

# Electrical connection technology, for multi-pin plug connection

Product range overview

FESTO

Overview of multi-pin plug connections for valve terminals									
Connecting cable/plug	Valve terminal								➔ Page
	Type 04	Type 10	Type 12	Type 32	Type 03	Type 02	Type 80	Type 82	
KEA-1-25P-5	-	■	■	-	■	-	-	-	4 / 5.1-67
KEA-1-25P-10	-	■	■	-	■	-	-	-	4 / 5.1-67
KEA-1-25P-...	-	■	■	-	■	-	-	-	4 / 5.1-67
KMP1-02-VI-16-X	■	-	-	-	-	-	-	-	4 / 5.1-51
KMP1-02-VI-6-5	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-VI-12-5	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-VI-16-5	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-VI-6-10	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-VI-12-10	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-VI-16-10	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-4-5	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-8-5	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-10-5	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-14-5	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-16-5	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-4-5	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-4-10	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-8-10	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-10-10	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-14-10	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP1-02-II-16-10	-	-	-	-	-	■	-	-	4 / 5.1-51
KMP2-03-E-10-26	-	-	-	-	■	-	-	-	4 / 5.1-57
KMP2-03-E-X-26	-	-	-	-	■	-	-	-	4 / 5.1-57
KMP2-03-V-10-26	-	-	-	-	■	-	-	-	4 / 5.1-57
KMP2-03-V-X-26	-	-	-	-	■	-	-	-	4 / 5.1-57
KMP3-9P-08-5	-	■	-	-	■	-	-	-	4 / 5.1-59
KMP3-9P-08-5-FD	-	■	-	-	-	-	-	-	4 / 5.1-59
KMP3-9P-08-10	-	■	-	-	-	-	-	-	4 / 5.1-59
KMP3-9P-08-10-FD	-	■	-	-	-	-	-	-	4 / 5.1-59
KMP3-25P-16-5	-	■	-	-	-	-	-	-	4 / 5.1-59
KMP3-25P-16-10	-	■	-	-	-	-	-	-	4 / 5.1-59
KMP4-9-P-5-PVC	-	■	-	-	-	-	-	-	4 / 5.1-61
KMP4-9-P-10-PVC	-	■	-	-	-	-	-	-	4 / 5.1-61
KMP4-9-P-5-PUR	-	■	-	-	-	-	-	-	4 / 5.1-61
KMP4-9-P-10-PUR	-	■	-	-	-	-	-	-	4 / 5.1-61
KMP4-25-P-5-PVC	-	■	■	-	-	-	-	-	4 / 5.1-61
KMP4-25-P-10-PVC	-	■	■	-	-	-	-	-	4 / 5.1-61
KMP4-25-P-5-PUR	-	■	■	-	-	-	-	-	4 / 5.1-61
KMP4-25-P-10-PUR	-	■	■	-	-	-	-	-	4 / 5.1-61

# Electrical connection technology, for multi-pin plug connection



Product range overview

Accessories for valve terminals  
Electrical connector systems

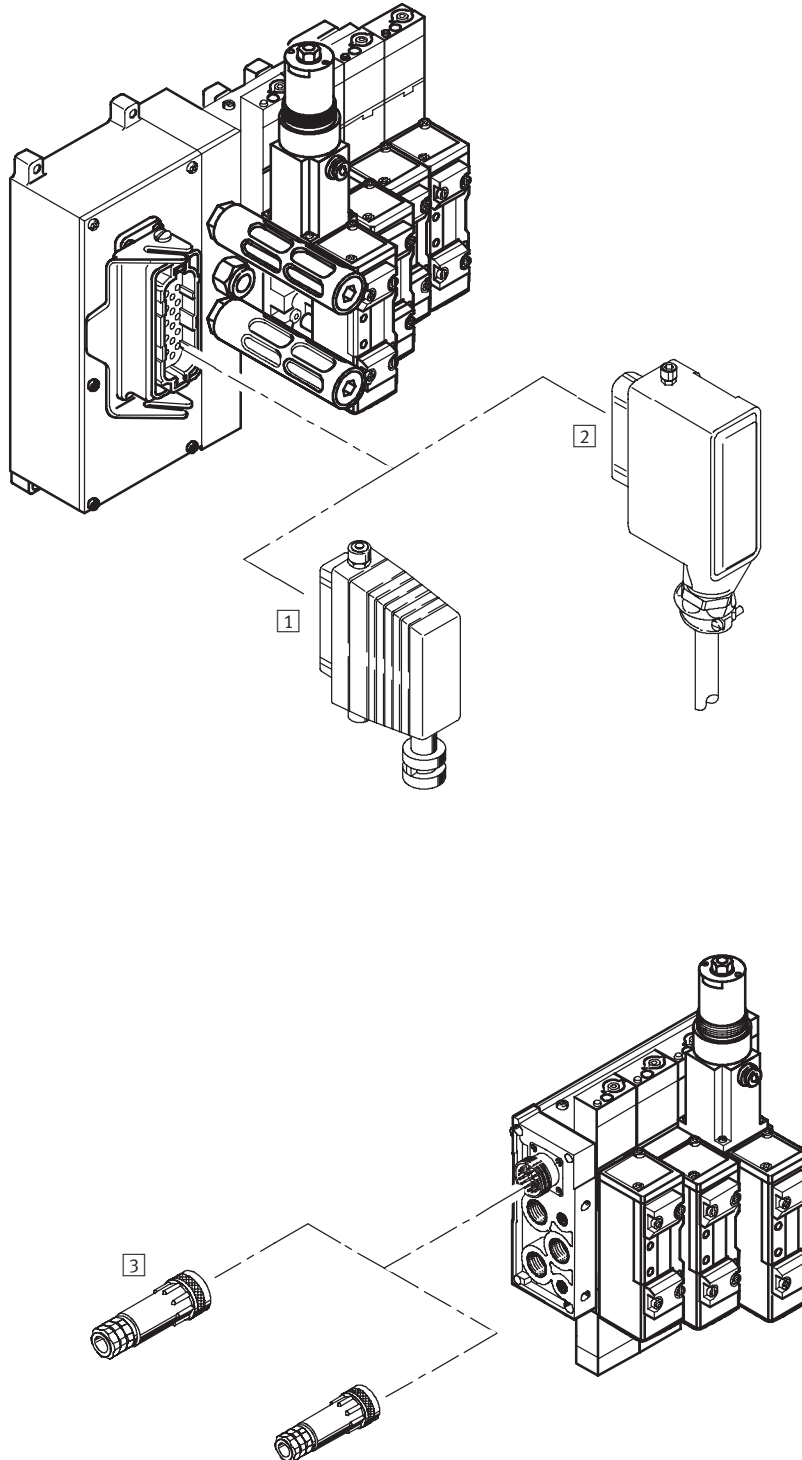
## 5.1

Overview of multi-pin plug connections for valve terminals									
Connecting cable/plug	Valve terminal								→ Page
	Type 04	Type 10	Type 12	Type 32	Type 03	Type 02	Type 80	Type 82	
KMP6-09P-8-2,5	-	■	-	-	-	-	-	-	4 / 5.1-63
KMP6-09P-8-5	-	■	-	-	-	-	-	-	4 / 5.1-63
KMP6-09P-8-10	-	■	-	-	-	-	-	-	4 / 5.1-63
KMP6-15P-12-2,5	-	-	-	-	-	-	■	-	4 / 5.1-63
KMP6-15P-12-5	-	-	-	-	-	-	■	-	4 / 5.1-63
KMP6-15P-12-10	-	-	-	-	-	-	■	-	4 / 5.1-63
KMP6-26P-16-2,5	-	-	-	-	-	-	■	-	4 / 5.1-63
KMP6-26P-16-5	-	-	-	-	-	-	■	-	4 / 5.1-63
KMP6-26P-16-10	-	-	-	-	-	-	■	-	4 / 5.1-63
KMP6-25P-12-2,5	-	-	-	-	-	-	-	■	4 / 5.1-63
KMP6-25P-12-5	-	-	-	-	-	-	-	■	4 / 5.1-63
KMP6-25P-12-10	-	-	-	-	-	-	-	■	4 / 5.1-63
KMP6-25P-20-2,5	-	■	■	-	-	-	-	■	4 / 5.1-63
KMP6-25P-20-5	-	■	■	-	-	-	-	■	4 / 5.1-63
KMP6-25P-20-10	-	■	■	-	-	-	-	■	4 / 5.1-63
SD-SUB-D-BU9	-	■	■	-	-	-	-	-	4 / 5.1-71
SD-SUB-D-BU25	-	■	■	-	■	-	-	-	4 / 5.1-71
IMP1-SD-25	-	-	-	-	-	■	-	-	4 / 5.1-47
IMP1-SD-40	-	-	-	-	-	■	-	-	4 / 5.1-47
IMP1-SD-72	-	-	-	-	-	■	-	-	4 / 5.1-47
IMP1-SD-25-0,75	-	-	-	-	-	■	-	-	4 / 5.1-47
IMP1-SD-40-0,75	■	-	-	-	-	■	-	-	4 / 5.1-47
IMP1-SD-72-0,75	-	-	-	-	-	■	-	-	4 / 5.1-47
IMP2-SD-26-V	-	-	-	-	■	-	-	-	4 / 5.1-49
IMP2-SD-26-EA	-	-	-	-	■	-	-	-	4 / 5.1-49
VMPA-KMS-H	-	-	-	■	-	-	-	-	4 / 5.1-44
VMPA-KMS1-8-2,5	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS1-8-5	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS1-8-10	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS1-24-2,5	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS1-24-5	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS1-24-10	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS2-8-2,5-PUR	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS2-8-5-PUR	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS2-8-10-PUR	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS2-24-2,5-PUR	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS2-24-5-PUR	-	-	-	■	-	-	-	-	4 / 5.1-45
VMPA-KMS2-24-10-PUR	-	-	-	■	-	-	-	-	4 / 5.1-45

# Electrical connection technology, for multi-pin plug connection

Peripherals overview

Valve terminal type 04A, ISO 5599-2



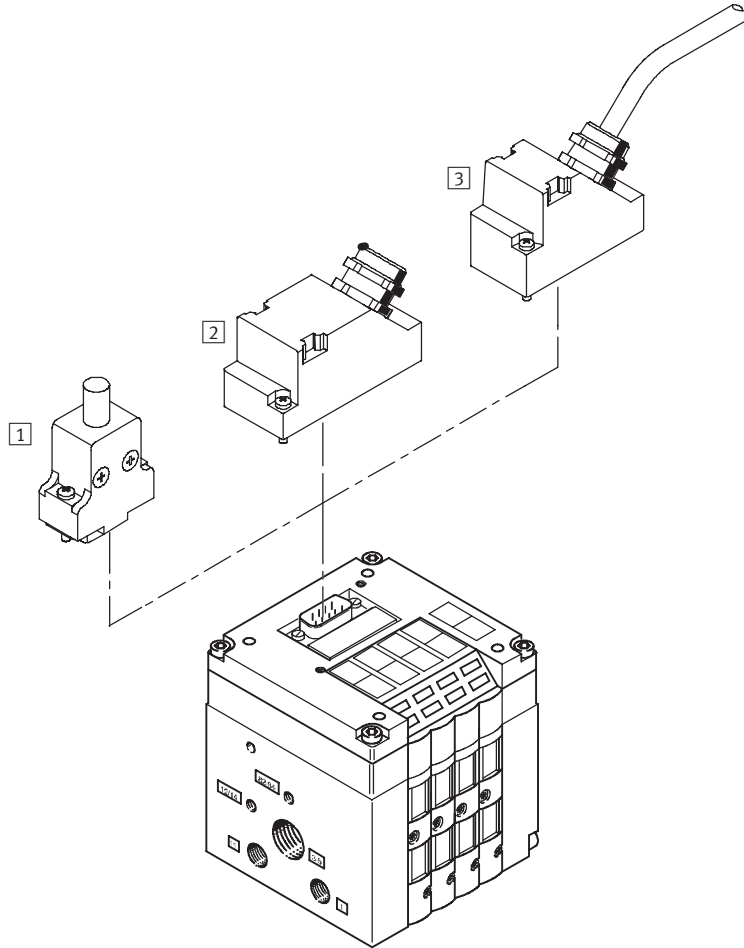
Accessories		
	Brief description	→ Page
1	IMP1-SD-40-0,75 Multi-pin plug socket	4 / 5.1-47
2	KMP1-02-VI-16-X Connecting cable, IP65	4 / 5.1-51
3	Round plug from Electrивert Inc.	

