	**09 15 000 6226**		

Wire gauge		∅	Stripping length
0.14-0.37 mm²	AWG 26-22	0.9	8 mm
0.5 mm²	AWG 20	1.1	8 mm
0.75 mm²	AWG 18	1.3	8 mm
1 mm²	AWG 18	1.45	8 mm
1.5 mm²	AWG 16	1.75	8 mm
2.5 mm²	AWG 14	2.25	6 mm

Stock items in bold type

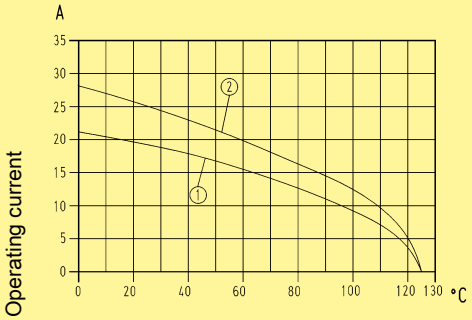
Features

- 8 contact chambers for crimp contacts of Han E® series
- Space-saving and compact design
- Leading protective ground with crimp terminal
- Inserts suitable for metal and plastic hoods and housings of Han-Compact® series
- ISO 23 570 / DESINA conform product

Current carrying capacity

The current carrying capacity of the connectors is limited by the thermal load capability of the contact element material including the connections and the insulating parts. The derating curve is therefore valid for currents which flow constantly (non-intermittent) through each contact element of the connector evenly, without exceeding the allowed maximum temperature.

Measuring and testing techniques according to DIN EN 60 512-5



Ambient temperature

Wire gauge: ① 1.5 mm²
② 2.5 mm²

Technical characteristics

Specifications	DIN VDE 0110 DIN EN 61 984
Approvals	

Inserts

Number of contacts	8 + PE
Electrical data acc. to EN 61 984	
Mounted plastic hood	**16 A 500 V 6 kV 3**
Rated current	16 A
Rated voltage	500 V
Rated impulse voltage	6 kV
Pollution degree	3
Pollution degree 2 also	16 A 400/690 V 6 kV 2
Mounted metal hood	16 A 230/400 V 4 kV 3
Rated voltage acc. to UL/CSA	500 V
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Mechanical working life	
- mating cycles	≥ 500

Contacts

Material	copper alloy
Surface	
- hard-silver plated	3 µm Ag
- hard-gold plated	2 µm Au over 3 µm Ni
Contact resistance	≤ 1 mΩ
Crimp terminal	
- mm²	0.14 ... 4 mm² partly loaded up to 4 mm² is possible
- AWG	26 ... 12

Hoods/Housings

Plastic hoods/housings

Material	polycarbonate
Locking element	Polyamide
Hoods/Housings sealing	NBR
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529 for coupled connector	IP 65

Hoods/Housings, metal

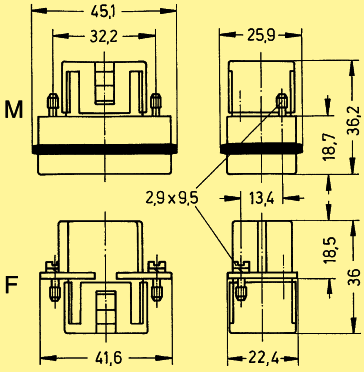
Material	zinc die-cast
Locking element	Stainless steel
Hoods/Housings sealing	NBR
Limiting temperatures	-40 °C ... 125 °C
Degree of protection acc. to DIN EN 60 529 for coupled connector	IP 65

Accessories

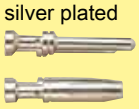
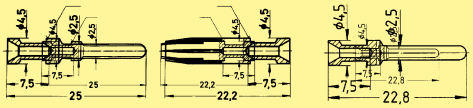
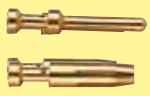
Crimping tools	chapter 99

Number of contacts

8 + ⏚

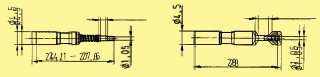
Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Crimp terminal Order crimp contacts separately	**09 12 008 3001**	**09 12 008 3101**		
Coding pin 		09 33 000 9954		Use of the coding pin prevents incorrect mating to other connectors of the same type. The male pin should be omitted from the opposing cavity in the male insert.