# Electrical connection technology, for multi-pin plug connection

Peripherals overview

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## Valve terminal type 10 CPV



Accessories for valve terminals  
Electrical connector systems

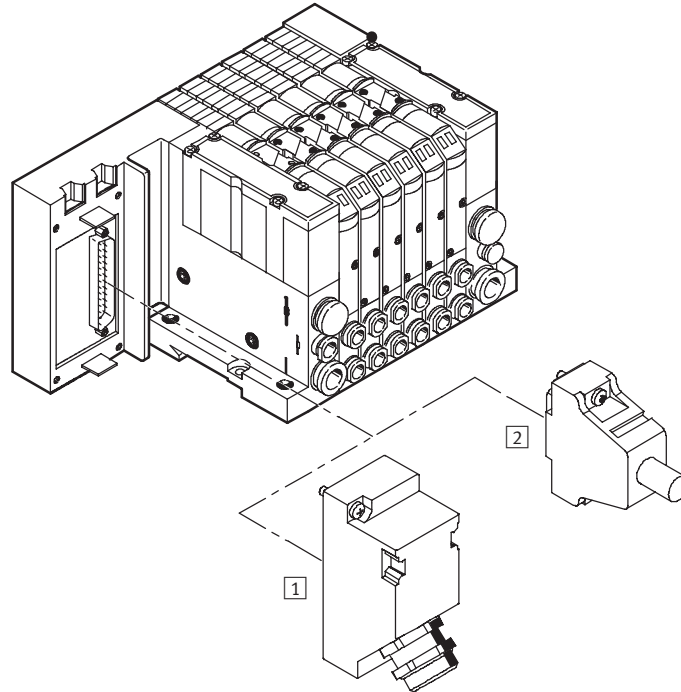
5.1

Accessories		Brief description	→ Page
1	KMP6-09P-8-... KMP6-25P-20-... KEA-1-...	Connecting cable for chain link trunking with 9-pin Sub-D plug, IP40 Connecting cable for chain link trunking with 25-pin Sub-D plug, IP40 Connecting cable, IP40	4 / 5.1-63 4 / 5.1-63 4 / 5.1-67
2	SD-SUB-D-BU9 SD-SUB-D-BU25...	Plug socket, 9-pin, IP65 Plug socket, 25-pin, IP65	4 / 5.1-71 4 / 5.1-71
3	KMP3-... KMP4-9P-...-PVC KMP4-9P-...-PUR KMP4-25P-...-PVC KMP4-25P-...-PUR	Connecting cable, IP65 Connecting cable, 9-pin, polyvinyl chloride, for chain link trunking, IP65 Connecting cable, 9-pin, polyurethane, for chain link trunking, IP65 Connecting cable, 25-pin, polyvinyl chloride, for chain link trunking, IP65 Connecting cable, 25-pin, polyurethane, for chain link trunking, IP65	4 / 5.1-59 4 / 5.1-61 4 / 5.1-61 4 / 5.1-61 4 / 5.1-61

# Electrical connection technology, for multi-pin plug connection

Peripherals overview

## Valve terminal type 12 CPA



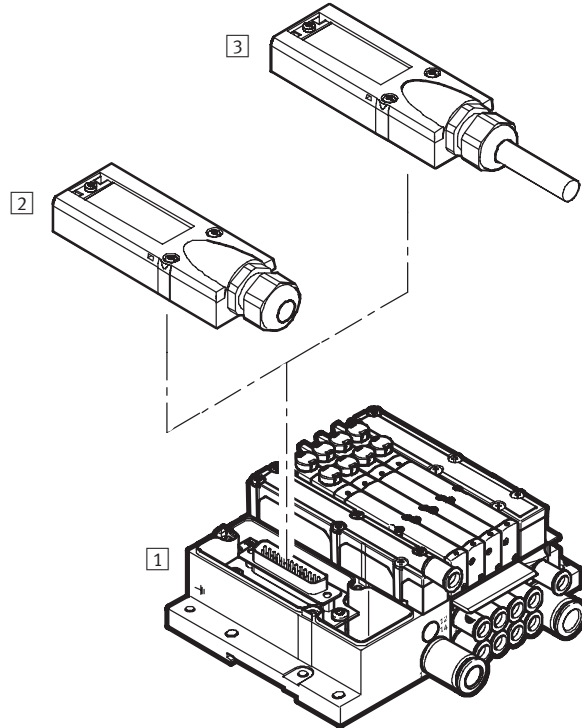
Accessories		Brief description	→ Page
1	KEA-1-25P-...	Connecting cable, IP65	4 / 5.1-67
	KMP3-25P-...	Connecting cable, 25-pin, for chain link trunking, IP65	4 / 5.1-59
	KMP4-25P-...-PVC	Connecting cable, 25-pin, for chain link trunking, IP65	4 / 5.1-61
	KMP4-25P-...-PUR	Connecting cable, 25-pin, for chain link trunking, IP65	4 / 5.1-61
	SD-SUB-D-BU25	Plug socket	4 / 5.1-71
2	KMP6-25P-20-...	Connecting cable for chain link trunking with 25-pin Sub-D plug	4 / 5.1-63

# Electrical connection technology, for multi-pin plug connection

Peripherals overview

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## Valve terminal type 32 MPA



Accessories for valve terminals  
Electrical connector systems

5.1

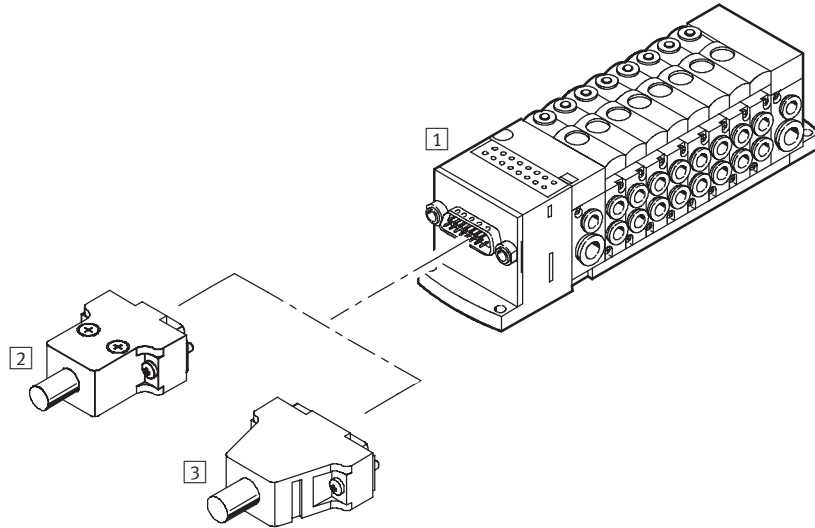
Accessories		
	Brief description	→ Page
1	Type 32 MPA Valve terminal	Info 227 Valve terminal MPA
2	VMPA-KMS-H Cover plug, without connecting cable, IP65	4 / 5.1-44
3	VMPA-KMS1-... Connecting cable, IP65	4 / 5.1-45
	VMPA-KMS2-...-PUR Connecting cable, polyurethane, for chain link trunking, IP65	4 / 5.1-45

# Electrical connection technology, for multi-pin plug connection

Peripherals overview

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## Valve terminal type 80 CPVSC1



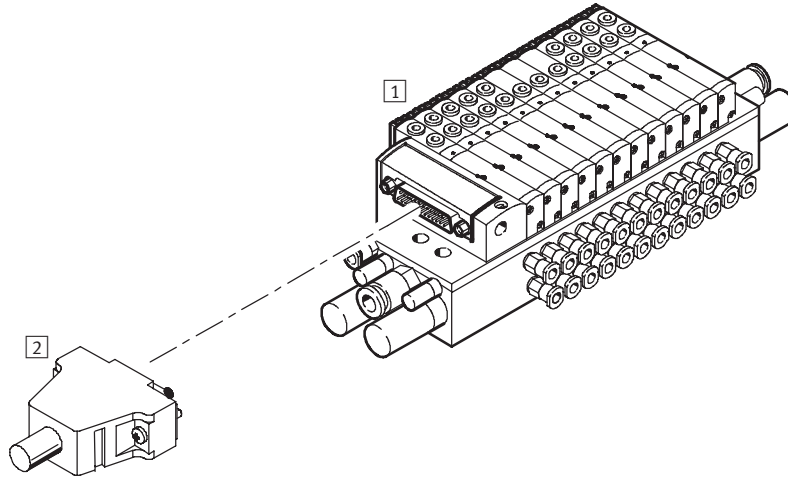
Accessories		
	Brief description	→ Page
1	Type 80 CPV-SC Valve terminal	4 / 3.1-1
2	KMP6-15P-12-... Connecting cable, with Sub-D plug, 15-pin, IP40	4 / 5.1-63
3	KMP6-26P-16-... Connecting cable, with Sub-D plug, 26-pin, IP40	4 / 5.1-63

# Electrical connection technology, for multi-pin plug connection

Peripherals overview

FESTO

## Valve terminal type 82 CPASC1



Accessories for valve terminals  
Electrical connector systems

5.1

Accessories		
	Brief description	→ Page
1	Type 82 CPA-SC Valve terminal	4 / 3.1-27
2	KMP6-25P-... Connecting cable, with Sub-D plug, 25-pin, IP40	4 / 5.1-63

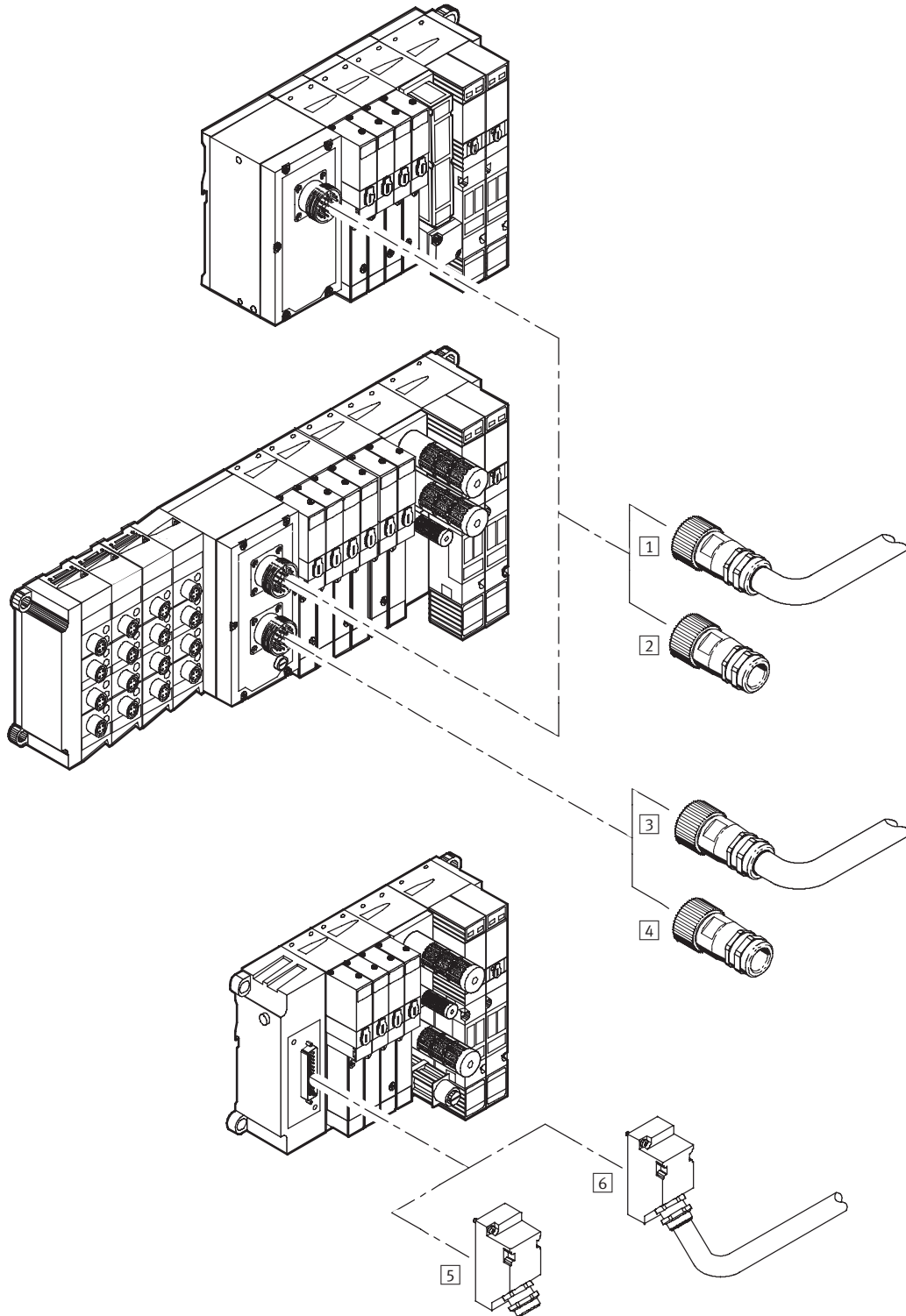


# Electrical connection technology, for multi-pin plug connection

Peripherals overview

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## Valve terminal type VIMP-03 MIDI/MAXI



Accessories for valve terminals  
Electrical connector systems

5.1

# Electrical connection technology, for multi-pin plug connection

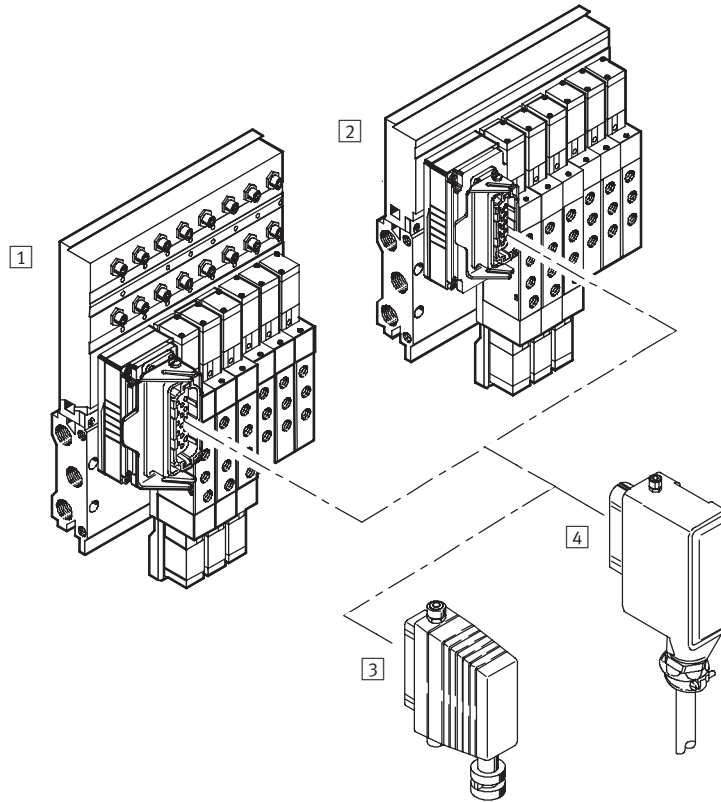
Peripherals overview

Accessories			
	Brief description	→ Page	
1	KMP2-03-V-...-26	Connecting cable, straight socket	4 / 5.1-57
2	IMP2-SD-...-V	Multi-pin plug socket	4 / 5.1-49
3	KMP2-03-E-...-26	Connecting cable, straight socket	4 / 5.1-57
4	IMP2-SD-...-E	Multi-pin plug socket	4 / 5.1-49
5	SD-SUB-D-BU25	Plug socket, 25-pin, angled outlet	4 / 5.1-71
6	KEA-1-25P-...	Connecting cable	4 / 5.1-67

# Electrical connection technology, for multi-pin plug connection

Peripherals overview

## Valve terminal type 02 VIMP/IIMP



Accessories		Brief description	→ Page
1	IIMP-02-...	Valve/sensor terminal type 02	4 / 2.3-1
2	VIMP02-...	Valve terminal type 02	4 / 2.3-1
3	IMP1-SD-...	Multi-pin plug socket (contacts 1.5 mm <sup>2</sup> )	4 / 5.1-47
	IMP1-SD-...-0,75	Multi-pin plug socket (contacts 0.75 mm <sup>2</sup> )	4 / 5.1-47
4	KMP1-02-...	Connecting cable with plug socket, pre-assembled	4 / 5.1-51

# Electrical connection technology, for multi-pin plug connection

Technical data – VMPA-KMS-H

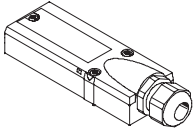


## 5.1

- Plug socket for multi-pin connection (to valve terminal type 32 MPA)
- Can be fabricated with any cable lengths
- 25-pin
- Sub-D

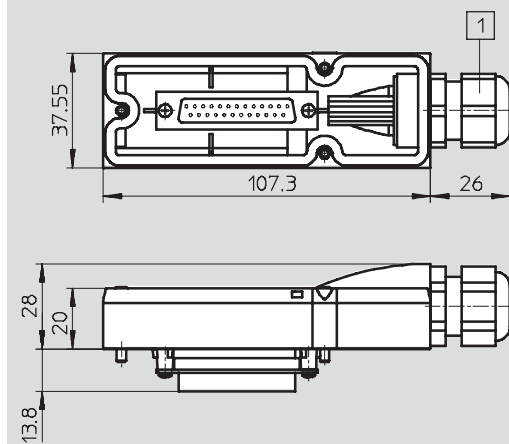


General technical data	
Type	VMPA-KMS-H
Type of mounting	3 M3x22 screws
Mounting position	Any
Cable gland connection	M20x1.5
Operating voltage range [V DC]	24
Current-carrying capacity [A]	3
Protection class to EN 60 529	IP65 (assembled)
Material of housing	Fibreglass reinforced polyamide
Material of contacts	Gold-plated copper base alloy
Material of seal	Polyurethane
Ambient temperature [°C]	-30 ... +80

Ordering data				
	Electrical connection	Perm. cable diameter [mm]	Type	Part No.
	25-pin Sub-D socket	6 ... 12	VMPA-KMS-H	533 198

### Dimensions Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

VMPA-KMS-H



1 Cable gland fitting M20x1.5

# Electrical connection technology, for multi-pin plug connection

Technical data – VMPA-...

- Plug socket with cable for multi-pin connection (to valve terminal type 32 MPA)
- Pre-assembled
- Cable lengths 2.5 m, 5 m or 10 m
- For 8 or 24 solenoid coils
- Sub-D
- VMPA-KMS2 as a design suitable for chain link trunking



General technical data	
Type	VMPA-...
Type of mounting	3 M3x22 screws
Mounting position	Any
Operating voltage range [V DC]	24
Current-carrying capacity [A]	3
Protection class to EN 60 529	IP65 (assembled)
Material of housing	Fibreglass reinforced polyamide
Material of contacts	Gold-plated copper base alloy
Material of seal	Polyurethane
Ambient temperature [°C]	-30 ... +80
Ambient temperature of flexible cable installation [°C]	-5 ... +70

Ordering data								
	Electrical connection	Cable composition [mm <sup>2</sup> ]	Material of cable sheath	Cable diameter [mm]	Cable length [m]	Type	Part No.	
	25-pin Sub-D socket	10x0.34	Polyvinyl chloride	6.9	2.5	VMPA-KMS1-8-2,5	533 195	
		10x0.34	Polyvinyl chloride	6.9	5	VMPA-KMS1-8-5	533 196	
		10x0.34	Polyvinyl chloride	6.9	10	VMPA-KMS1-8-10	533 197	
		25x0.34	Polyvinyl chloride	11.4	2.5	VMPA-KMS1-24-2,5	533 192	
		25x0.34	Polyvinyl chloride	11.4	5	VMPA-KMS1-24-5	533 193	
		25x0.34	Polyvinyl chloride	11.4	10	VMPA-KMS1-24-10	533 194	
	25-pin Sub-D socket	10x0.25	Polyurethane	7.7	2.5	2.5	VMPA-KMS2-8-2,5-PUR	533 504
		10x0.25	Polyurethane	7.7	5	5	VMPA-KMS2-8-5-PUR	533 505
		10x0.25	Polyurethane	7.7	10	10	VMPA-KMS2-8-10-PUR	533 506
		25x0.25	Polyurethane	10.8	2.5	2.5	VMPA-KMS2-24-2,5-PUR	533 501
		25x0.25	Polyurethane	10.8	5	5	VMPA-KMS2-24-5-PUR	533 502
		25x0.25	Polyurethane	10.8	10	10	VMPA-KMS2-24-10-PUR	533 503

# Electrical connection technology, for multi-pin plug connection

Technical data – VMPA...

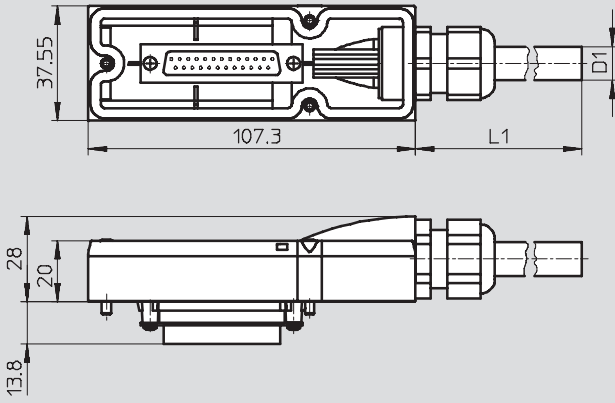


## 5.1

### Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

VMPA...



- D1 Length according to type  
(2.5 m, 5 m or 10 m)
- L1 Diameter according to type  
(6.9 mm, 7.7 mm, 10.8 mm or  
11.4 m)

### Wiring allocation (socket view)

VMPA-KMS...-24-...

	Pin	Core colour	Pin	Core colour
	1	White	14	Yellow-brown
	2	Green	15	White-grey
	3	Yellow	16	Grey-brown
	4	Grey	17	White-pink
	5	Pink	18	Pink-brown
	6	Blue	19	White-blue
	7	Red	20	Brown-blue
	8	Purple	21	White-red
	9	Grey-pink	22	Brown-red
	10	Red-blue	23	White-black
	11	White-green	24	Brown
	12	Brown-green	25	Black
	13	White-yellow		

# Electrical connection technology, for multi-pin plug connection

Technical data – IMP1

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- Plug socket for multi-pin cable connection (to valve terminal type 02)
- Can be fabricated with any cable lengths
- 25-pin, 40-pin or 72-pin socket
- Wire cross section 0.75 and 1.5 mm<sup>2</sup> can be used



Accessories for valve terminals  
Electrical connector systems

5.1

General technical data		IMP1-SD-...
Type		IMP1-SD-...
Type of mounting		Clamping strap
Mounting position		Any
Operating voltage range	[V]	300 AC
	[V]	250 DC
Current-carrying capacity	[A]	10
Protection class to EN 60 529		IP65 (assembled)
Material of housing		Die-cast light metal alloy
Material of contacts		Silver-plated copper base alloy
Material of plug		Fibreglass reinforced thermoplastic moulded material
Ambient temperature	[°C]	-40 ... +125

Ordering data							
	Electrical connection	Cable gland connection	Perm. cable diameter [mm]	Max. wire cross section [mm <sup>2</sup> ]	Product weight [g]	Type	Part No.
	25-pin plug socket	Pg21	11 ... 21	1.5	315	IMP1-SD-25	18 317
	25-pin plug socket	Pg16	7.5 ... 15	0.75	210	IMP1-SD-25-0,75	18 321
	40-pin plug socket	Pg29	18 ... 27	1.5	395	IMP1-SD-40	18 318
	40-pin plug socket	Pg21	10 ... 19	0.75	325	IMP1-SD-40-0,75	18 322
	72-pin plug socket	Pg29	18 ... 27	1.5	401	IMP1-SD-72	18 319
	72-pin plug socket	Pg29	18 ... 27	0.75	417	IMP1-SD-72-0,75	18 323
	72-pin plug socket	Sg50	22 ... 32	1.75	550	IMP1-SD-72-36	18 320

# Electrical connection technology, for multi-pin plug connection

Technical data – IMP1

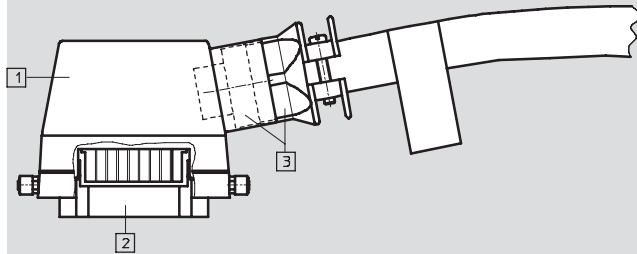


## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

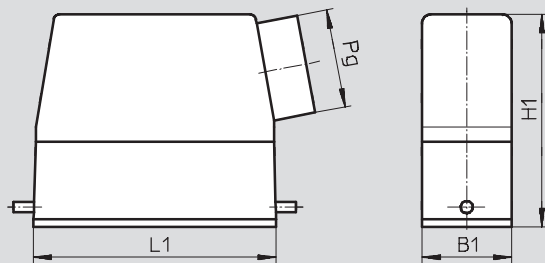
IMP1-...