Han Q

Identification	Wire gauge (mm²)	Part number Male contact	Part number Female contact	Drawing	Dimensions in mm
Crimp contacts				Operating contact Identification / Relay contact	
Power contacts					
silver plated 	0.14-0.37	09 33 000 6127	09 33 000 6227		
	0.5	**09 33 000 6121**	**09 33 000 6220**		
	0.75	**09 33 000 6114**	**09 33 000 6214**		
	1	**09 33 000 6105**	**09 33 000 6205**		
	1.5	**09 33 000 6104**	**09 33 000 6204**		
	2.5	**09 33 000 6102**	**09 33 000 6202**		
	4	**09 33 000 6107**	**09 33 000 6207**		
gold plated 	0.14-0.37	09 33 000 6117	09 33 000 6217		
	0.5	**09 33 000 6122**	**09 33 000 6222**		
	0.75	**09 33 000 6115**	**09 33 000 6215**		
	1	**09 33 000 6118**	**09 33 000 6218**		
	1.5	**09 33 000 6116**	**09 33 000 6216**		
	2.5	**09 33 000 6123**	**09 33 000 6223**		
	4	09 33 000 6119	09 33 000 6221		
Relay contact silver plated 	0.75-1	09 33 000 6109			
	1.5	09 33 000 6110			
	2.5	09 33 000 6111			

Identification	Wire gauge		Stripping length
no groove	0.14-0.37 mm²	AWG 26-22	7.5 mm
no groove	0.5 mm²	AWG 20	7.5 mm
1 groove*	0.75 mm²	AWG 18	7.5 mm
1 groove	1 mm²	AWG 18	7.5 mm
2 grooves	1.5 mm²	AWG 16	7.5 mm
3 grooves	2.5 mm²	AWG 14	7.5 mm
no groove	4 mm²	AWG 12	7.5 mm

* on the back crimp collar

F.O. contacts for 1 mm plastic fibre		20 10 001 3311	20 10 001 3321	Crimp zone / Crimp zone 	

Crimp contacts 0.14 ... 0.37 mm² only used with BUCHANAN crimping tool 09 99 000 0001

Stock items in bold type

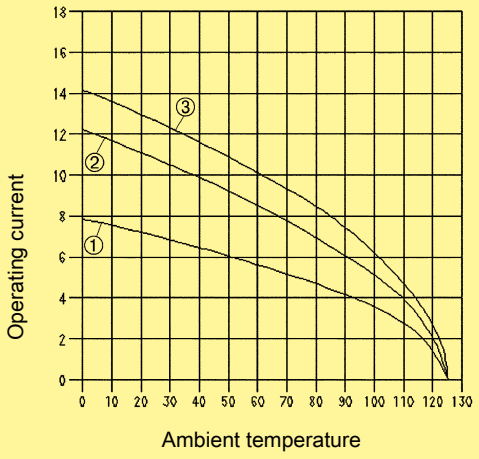
Features

- 17 contact chambers for crimp contacts of Han D® series
- Space-saving and compact design
- Leading protective ground with crimp terminal
- Inserts suitable for metal and plastic hoods and housings of Han-Compact® series
- 3 coding possibilities by using a coding pin instead of fixing screw

Current carrying capacity

The current carrying capacity of the connectors is limited by the thermal load capability of the contact element material including the connections and the insulating parts. The derating curve is therefore valid for currents which flow constantly (non-intermittent) through each contact element of the connector evenly, without exceeding the allowed maximum temperature.