Cable assembled



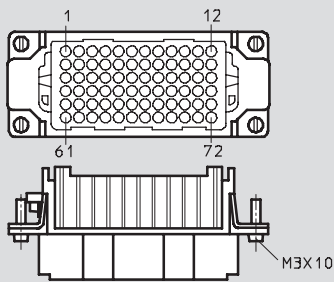
- 1 Housing
- 2 Socket insert with protective earth connection
- 3 Cable gland fitting with sealing set

## Housing

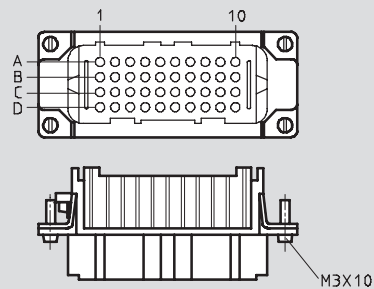


	25-pin	25-pin	40-pin	72-pin
L1	79.5 mm	79.5 mm	93.5 mm	93.5 mm
B1	29.5 mm	36 mm	43 mm	43 mm
H1	54.5 mm	70.5 mm	60 mm	76 mm
Pg	16	21	21	29

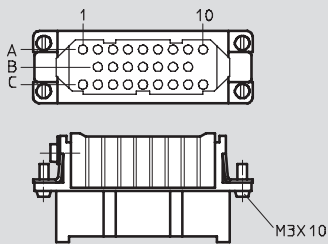
## Socket insert, 72-pin



## Socket insert, 40-pin



## Socket insert, 25-pin






# Electrical connection technology, for multi-pin plug connection


Technical data – IMP2

- Plug socket for electrical inputs or valves
- Can be fabricated with any cable lengths
- 26-pin plug socket
- Wire cross section of up to 0.75 mm<sup>2</sup>

 Note  
The only difference between IMP2-...-EA (variant for inputs/ outputs) and IMP2-...-V (variant for valves) lies in the different reverse polarity protection.



General technical data	
Type	IMP2-SD-...
Type of mounting	Knurled ring
Mounting position	Any
Operating voltage range [V]	250 AC
Current-carrying capacity [A]	7.5
Protection class to EN 60 529	IP65 (assembled)
Material of housing	Nickel-plated copper base alloy
Material of seal	Neoprene, light and oil resistant
Material of contacts	Gold-plated copper base alloy
Ambient temperature [°C]	-40 ... +125

Ordering data							
	Electrical connection	Cable gland connection	Perm. cable diameter [mm]	Coding	Product weight [g]	Type	Part No.
	26-pin plug socket	Pg16	13.5 ... 15	Y (for inputs/ outputs)	97	<b>IMP2-SD-26-EA</b>	<b>18 665</b>
	26-pin plug socket	Pg16	13.5 ... 15	N (for valves)	96	<b>IMP2-SD-26-V</b>	<b>18 664</b>

# Electrical connection technology, for multi-pin plug connection

Technical data – IMP2



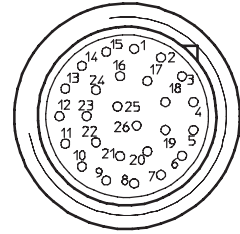
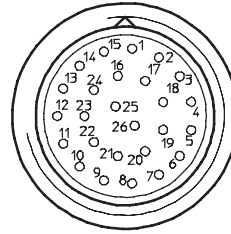
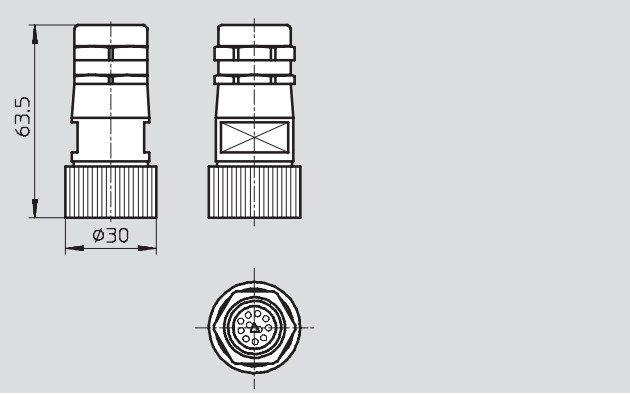
## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

IMP2-...

Socket insert, N-coded  
(IMP2-SD-26-V)

Socket insert, Y-coded  
(IMP2-SD-26-EA)



Accessories for valve terminals  
Electrical connector systems

5.1

# Electrical connection technology, for multi-pin plug connection

Technical data – KMP1-...

- Plug socket with cable for multi-pin connection (to valve terminal type 02)
- Pre-assembled
- Cable lengths of 5 m, 10 m or by customer request
- 25-pin, 40-pin or 72-pin socket
- Not suitable for chain link trunking



General technical data		KMP1-...
Type		KMP1-...
Type of mounting		Clamping strap
Mounting position		Any
Operating voltage range	[V]	300 AC
	[V]	250 DC
Current-carrying capacity	[A]	4
Protection class to EN 60 529		IP65 (assembled)
Material of housing		Die-cast light metal alloy
Material of contacts		Silver-plated copper base alloy
Material of cable sheath		Polyethylene
Ambient temperature	[°C]	-30 ... +70
Ambient temperature of flexible cable installation	[°C]	+5 ... +70

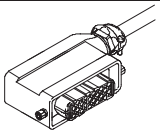

# Electrical connection technology, for multi-pin plug connection

FESTO

Technical data – KMP1-...

Accessories for valve terminals  
Electrical connector systems

5.1

Ordering data								
	Electrical connection	Cable composition [mm <sup>2</sup> ]	Cable diameter [mm]	Product weight		Cable length [m]	Type	Part No.
				Cable [g/m]	Total [g]			
	25-pin plug socket	25x0.75	13		1,933	5	KMP1-02-II-4-5	175 654
	25-pin plug socket	25x0.75	13		3,676	10	KMP1-02-II-4-10	175 655
	25-pin plug socket	25x0.75	13	Approx. 370	Acc. to length	Any	KMP1-02-II-4-X	158 988
	40-pin plug socket	39x0.75	17		2,995	5	KMP1-02-II-8-5	175 656
	40-pin plug socket	39x0.75	17		5,672	10	KMP1-02-II-8-10	175 657
	40-pin plug socket	39x0.75	17	Approx. 570	Acc. to length	Any	KMP1-02-II-8-X	158 989
	72-pin plug socket	50x0.75	19		3,908	5	KMP1-02-II-10-5	175 658
	72-pin plug socket	50x0.75	19		7,300	10	KMP1-02-II-10-10	175 659
	72-pin plug socket	50x0.75	19	Approx. 700	Acc. to length	Any	KMP1-02-II-10-X	158 990
	72-pin plug socket	65x0.75	22		6,000	5	KMP1-02-II-14-5	175 660
	72-pin plug socket	65x0.75	22		11,300	10	KMP1-02-II-14-10	175 661
	72-pin plug socket	65x0.75	22	Approx. 930	Acc. to length	Any	KMP1-02-II-14-X	158 991
	72-pin plug socket	80x0.75	24		5,326	5	KMP1-02-II-16-5	175 662
	72-pin plug socket	80x0.75	24		10,650	10	KMP1-02-II-16-10	175 663
	72-pin plug socket	80x0.75	24	Approx. 1160	Acc. to length	Any	KMP1-02-II-16-X	158 992
	25-pin plug socket	13x0.75	10		1,200	5	KMP1-02-VI-6-5	175 585
	25-pin plug socket	13x0.75	10		2,188	10	KMP1-02-VI-6-10	175 586
	25-pin plug socket	13x0.75	10	Approx. 180	Acc. to length	Any	KMP1-02-VI-6-X	158 984
	25-pin plug socket	25x0.75	13		1,967	5	KMP1-02-VI-12-5	175 587
	25-pin plug socket	25x0.75	13		3,667	10	KMP1-02-VI-12-10	175 588
	25-pin plug socket	25x0.75	13	Approx. 370	Acc. to length	Any	KMP1-02-VI-12-X	158 986
	40-pin plug socket	39x0.75	17		3,016	5	KMP1-02-VI-16-5	175 589
	40-pin plug socket	39x0.75	17		5,800	10	KMP1-02-VI-16-10	175 590
	40-pin plug socket	39x0.75	17	Approx. 570	Acc. to length	Any	KMP1-02-VI-16-X	158 987

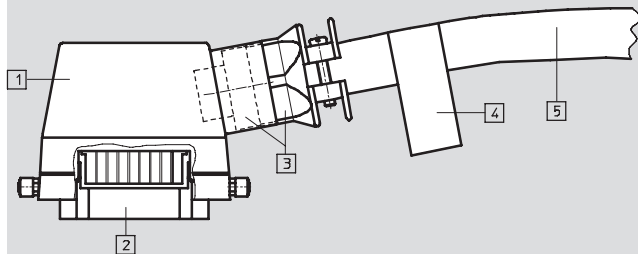
# Electrical connection technology, for multi-pin plug connection

Technical data – KMP1-...

**Dimensions** Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

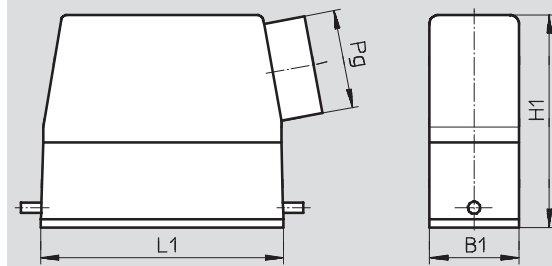
KMP1-...

Cable assembled



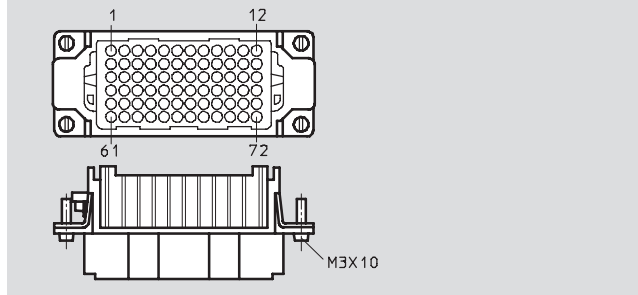
- 1 Housing
- 2 Socket insert with protective earth connection
- 3 Cable gland fitting with sealing set
- 4 Label with part number, type and cable length
- 5 Cable

Housing

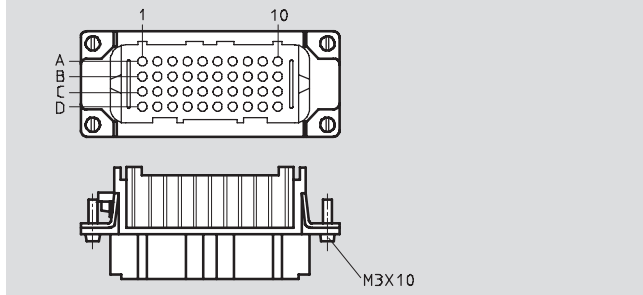


	25-pin	40-pin	72-pin
L1	79.5 mm	93.5 mm	93.5 mm
B1	29.5 mm	43 mm	43 mm
H1	54.5 mm	60 mm	76 mm
Pg	16	21	29

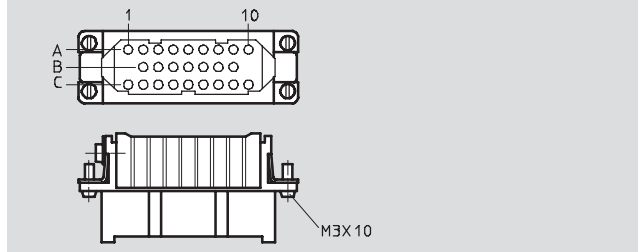
Socket insert, 72-pin



Socket insert, 40-pin



Socket insert, 25-pin



# Electrical connection technology, for multi-pin plug connection

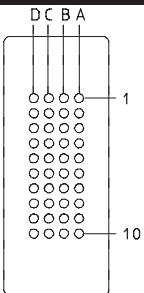
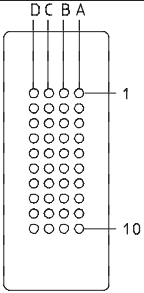
Technical data – KMP1-...



Wiring allocation (socket view)						
KMP1-02-II-4-...						
	Pin Row A	Wire number	Pin Row B	Wire number	Pin Row C	Wire number
	1	4			1	20
	2	5	2	13	2	21
	3	6	3	14	3	22
	4	7	4	15	4	23
	5	8	5	16	5	24
	6	9	6	17	6	25
	7	10	7	18	7	1
	8	11	8	19	8	2
	9	12			9	3
KMP1-02-VI-6-...						
	Pin Row A	Wire number	Pin Row B	Wire number	Pin Row C	Wire number
	1	2			1	–
	2	3	2	11	2	–
	3	4	3	12	3	–
	4	5	4	13	4	–
	5	6	5	–	5	–
	6	7	6	–	6	–
	7	8	7	–	7	–
	8	9	8	–	8	–
	9	10			9	1
KMP1-02-VI-12-...						
	Pin Row A	Wire number	Pin Row B	Wire number	Pin Row C	Wire number
	1	2			1	18
	2	3	2	11	2	19
	3	4	3	12	3	20
	4	5	4	13	4	21
	5	6	5	14	5	22
	6	7	6	15	6	23
	7	8	7	16	7	24
	8	9	8	17	8	25
	9	10			9	1

# Electrical connection technology, for multi-pin plug connection

Technical data – KMP1-...

Wiring allocation (socket view)								
KMP1-02-II-8-...								
	Pin Row A	Wire number	Pin Row B	Wire number	Pin Row C	Wire number	Pin Row D	Wire number
	1	4	1	14	1	22	1	32
	2	5	2	15	2	23	2	33
	3	6	3	16	3	24	3	34
	4	7	4	17	4	25	4	35
	5	8	5	18	5	26	5	36
	6	9	6	19	6	27	6	37
	7	10	7	2	7	28	7	38
	8	11	8	21	8	29	8	39
	9	12	9	–	9	30	9	2
	10	13	10	1	10	31	10	3
KMP1-02-VI-16-...								
	Pin Row A	Wire number	Pin Row B	Wire number	Pin Row C	Wire number	Pin Row D	Wire number
	1	3	1	13	1	23	1	33
	2	4	2	14	2	24	2	34
	3	5	3	15	3	25	3	35
	4	6	4	16	4	26	4	36
	5	7	5	17	5	27	5	37
	6	8	6	18	6	28	6	38
	7	9	7	19	7	29	7	39
	8	10	8	20	8	30	8	–
	9	11	9	21	9	31	9	1
	10	12	10	22	10	32	10	2

# Electrical connection technology, for multi-pin plug connection

Technical data – KMP1-...



Wiring allocation (socket view)												
KMP1-02-II-10-...												
	Pin	Wire number	Pin	Wire number	Pin	Wire number	Pin	Wire number	Pin	Wire number	Pin	Wire number
	1	4	13	16	25	–	37	26	49	38	61	50
	2	5	14	17	26	–	38	27	50	39	62	–
	3	6	15	18	27	–	39	28	51	40	63	–
	4	7	16	19	28	–	40	29	52	41	64	–
	5	8	17	20	29	–	41	30	53	42	65	–
	6	9	18	21	30	–	42	31	54	43	66	–
	7	10	19	22	31	–	43	32	55	44	67	–
	8	11	20	23	32	–	44	33	56	45	68	–
	9	12	21	24	33	–	45	34	57	46	69	–
	10	13	22	25	34	–	46	35	58	47	70	–
	11	14	23	–	35	–	47	36	59	48	71	2
	12	15	24	–	36	1	48	37	60	49	72	3

KMP1-02-II-14-...												
	Pin	Wire number	Pin	Wire number	Pin	Wire number	Pin	Wire number	Pin	Wire number	Pin	Wire number
	1	4	13	16	25	28	37	34	49	46	61	58
	2	5	14	17	26	29	38	35	50	47	62	59
	3	6	15	18	27	30	39	36	51	48	63	60
	4	7	16	19	28	31	40	37	52	49	64	61
	5	8	17	20	29	32	41	38	53	50	65	62
	6	9	18	21	30	33	42	39	54	51	66	63
	7	10	19	22	31	–	43	40	55	52	67	64
	8	11	20	23	32	–	44	41	56	53	68	65
	9	12	21	24	33	–	45	42	57	54	69	–
	10	13	22	25	34	–	46	43	58	55	70	–
	11	14	23	26	35	–	47	44	59	56	71	2
	12	15	24	27	36	1	48	45	60	57	72	3

KMP1-02-II-16-...												
	Pin	Wire number	Pin	Wire number	Pin	Wire number	Pin	Wire number	Pin	Wire number	Pin	Wire number
	1	4	13	16	25	28	37	38	49	50	61	62
	2	5	14	17	26	29	38	39	50	51	62	63
	3	6	15	18	27	30	39	40	51	52	63	64
	4	7	16	19	28	31	40	41	52	53	64	65
	5	8	17	20	29	32	41	42	53	54	65	66
	6	9	18	21	30	33	42	43	54	55	66	67
	7	10	19	22	31	34	43	44	55	56	67	68
	8	11	20	23	32	35	44	45	56	57	68	69
	9	12	21	24	33	36	45	46	57	58	69	70
	10	13	22	25	34	37	46	47	58	59	70	71
	11	14	23	26	35	72	47	48	59	60	71	2
	12	15	24	27	36	1	48	49	60	61	72	3



# Electrical connection technology, for multi-pin plug connection

Technical data – KMP2-03-...

- Plug socket with cable for multi-pin connection of 24 inputs/outputs or 24 solenoid coils/valves
- Pre-assembled
- Cable lengths of 10 m or by customer request



Note

The only difference between KMP2-03-E-... (variant for inputs/outputs) and KMP2-03-V-... (variant for valves) lies in the different reverse polarity protection in the plug.



General technical data		KMP2-03-...
Type		Knurled ring
Type of mounting		Any
Mounting position		Any
Operating voltage range	[V]	Max. 250 AC
	[V]	Max. 300 DC
Current-carrying capacity	[A]	7.5
Cable composition	[mm <sup>2</sup> ]	26x0.75
Cable colour code		Black wires with continuous white numbering (1 ... 26)
Cable diameter	[mm]	15
Protection class to EN 60 529		IP65 (assembled)
Material of housing		Nickel-plated copper base alloy
Material of seal		Neoprene, light and oil resistant
Material of contacts		Gold-plated copper base alloy
Material of cable sheath		Polyvinyl chloride
Ambient temperature	[°C]	-20 ... +80
Ambient temperature of flexible cable installation	[°C]	-5 ... +80

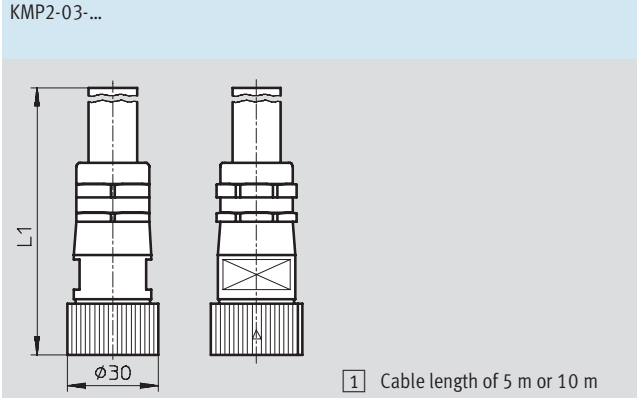
Ordering data						
View	Electrical connection	Product weight		Cable length [m]	Type	Part No.
		Cable [g/m]	Total [g]			
	26-pin plug socket		3600	10	<b>KMP2-03-E-10-26</b>	<b>175 665</b>
	26-pin plug socket	Approx. 350	Acc. to length	Any	<b>KMP2-03-E-X-26</b>	<b>18 683</b>
	26-pin plug socket		3637	10	<b>KMP2-03-V-10-26</b>	<b>175 667</b>
	26-pin plug socket	Approx. 350	Acc. to length	Any	<b>KMP2-03-V-X-26</b>	<b>18 681</b>

# Electrical connection technology, for multi-pin plug connection

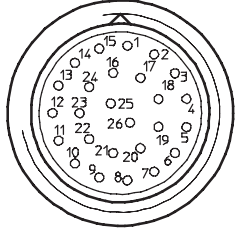
Technical data – KMP2-03-...



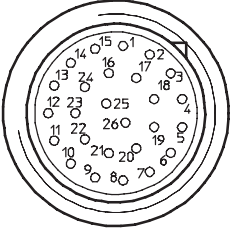
**Dimensions** Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)



Plug socket, N-coded  
(KMP2-03-V-...)



Plug socket, Y-coded  
(KMP2-03-E-...)



**Wiring allocation (soldering side view)**

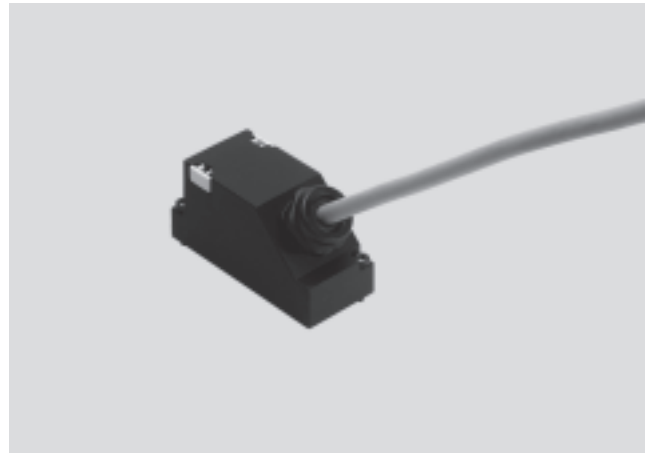
KMP2-03-...

	Pin	Wire number	Pin	Wire number	Pin	Wire number
	1	1	10	10	19	19
	2	2	11	11	20	20
	3	3	12	12	21	21
	4	4	13	13	22	22
	5	5	14	14	23	23
	6	6	15	15	24	24
	7	7	16	16	25	25
	8	8	17	17	26	26
	9	9	18	18	-	-

# Electrical connection technology, for multi-pin plug connection

Technical data – KMP3-...