Measuring and testing techniques according to DIN EN 60 512-5



Wire gauge:
① 0.5 mm²
② 1.0 mm²
③ 1.5 mm²

Technical characteristics

Specifications	DIN VDE 0110 DIN EN 61 984
Approvals	

Inserts

Number of contacts	17 + PE
Electrical data	
acc. to EN 61 984	**10 A 250 V 4 kV 2**
Rated current	10 A
Rated voltage	250 V
Rated impulse voltage	4 kV
Pollution degree	2
Rated voltage	
acc. to UL/CSA	250 V
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Mechanical working life	
- mating cycles	≥ 500

Contacts

Material	copper alloy
Surface	
- hard-silver plated	3 µm Ag
- hard-gold plated	2 µm Au over 3 µm Ni
Contact resistance	≤ 3 mΩ
Crimp terminal	
- mm²	0.14 ... 2.5 mm²
- AWG	26 ... 14

Hoods/Housings

Plastic hoods/housings

Material	polycarbonate
Locking element	Polyamide
Hoods/Housings sealing	NBR
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 65

Hoods/Housings, metal

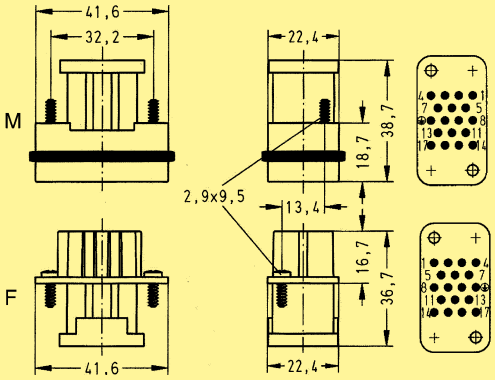
Material	zinc die-cast
Locking element	Stainless steel
Hoods/Housings sealing	NBR
Limiting temperatures	-40 °C ... 125 °C
Degree of protection acc. to DIN EN 60 529	
for coupled connector	IP 65

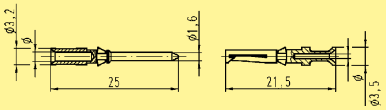
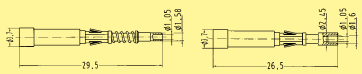
Accessories

Crimping tools	chapter 99

Number of contacts

17 + ⏚

Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Crimp terminal Order crimp contacts separately	**09 12 017 3001**	**09 12 017 3101**	 Contact arrangement view from termination side	

Identification	Wire gauge (mm²)	Part number Male contact	Part number Female contact	Drawing	Dimensions in mm
Crimp contacts Power contacts silver plated	0.14-0.37	**09 15 000 6104**	**09 15 000 6204**		
	0.5	**09 15 000 6103**	**09 15 000 6203**		
	0.75	**09 15 000 6105**	**09 15 000 6205**		
	1	**09 15 000 6102**	**09 15 000 6202**		
	1.5	**09 15 000 6101**	**09 15 000 6201**		
	2.5*	**09 15 000 6106**	**09 15 000 6206**		
gold plated	0.14-0.37	**09 15 000 6124**	**09 15 000 6224**		
	0.5	**09 15 000 6123**	**09 15 000 6223**		
	0.75	**09 15 000 6125**	**09 15 000 6225**		
	1	**09 15 000 6122**	**09 15 000 6222**		
	1.5	**09 15 000 6121**	**09 15 000 6221**		
	2.5*	**09 15 000 6126**	**09 15 000 6226**		
F.O. contacts for 1 mm plastic fibre		20 10 001 3211	20 10 001 3221		

Wire gauge		∅	Stripping length
0.14-0.37 mm²	AWG 26-22	0.9	8 mm
0.5 mm²	AWG 20	1.1	8 mm
0.75 mm²	AWG 18	1.3	8 mm
1 mm²	AWG 18	1.45	8 mm
1.5 mm²	AWG 16	1.75	8 mm
2.5 mm²	AWG 14	2.25	6 mm