- Plug socket with cable for multi-pin connection
- Pre-assembled
- Cable lengths of 5 m or 10 m
- 9-pin or 25-pin
- Sub-D



General technical data		KMP3-9P-...	KMP3-25P-...
Type			
Type of mounting		2 M3x16 screws	
Mounting position		Any	
Electrical connection		9-pin Sub-D socket	25-pin Sub-D socket
Nominal operating voltage	[V DC]	24	
Current-carrying capacity	[A]	3	
Cable diameter	[mm]	9.5	12
Protection class to EN 60 529		IP65 (assembled)	
Material of housing		Polyamide (Schulamid, 6GB30)	
Material of contacts		Gold-plated copper base alloy	
Material of cable sheath		Polyvinyl chloride	
Material of seal		Nitrile rubber (NBR)	
Ambient temperature	[°C]	-30 ... +80	
Ambient temperature of flexible cable installation	[°C]	-5 ... +80	

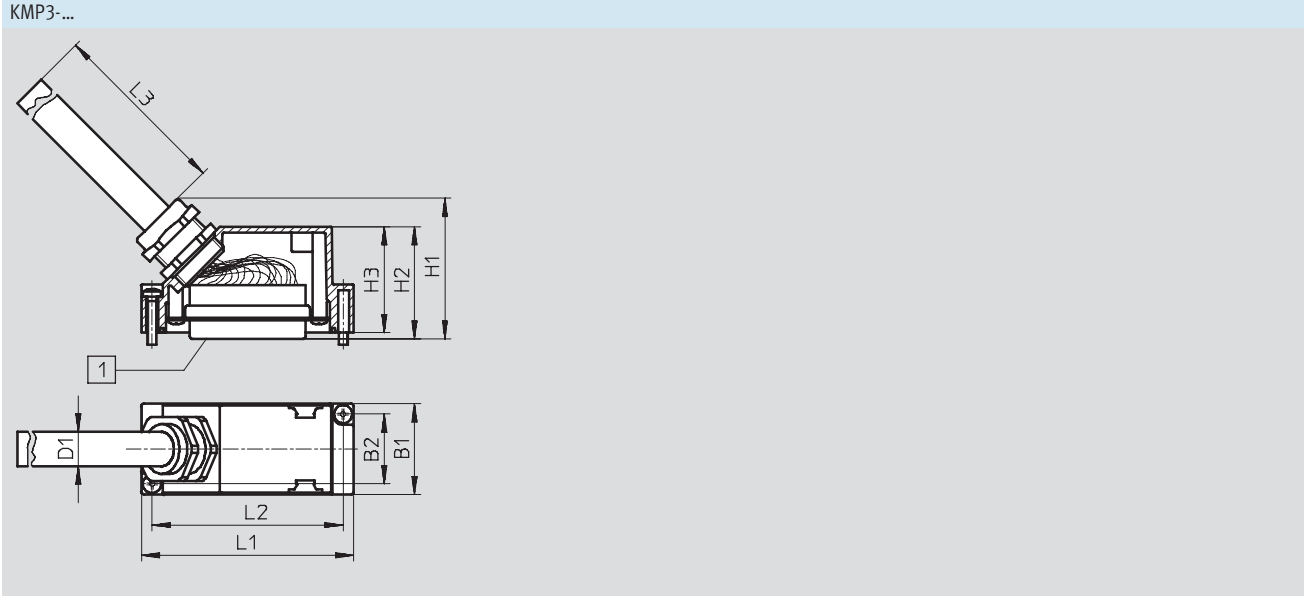
Ordering data						
	Cable composition [mm <sup>2</sup> ]	Product weight		Cable length [m]	Type	Part No.
		Cable [g/m]	Total [g]			
	10x0.34		425	5	<b>KMP3-9P-08-5</b>	<b>18 698</b>
	10x0.34		814	10	<b>KMP3-9P-08-10</b>	<b>18 579</b>
	10x0.34	Approx. 117	Acc. to length	Any	<b>KMP3-9P-08-X</b>	<b>18 697</b>
	18x0.34		672	5	<b>KMP3-25P-16-5</b>	<b>18 624</b>
	18x0.34		1,303	10	<b>KMP3-25P-16-10</b>	<b>18 625</b>
	18x0.34	Approx. 180	Acc. to length	Any	<b>KMP3-25P-16-X</b>	<b>18 699</b>
	24x0.25	Approx. 178	Acc. to length	Any	<b>KMP3-25P-22-X</b>	<b>163 971</b>

# Electrical connection technology, for multi-pin plug connection

Technical data – KMP3-...

FESTO

## Dimensions Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)



Type	1	B1	B2	D1	H1	H2	H3	L1	L2	L3
KMP3-09P-...	9-pin Sub-D socket	30	23	8.3	43	37	35	50	43	Length according to type (5 m, 10 m or any)
KMP3-25P-...	25-pin Sub-D socket	30	23	11.2	47	37	35	70	63	

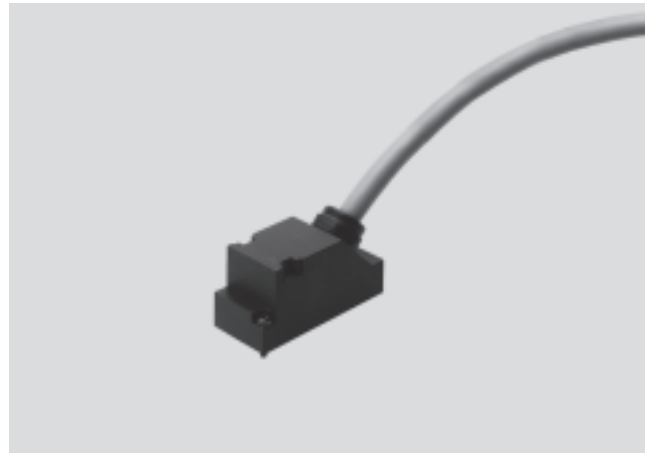
## Wiring allocation (socket view)

KMP3-9P-...								
	Pin	Core colour	Pin	Core colour				
	1	White	6	Blue				
	2	Green	7	Red				
	3	Yellow	8	Purple				
	4	Grey	9	Black				
	5	Pink	–	Brown				
KMP3-25P-16-... / KMP3-25P-22-...								
	Pin	Core colour	Pin	Core colour	Pin	Core colour	Pin	Core colour
	1	White	14	Yellow-brown	1	White	14	Yellow-brown
	2	Green	15	White-grey	2	Green	15	White-grey
	3	Yellow	16	Grey-brown	3	Yellow	16	Grey-brown
	4	Grey	17	–	4	Grey	17	White-pink
	5	Pink	18	–	5	Pink	18	Pink-brown
	6	Blue	19	–	6	Blue	19	White-blue
	7	Red	20	–	7	Red	20	Brown-blue
	8	Purple	21	–	8	Purple	21	White-red
	9	Grey-pink	22	–	9	Grey-pink	22	Brown-red
	10	Red-blue	23	–	10	Red-blue	23	–
	11	White-green	24	Brown	11	White-green	24	Brown
	12	Brown-green	25	Black	12	Brown-green	25	Black
	13	White-yellow	–	–	13	White-yellow	–	–

# Electrical connection technology, for multi-pin plug connection

Technical data – KMP4-...

- Plug socket with cable for multi-pin connection
- Pre-assembled
- Cable lengths of 5 m or 10 m
- 9-pin or 25-pin
- Sub-D
- Suitable for chain link trunking



General technical data		KMP4-9P-...	KMP4-25P-...
Type			
Type of mounting		2 M3x16 screws	
Mounting position		Any	
Electrical connection		9-pin Sub-D socket	25-pin Sub-D socket
Nominal operating voltage	[V DC]	24	
Current-carrying capacity	[A]	3	
Cable composition	[mm <sup>2</sup> ]	10x0.25	25x0.25
Protection class to EN 60 529		IP65 (assembled)	
Material of housing		Polyamide (Schulamid, 6GB30)	
Material of contacts		Gold-plated copper base alloy	
Material of seal		Nitrile rubber (NBR)	
Ambient temperature	[°C]	-40 ... +70	
Ambient temperature of flexible cable installation	[°C]	-5 ... +70	

Ordering data						
	Material of cable sheath	Product weight	Cable diameter	Cable length	Type	Part No.
		[g]	[mm]	[m]		
	Polyurethane	330	7.7	5	KMP4-9P-5-PUR	193 014
	Polyvinyl chloride	426	7.7	5	KMP4-9P-5-PVC	193 012
	Polyurethane	675	8.3	10	KMP4-9P-10-PUR	193 015
	Polyvinyl chloride	792	8.3	10	KMP4-9P-10-PVC	193 013
	Polyurethane	732	10.8	5	KMP4-25P-5-PUR	193 018
	Polyvinyl chloride	854	10.8	5	KMP4-25P-5-PVC	193 016
	Polyurethane	1411	11.2	10	KMP4-25P-10-PUR	193 019
	Polyvinyl chloride	1617	11.2	10	KMP4-25P-10-PVC	193 017

# Electrical connection technology, for multi-pin plug connection

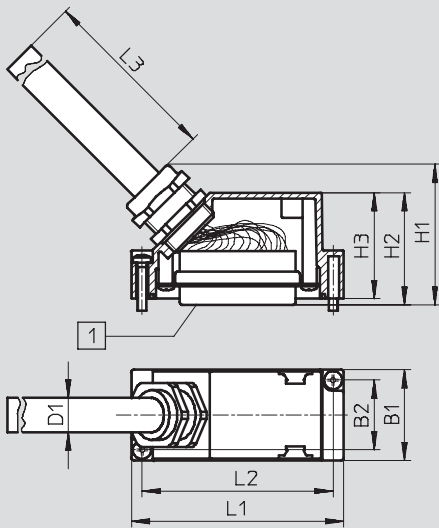
Technical data – KMP4-...



## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

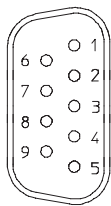
KMP4-...



Type	1	B1	B2	D1	H1	H2	H3	L1	L2	L3
KMP4-09P...-PVC	9-pin Sub-D socket	30	23	8.3	43	37	35	50	43	Length according to type (5 m or 10 m)
KMP4-09P...-PUR	9-pin Sub-D socket	30	23	7.7	43	37	35	50	43	
KMP4-25P...-PVC	25-pin Sub-D socket	30	23	11.2	47	37	35	70	63	
KMP4-25P...-PUR	25-pin Sub-D socket	30	23	10.8	47	37	35	70	63	

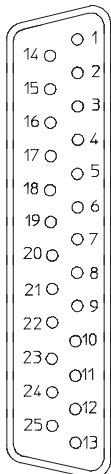
## Wiring allocation (socket view)

KMP4-9P-...



Pin	Core colour	Pin	Core colour
1	White	6	Blue
2	Green	7	Red
3	Yellow	8	Purple
4	Grey	9	Black
5	Pink	-	Brown

KMP4-25P-...



Pin	Core colour	Pin	Core colour
1	White	14	Yellow-brown
2	Green	15	White-grey
3	Yellow	16	Grey-brown
4	Grey	17	White-pink
5	Pink	18	Pink-brown
6	Blue	19	White-blue
7	Red	20	Brown-blue
8	Purple	21	White-red
9	Grey-pink	22	Brown-red
10	Red-blue	23	White-black
11	White-green	24	Brown
12	Brown-green	25	Black
13	White-yellow		

# Electrical connection technology, for multi-pin plug connection

Technical data – KMP6-...