* Insert with crimp contacts 2.5 mm² partly loaded

Stock items in bold type

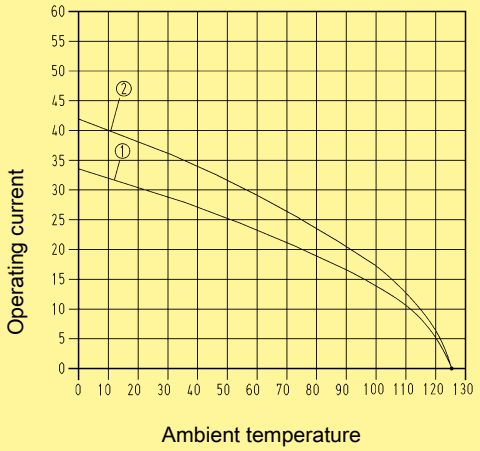
Features

- 4 power contacts Han® C and 2 signal contacts Han D®
- Finger protection
- Leading protective ground with crimp terminal
- Inserts suitable for metal and plastic hoods and housings of Han-Compact® series (not suitable for 19 12 008 0501, 19 12 708 0501 and 19 12 008 0502)
- 3 coding possibilities by using a coding pin instead of fixing screw

Current carrying capacity

The current carrying capacity of the connectors is limited by the thermal load capability of the contact element material including the connections and the insulating parts. The derating curve is therefore valid for currents which flow constantly (non-intermittent) through each contact element of the connector evenly, without exceeding the allowed maximum temperature.

Measuring and testing techniques according to DIN EN 60 512-5



Wire gauge: ① 2.5 mm²
② 4 mm²

Technical characteristics

Specifications	DIN VDE 0110 DIN EN 61 984
Approvals	

Inserts

Number of contacts	4 / 2 + PE
Electrical data acc. to EN 61 984	
Power side	**40 A 400/690 V 6 kV 3**
Rated current	40 A
Rated voltage conductor - ground	400 V
Rated voltage conductor - conductor	690 V
Rated impulse voltage	6 kV
Pollution degree	3
Signal side	**10 A 250 V 4 kV 3**
Rated current	10 A
Rated voltage	250 V
Rated impulse voltage	4 kV
Pollution degree	3
Rated voltage acc. to UL/CSA	600 / 250 V
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Mechanical working life	
- mating cycles	≥ 500

Contacts

Material	copper alloy
Surface	
- hard-silver plated	3 µm Ag
- hard-gold plated	2 µm Au over 3 µm Ni
Contact resistance	≤ 0.3 mΩ
Crimp terminal	
- mm²	1.5 ... 6 mm² / 0.14 ... 2.5 mm²
- AWG	16 ... 10 / 26 ... 14
Max. insulation diameter	
- Power contacts	5 mm

Hoods/Housings

Plastic hoods/housings

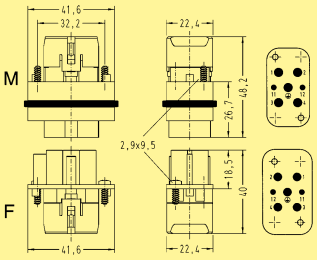
Material	polycarbonate
Locking element	Polyamide
Hoods/Housings sealing	NBR
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529 for coupled connector	IP 65

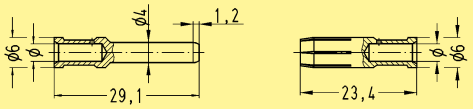
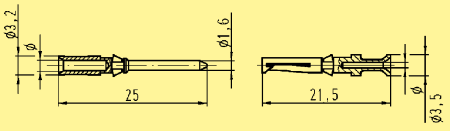
Accessories

Crimping tools	chapter 99

Number of contacts

4/2 + ⏚

Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Crimp terminal Order crimp contacts separately	**09 12 006 3041**	**09 12 006 3141**	 Contact arrangement view from termination side	

Identification	Wire gauge (mm²)	Part number Male contact	Part number Female contact	Drawing	Dimensions in mm
Crimp contacts					
Han® C contacts Power contacts					
silver plated	1.5	**09 32 000 6104**	**09 32 000 6204**		
	2.5	**09 32 000 6105**	**09 32 000 6205**		
	4	**09 32 000 6107**	**09 32 000 6207**		
	6	**09 32 000 6108**	**09 32 000 6208**		
Han D® contacts Signal contacts					
silver plated	0.14-0.37	**09 15 000 6104**	**09 15 000 6204**		
	0.5	**09 15 000 6103**	**09 15 000 6203**		
	0.75	**09 15 000 6105**	**09 15 000 6205**		
	1	**09 15 000 6102**	**09 15 000 6202**		
	1.5	**09 15 000 6101**	**09 15 000 6201**		
	2.5	**09 15 000 6106**	**09 15 000 6206**		
gold plated	0.14-0.37	**09 15 000 6124**	**09 15 000 6224**		
	0.5	**09 15 000 6123**	**09 15 000 6223**		
	0.75	**09 15 000 6125**	**09 15 000 6225**		
	1	**09 15 000 6122**	**09 15 000 6222**		
	1.5	**09 15 000 6121**	**09 15 000 6221**		
	2.5	**09 15 000 6126**	**09 15 000 6226**		

Wire gauge		∅	Stripping length
1.5 mm²	AWG 16	1.75	9 mm
2.5 mm²	AWG 14	2.25	9 mm
4 mm²	AWG 12	2.85	9.6 mm
6 mm²	AWG 10	3.5	9.6 mm

Wire gauge		∅	Stripping length
0.14-0.37 mm²	AWG 26-22	0.9	**8 mm**
0.5 mm²	AWG 20	1.1	**8 mm**
0.75 mm²	AWG 18	1.3	**8 mm**
1 mm²	AWG 18	1.45	**8 mm**
1.5 mm²	AWG 16	1.75	**8 mm**
2.5 mm²	AWG 14	2.25	**6 mm**

Stock items in bold type

Features

- Combination connector / Ethernet connector based on RJ45 / additionally maximum 10 signal D-Sub contacts, crimp terminal
- Compact design
- High contact density
- Turned D-Sub contacts of performance level 1*
- Suitable for hoods and housings of series Han-Compact®

Technical characteristics

Specifications	DIN VDE 0110 DIN EN 61 984

Inserts

Ethernet connector	
Terminal	RJ45 acc. to IEC 60 603-7
Wire gauge	AWG 24 - 26 flexible
Transmission features	Cat 5e
Number of contacts	8
Signal side	
Number of contacts	10
Electrical data acc. to EN 61 984	**5 A 50 V 0.8 kV 3**
Rated current	5 A
Rated voltage	50 V
Rated impulse voltage	0.8 kV
Pollution degree	3
Insulation resistance	≥ 10^{10} Ω
Material	polycarbonate
Limiting temperatures	-40 °C ... 85 °C
Flammability acc. to UL 94	V 0
Mechanical working life - mating cycles	≥ 500

Contacts

Crimp terminal	
- mm²	0.13 ... 0.52 mm²
- AWG	26 ... 20
turned contacts	Performance level 1 as per CECC 75 301-802, 500 mating cycles, 10 days 4 mixed gas test - IEC 60 512

Hoods/Housings

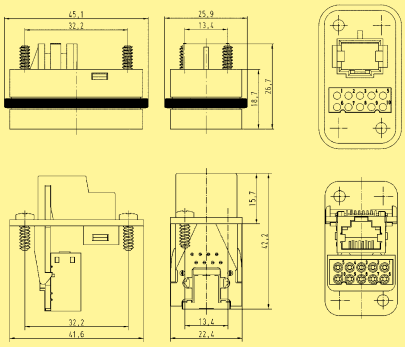
Plastic hoods/housings	
Material	polycarbonate
Locking element	Polyamide
Hoods/Housings sealing	NBR
Limiting temperatures	-40 °C ... 125 °C
Flammability acc. to UL 94	V 0
Degree of protection acc. to DIN EN 60 529 for coupled connector	IP 65
Hoods/Housings, metal	
Material	zinc die-cast
Locking element	Stainless steel
Hoods/Housings sealing	NBR
Limiting temperatures	-40 °C ... 125 °C
Degree of protection acc. to DIN EN 60 529 for coupled connector	IP 65

Han Q

* Performance level 1 acc. to CECC 75 301-802, 500 mating cycles, 10 days 4 mixed gas test as per IEC 60 512

Number of contacts

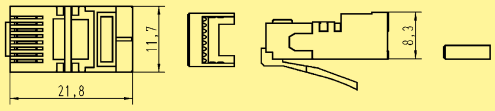
8

Identification	Part number Male insert (M)	Part number Female insert (F)	Drawing	Dimensions in mm
Crimp terminal Order crimp contacts separately female insert usable for panel feed through for patch cables	**09 12 011 3001**	**09 12 011 3111**		