- Plug socket with cable for multi-pin connection
- Pre-assembled
- Cable lengths 2.5 m, 5 m or 10 m
- 9-pin, 15-pin, 25-pin or 26-pin
- Sub-D
- Suitable for chain link trunking



General technical data					
Type	KMP6-9P-...	KMP6-15P-...	KMP6-25P-12-...	KMP6-25P-20-...	KMP6-26P-...
Type of mounting	2 M4x6.3 screws				
Mounting position	Any				
Operating voltage range [V]	24 DC				
Current-carrying capacity [A]	2.8				2.5
Cable diameter [mm]	7.6	8.5	8.5	10.3	8.6
Protection class to EN 60 529	IP40 (assembled)				
Material of housing	Polyester, fibreglass reinforced				
Material of contacts	Gold-plated copper base alloy				
Material of cable sheath	Polyvinyl chloride				
Ambient temperature [°C]	-30 ... +80				
Ambient temperature of flexible cable installation [°C]	-5 ... +80				

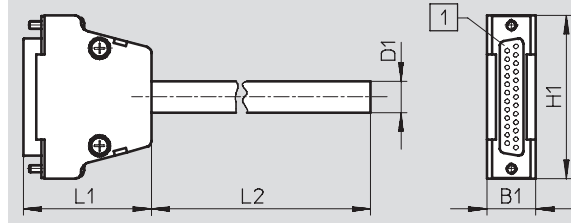
Ordering data						
	Electrical connection	Cable composition [mm <sup>2</sup> ]	Product weight [g]	Cable length [m]	Type	Part No.
	9-pin Sub-D socket	8x0.34 + 1x0.5	248	2.5	<b>KMP6-09P-08-2,5</b>	<b>531 184</b>
		8x0.34 + 1x0.5	454	5	<b>KMP6-09P-08-5</b>	<b>531 185</b>
		8x0.34 + 1x0.5	864	10	<b>KMP6-09P-08-10</b>	<b>531 186</b>
	15-pin Sub-D socket	15x0.34	293	2.5	<b>KMP6-15P-12-2,5</b>	<b>527 543</b>
		15x0.34	585	5	<b>KMP6-15P-12-5</b>	<b>527 544</b>
		15x0.34	1,134	10	<b>KMP6-15P-12-10</b>	<b>527 545</b>
	25-pin Sub-D socket	15x0.34	329	2.5	<b>KMP6-25P-12-2,5</b>	<b>530 049</b>
		15x0.34	590	5	<b>KMP6-25P-12-5</b>	<b>530 050</b>
		15x0.34	1140	10	<b>KMP6-25P-12-10</b>	<b>530 051</b>
	25-pin Sub-D socket	20x0.25 + 5x0.34	432	2.5	<b>KMP6-25P-20-2,5</b>	<b>530 046</b>
		20x0.25 + 5x0.34	814	5	<b>KMP6-25P-20-5</b>	<b>530 047</b>
		20x0.25 + 5x0.34	1600	10	<b>KMP6-25P-20-10</b>	<b>530 048</b>
	26-pin Sub-D socket	20x0.25	Approx. 280	2.5	<b>KMP6-26P-16-2,5</b>	<b>527 546</b>
		20x0.25	Approx. 570	5	<b>KMP6-26P-16-5</b>	<b>527 547</b>
20x0.25		1145	10	<b>KMP6-26P-16-10</b>	<b>527 548</b>	

# Electrical connection technology, for multi-pin plug connection

Technical data – KMP6-...

Dimensions Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

KMP6-...

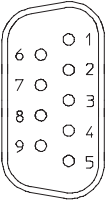
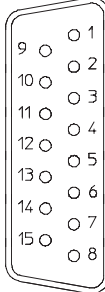


Type	1	B1	D1	H1	L1	L2
KMP6-09P-...	9-pin Sub-D socket	16	7.6	31.2	34.5	Length according to type (2.5 m, 5 m or 10 m)
KMP6-15P-...	15-pin Sub-D socket	16	8.5	40	34.5	
KMP6-25P-12-...	25-pin Sub-D socket	16	8.5	53.4	37.7	
KMP6-25P-20-...	25-pin Sub-D socket	16	10.3	53.4	37.7	
KMP6-26P-...	26-pin Sub-D socket	16	8.6	40	34.5	



# Electrical connection technology, for multi-pin plug connection

Technical data – KMP6-...

Wiring allocation (socket view)				
KMP6-9P-...				
	Pin	Core colour	Pin	Core colour
	1	White	6	Pink
	2	Brown	7	Blue
	3	Green	8	Red
	4	Yellow	9	Black <sup>1)</sup>
5	Grey			
KMP6-15P-...				
	Pin	Core colour	Pin	Core colour
	1	White	9	Black
	2	Brown	10	Purple
	3	Green	11	Grey-pink
	4	Yellow	12	Red-blue
	5	Grey	13	White-green
	6	Pink	14	Brown-green
	7	Blue	15	White-yellow
8	Red			

1) Wire cross section 0.5 mm<sup>2</sup>

# Electrical connection technology, for multi-pin plug connection

Technical data – KMP6-...



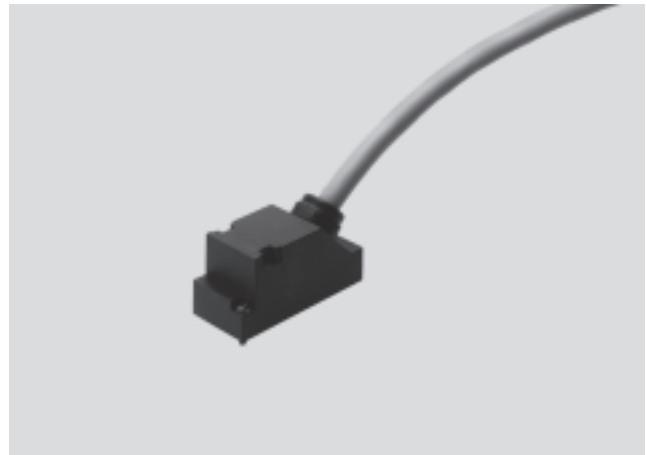
Wiring allocation (socket view)								
	KMP6-25P-12-...				KMP6-25P-20-...			
	Pin	Core colour	Pin	Core colour	Pin	Core colour	Pin	Core colour
	1	White	14	–	1	White	14	Brown-green
	2	Brown	15	–	2	Brown	15	White-yellow
	3	Green	16	–	3	Green	16	Yellow-brown
	4	Yellow	17	–	4	Yellow	17	White-grey
	5	Grey	18	–	5	Grey	18	Grey-brown
	6	Pink	19	–	6	Pink	19	White-pink
	7	Blue	20	–	7	Blue	20	Pink-brown
	8	Red	21	–	8	Red	21	White-blue <sup>1)</sup>
	9	Black	22	–	9	Black	22	Brown-blue <sup>1)</sup>
	10	Purple	23	White-green	10	Purple	23	White-red <sup>1)</sup>
	11	Grey-pink	24	Brown-green	11	Grey-pink	24	Brown-red <sup>1)</sup>
	12	Red-blue	25	White-yellow	12	Red-blue	25	White-black <sup>1)</sup>
	13	–			13	White-green		
KMP6-26P-...								
	Pin	Core colour	Pin	Core colour				
	1	White	14	Brown-green				
	2	Brown	15	White-yellow				
	3	Green	16	Yellow-brown				
	4	Yellow	17	–				
	5	Grey	18	–				
	6	Pink	19	–				
	7	Blue	20	–				
	8	Red	21	–				
	9	Black	22	–				
	10	Purple	23	White-grey				
	11	Grey-pink	24	Grey-brown				
	12	Red-blue	25	White-pink				
	13	White-green	26	Pink-brown				

1) Wire cross section 0.34 mm<sup>2</sup>

# Electrical connection technology, for multi-pin plug connection

Technical data – KEA-1-25P-...

- Plug socket with cable for multi-pin connection
- Pre-assembled
- Cable lengths of 5 m, 10 m or by customer request
- 25-pin
- Sub-D



General technical data		KEA-1-25P-...
Type		KEA-1-25P-...
Type of mounting		2 M3x16 screws
Mounting position		Any
Electrical connection		25-pin Sub-D socket
Operating voltage range	[V]	250 AC
	[V]	250 DC
Current-carrying capacity	[A]	4
Cable diameter	[mm]	12
Protection class to EN 60 529		IP65 (assembled)
Material of housing		Polyamide (Schulamid, 6GB30)
Material of contacts		Gold-plated copper base alloy
Material of cable sheath		Polyvinyl chloride
Ambient temperature	[°C]	-20 ... +80
Ambient temperature of flexible cable installation	[°C]	-5 ... +70

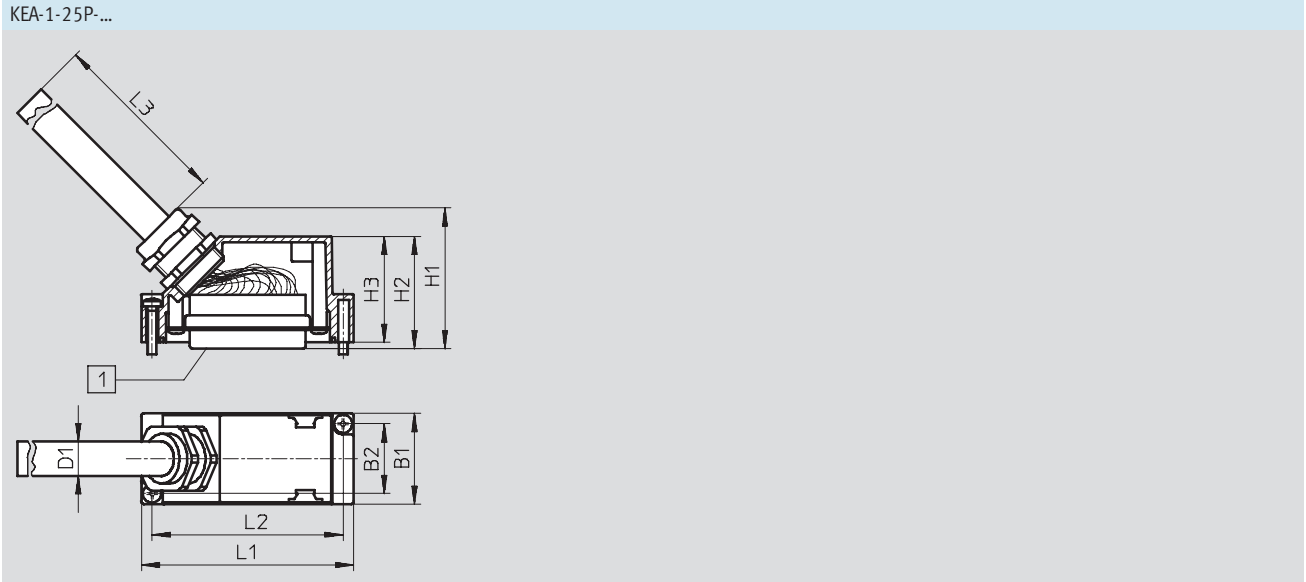
Ordering data						
	Cable composition [mm <sup>2</sup> ]	Product weight		Cable length [m]	Type	Part No.
		Cable [g/m]	Total [g]			
	25x0.34		1092	5	KEA-1-25P-5	177 413
	25x0.34		2040	10	KEA-1-25P-10	177 414
	25x0.34	Approx. 190	Acc. to length	Any	KEA-1-25P-X	177 415

# Electrical connection technology, for multi-pin plug connection

Technical data – KEA-1-25P-...



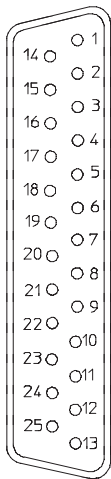
**Dimensions** Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)



Type	1	B1	B2	D1	H1	H2	H3	L1	L2	L
KEA-1-25P-...	25-pin Sub-D socket	30	23	12	47	37	35	70	63	Length according to type (5 m or 10 m)

**Wiring allocation (socket view)**

Pin	Core colour
1	White
2	Green
3	Yellow
4	Grey
5	Pink
6	Blue
7	Red
8	Purple
9	Grey-pink
10	Red-blue
11	White-green
12	Brown-green
13	White-yellow
14	Yellow-brown
15	White-grey
16	Grey-brown
17	White-pink
18	Pink-brown
19	White-blue
20	Brown-blue
21	White-red
22	Brown-red
23	White-black
24	Brown
25	Black



# Electrical connection technology, for multi-pin plug connection

Technical data – KMPV-...

- Plug socket with cable for multi-pin connection (to multi-pin plug distributor MPV-...)
- Pre-assembled
- Cable lengths of 5 m or 10 m
- 15-pin
- Sub-D



General technical data		KMPV-...
Type		KMPV-...
Type of mounting		2 M4x16 screws
Mounting position		Any
Electrical connection		15-pin Sub-D socket
Operating voltage range	[V]	30 DC
Current-carrying capacity	[A]	2.8
Cable diameter	[mm]	8.2
Protection class to EN 60 529		IP65 (assembled)
Material of housing		Polyester, fibreglass reinforced
Material of contacts		Gold-plated copper base alloy
Material of cable sheath		Polyurethane
Ambient temperature	[°C]	-20 ... +80

Ordering data					
	Cable composition [mm <sup>2</sup> ]	Product weight [g]	Cable length [m]	Type	Part No.
	15x0.25	300	5	KMPV-SUB-D-15-5	177 673
	15x0.25	400	10	KMPV-SUB-D-15-10	177 674

# Electrical connection technology, for multi-pin plug connection

Technical data – KMPV-...