Han Q

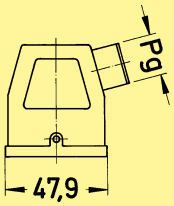
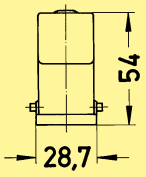
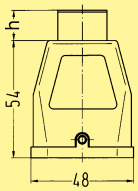
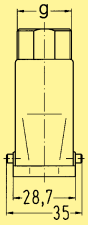
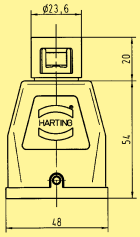
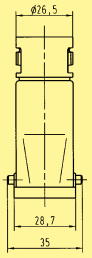
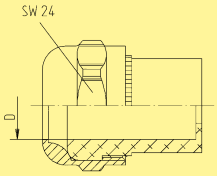
Identification	Wire gauge (mm²)	Part number Male contact	Part number Female contact	Drawing	Dimensions in mm
Individual contacts Han® D-Sub contacts gold plated 	0.13-0.33 0.33-0.52	**61 03 000 0094** **61 03 000 0073**	**61 03 000 0096** **61 03 000 0074**		

Wire gauge		Stripping length
0.13-0.33 mm²	AWG 26-22	5 mm
0.33-0.52 mm²	AWG 22-20	5 mm

Identification	Wire gauge (mm²)	Part number Male contact	Part number Female contact	Drawing	Dimensions in mm
RJ45 Plug AMP (for replacement) AWG 24 ... 26 Ø 0.89 mm ... 0.99 mm		09 12 000 9958			

Stock items in bold type

thermoplastic / metal

Identification	Part number		Drawing	Dimensions in mm
Hoods **Hoods** Thermoplastic side-entry Cable gland order separately 	**09 12 008 0527**	Pg 16		
Hoods Thermoplastic top-entry Cable gland order separately 	**19 12 008 0429** **09 12 008 0427** **09 12 008 0429**	M 25 Pg 16 Pg 21		
Hoods Thermoplastic top-entry for flexible conduits Adaptaflex PAFS18 	09 12 008 0428	PAFS 18		
Cable seal Thermoplastic for hoods Thrust bolt and insert 	**09 00 000 5059** **19 12 000 5157** **19 12 000 5158** **09 00 000 5157** **09 00 000 5158**	Pg 16 M 25 M 25 Pg 21 Pg 21		

h	g
14	M 25x1.5
13	Pg 16
13	Pg 21

	cable	
	min.	max.
09 00 000 5059	11.5 mm	15.5 mm
19 12 000 5157	10.5 mm	14 mm
19 12 000 5158	14 mm	17 mm
09 00 000 5157	14 mm	18 mm
09 00 000 5158	17 mm	20.5 mm

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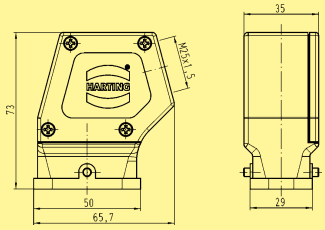
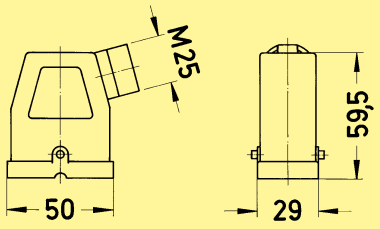
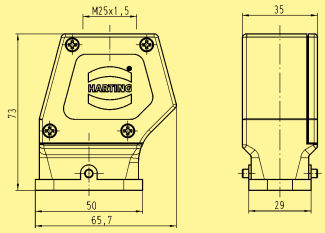
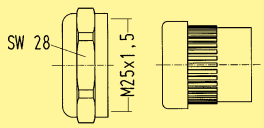
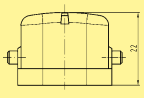
Stock items in bold type

thermoplastic / metal

Identification	Part number		Drawing	Dimensions in mm
Hoods **Hoods** Metal side-entry Cable gland order separately 	**19 12 008 0526** matt nickel plated **19 12 008 0528**	M 25 M 25		
Hoods Metal side-entry Cable gland order separately 	black chromated 19 12 008 0501 black powder coated **19 12 708 0501** matt nickel plated **19 12 008 0502**	M 25 M 25 M 25		
Hoods Metal top-entry Cable gland order separately 	**19 12 008 0426**	M 25		
Cable seal Metal for hoods Thrust bolt and insert 	19 12 000 5057 **19 12 000 5058**	M 25 M 25		

	cable	
	min.	max.
19 12 000 5057	10.5 mm	14 mm
19 12 000 5058	14 mm	17 mm

Identification	Part number for male insert	Part number for female insert	Drawing	Dimensions in mm
Protection covers Thermoplastic for male insert 	without sealing 09 12 008 5407	with sealing 09 12 008 5408		

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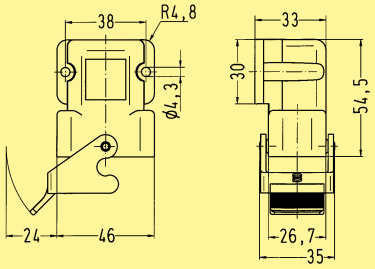
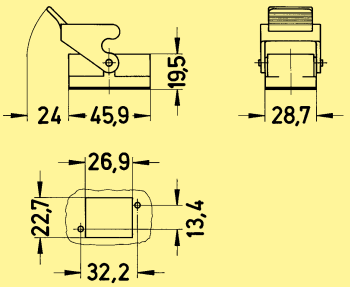
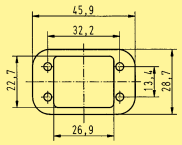
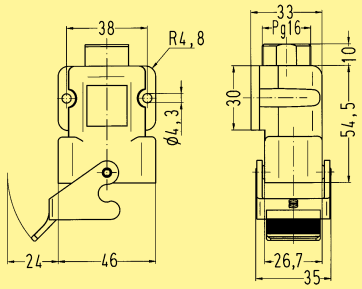
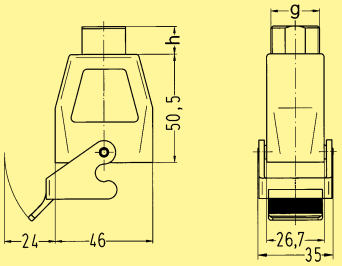
Stock items in bold type

thermoplastic / metal

Identification	Part number		Drawing	Dimensions in mm
Housings				
Housings, bulkhead mounting Thermoplastic angled 	**09 12 008 0902**	–		
Housings, bulkhead mounting Thermoplastic 	**09 12 008 0327**	–		
Gasket for housings bulkhead mounting Han® Q 8/0 	09 12 000 9912			
Housings, surface mounting Thermoplastic angled Cable gland order separately 	09 12 008 0901	Pg 16		
Hoods, cable to cable Thermoplastic Cable gland order separately 	09 12 008 0727 19 12 008 0729	Pg 16 M 25		

h	g
13	Pg 16
14	M 25x1.5

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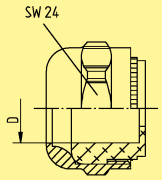
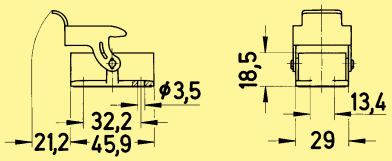
Stock items in bold type

thermoplastic / metal

Identification	Part number	Drawing	Dimensions in mm
Housings **Cable seal** Thermoplastic for housings Thrust bolt and insert 	09 00 000 5058 09 00 000 5057	Pg 16 Pg 16	

	cable	
	min.	max.
09 00 000 5058	11.5 mm	15.5 mm
09 00 000 5057	6.5 mm	9.5 mm

Housings, **bulkhead mounting** Metal 	black chromated **09 12 008 0301** black powder coated **09 12 708 0301** matt nickel plated **09 12 008 0303**		

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Siemens AG, Erlangen, Germany