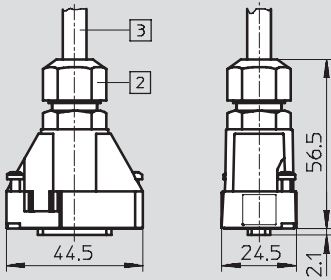
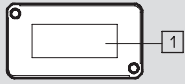
**FESTO**

Accessories for valve terminals  
Electrical connector systems

## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

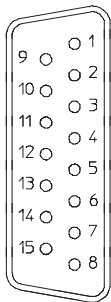
KMPV-...



- 1 Sub-D plug, 15-pin
- 2 Cable gland fitting PG9
- 3 Cable length of 5 m or 10 m

## Wiring allocation (socket view)

KMPV-...



Pin	Core colour	Pin	Core colour
1	White	9	Black
2	Brown	10	Purple
3	Green	11	Grey-pink
4	Yellow	12	Red-blue
5	Grey	13	White-green
6	Pink	14	Brown-green
7	Blue	15	White-yellow
8	Red		

# Electrical connection technology, for multi-pin plug connection

Technical data – SD-SUB-BU...

- Plug socket for multi-pin connection
- Can be fabricated with any cable lengths
- 9-pin or 25-pin
- Sub-D



General technical data		
Type	SD-SUB-BU...	
Type of mounting	2 M3x16 screws	
Mounting position	Any	
Operating voltage range	[V]	250 AC
	[V]	250 DC
Current-carrying capacity	[A]	5
Protection class to EN 60 529	IP65 (assembled)	
Material of housing	Polyamide (Schulamid, 6GB30)	
Material of contacts	Gold-plated copper base alloy	
Material of seal	Nitrile rubber (NBR)	
Ambient temperature	[°C]	-55 ... +125

Ordering data						
	Electrical connection	Cable gland connection	Perm. cable diameter [mm]	Product weight [g]	Type	Part No.
	9-pin Sub-D socket	PG9	6 ... 9	38	<b>SD-SUB-D-BU9</b>	<b>18 708</b>
	25-pin Sub-D socket	PG11	7 ... 12	53	<b>SD-SUB-D-BU25</b>	<b>18 709</b>

# Electrical connection technology, for multi-pin plug connection

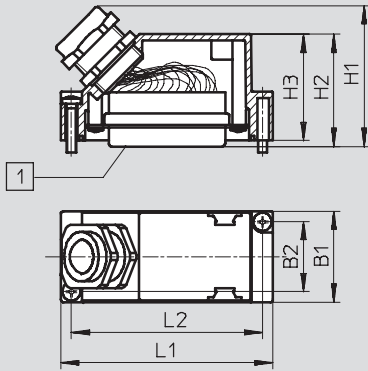


Technical data – SD-SUB-BU-...

## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

SD-SUB-BU-...



Type	1	B1	B2	H1	H2	H3	L1	L2
SD-SUB-D-BU9	9-pin Sub-D socket	30	23	43	37	35	50	43
SD-SUB-D-BU25	25-pin Sub-D socket	30	23	47	37	35	70	63



# Electrical connection technology, for multi-pin plug connection

Technical data – NEBV-S1G25-...

- Connecting cable for multi-pin plug connection
- Pre-assembled
- Cable lengths 2.5 m, 5 m or 10 m
- 15-pin or 25-pin
- Sub-D



General technical data		
Type	NEBV-S1G25-K-...-LE15	
	NEBV-S1G25-K-...-LE25	
Type of mounting	4-40 UNC	
Nominal operating voltage	[V]	24 DC
CableØ	[mm]	9
Min. cable bending radius	[mm]	90
Material of casing	Polybutylene terephthalate	
Material of union nut	Polyamide	
Material of cable sheath	Polyvinyl chloride	

Operating and environmental conditions	
Ambient temperature of flexible cable installation	[°C] -5 ... +50
Corrosion resistance class CRC <sup>1)</sup>	2

1) Corrosion resistance class 2 according to Festo standard 940 070  
Components subject to moderate corrosion stress. Externally visible parts with primarily decorative surface requirements which are in direct contact with a normal industrial environment or media such as coolants or lubricating agents.

Ordering data						
	Electrical connection	Cable composition [mm <sup>2</sup> ]	Product weight [g]	Cable length [m]	Type	Part No.
	15-pin socket, Sub-D	15x0.34	370	2.5	NEBV-S1G25-K-2,5-N-LE15	538 222
		15x0.34	670	5	NEBV-S1G25-K-5-N-LE15	538 223
		15x0.34	1270	10	NEBV-S1G25-K-10-N-LE15	538 224
	25-pin socket, Sub-D	20x0.25 + 5x0.34	490	2.5	NEBV-S1G25-K-2,5-N-LE25	538 225
		20x0.25 + 5x0.34	910	5	NEBV-S1G25-K-5-N-LE25	538 226
		20x0.25 + 5x0.34	1750	10	NEBV-S1G25-K-10-N-LE25	538 227

# Electrical connection technology, for multi-pin plug connection

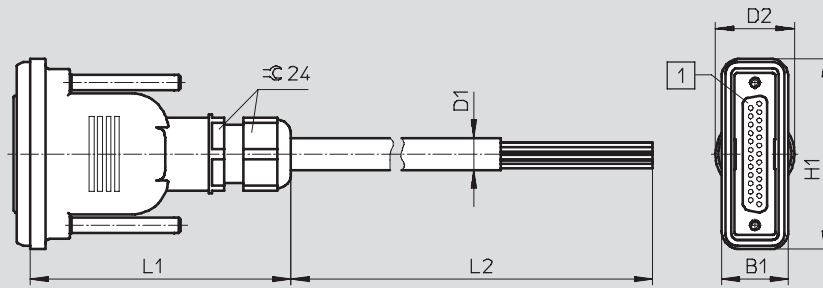
Technical data – NEBV-S1G25-...



## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

NEBV-S1G25-K-...



Type	1	B1	D1 ∅	D2 ∅	H1	L1	L2
NEBV-S1G25-K-...-LE25	Sub-D socket, 25-pin	22	10.4	26	62.8	86	Length according to type (2.5 m, 5 m or 10 m)
NEBV-S1G25-K-...-LE15	Sub-D socket, 15-pin		9				

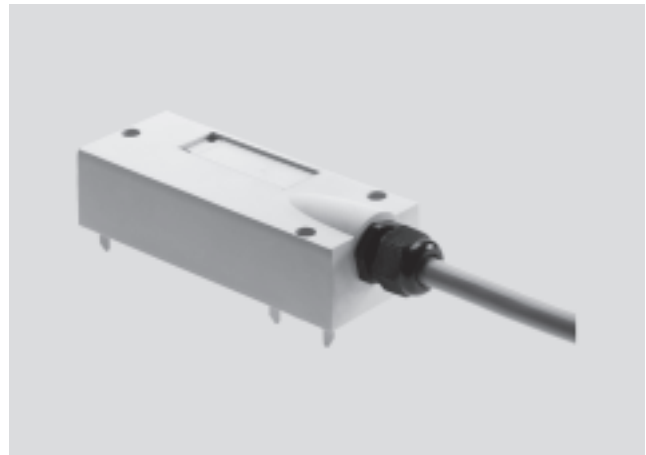
## Wiring allocation (socket view)

	NEBV-S1G25-K-...-LE15				NEBV-S1G25-K-...-LE25			
	Pin	Core colour	Pin	Core colour	Pin	Core colour	Pin	Core colour
	1	white	24	brown-green	1	white	14	brown-green
	2	brown	25	white-yellow	2	brown	15	white-yellow
	3	green			3	green	16	yellow-brown
	4	yellow			4	yellow	17	white-grey
	5	grey			5	grey	18	grey-brown
	6	pink			6	pink	19	white-pink
	7	blue			7	blue	20	pink-brown
	8	red			8	red	21	white-blue
	9	black			9	black	22	brown-blue
	10	purple			10	purple	23	white-red
	11	grey-pink			11	grey-pink	24	brown-red
	12	red-blue			12	red-blue	25	white-black
	13	white-green			13	white-green		

# Electrical connection technology, for multi-pin plug connection

Technical data – NEBV-S1W37-...

- Plug socket with cable for multi-pin connection
- Pre-assembled
- Cable lengths 2.5 m, 5 m or 10 m
- 10-pin, 26-pin, 27-pin or 37-pin
- Sub-D



General technical data		NEBV-S1W37-...-LE10	NEBV-S1W37-...-LE26	NEBV-S1W37-...-LE27	NEBV-S1W37-...-LE37
Type					
Nominal operating voltage	[V]	24 DC			
Operating voltage range	[V]	21.6 ... 26.4 DC			
Cable Ø	[mm]	7.7	11.5	11.5	13
Protection class to EN 60529		IP65			
Protection class to NEMA		NEMA4			
Housing material		Polyamide			
Cable sheath material		Polyurethane or polyvinyl chloride → Ordering data			
Ambient temperature	[°C]	-5 ... +50			

Ordering data							
	Electrical connection	Cable design [mm <sup>2</sup> ]	Suitable for chain link trunking	Product weight [g]	Cable length [m]	Type	Part No.
Cable sheath made of polyurethane							
	Socket, 10-pin, Sub-D	10x0.34	■	383	2.5	NEBV-S1W37-E-2,5-LE10	539 240
	Socket, 10-pin, Sub-D	10x0.34	■	570	5	NEBV-S1W37-E-5-LE10	539 241
	Socket, 10-pin, Sub-D	10x0.34	■	954	10	NEBV-S1W37-E-10-LE10	539 242
	Socket, 26-pin, Sub-D	26x0.34	■	649	2.5	NEBV-S1W37-E-2,5-LE26	539 243
	Socket, 26-pin, Sub-D	26x0.34	■	1101	5	NEBV-S1W37-E-5-LE26	539 244
	Socket, 26-pin, Sub-D	26x0.34	■	2010	10	NEBV-S1W37-E-10-LE26	539 245
	Socket, 37-pin, Sub-D	37x0.34	-	820	2.5	NEBV-S1W37-K-2,5-LE37	539 246
	Socket, 37-pin, Sub-D	37x0.34	-	1422	5	NEBV-S1W37-K-5-LE37	539 247
	Socket, 37-pin, Sub-D	37x0.34	-	2619	10	NEBV-S1W37-K-10-LE37	539 248
Cable sheath made of polyvinyl chloride							
	Socket, 10-pin, Sub-D	10x0.34	-	388	2.5	NEBV-S1W37-KM-2,5-LE10	543 271
	Socket, 10-pin, Sub-D	10x0.34	-	592	5	NEBV-S1W37-KM-5-LE10	543 272
	Socket, 10-pin, Sub-D	10x0.34	-	997	10	NEBV-S1W37-KM-10-LE10	543 273
	Socket, 27-pin, Sub-D	27x0.34	-	749	2.5	NEBV-S1W37-KM-2,5-LE26	543 274
	Socket, 27-pin, Sub-D	27x0.34	-	1285	5	NEBV-S1W37-KM-5-LE26	543 275
	Socket, 27-pin, Sub-D	27x0.34	-	2371	10	NEBV-S1W37-KM-10-LE26	543 276
	Socket, 37-pin, Sub-D	37x0.34	-	903	2.5	NEBV-S1W37-KM-2,5-LE37	543 277
	Socket, 37-pin, Sub-D	37x0.34	-	1610	5	NEBV-S1W37-KM-5-LE37	543 278
	Socket, 37-pin, Sub-D	37x0.34	-	2955	10	NEBV-S1W37-KM-10-LE37	543 279

# Electrical connection technology, for multi-pin plug connection

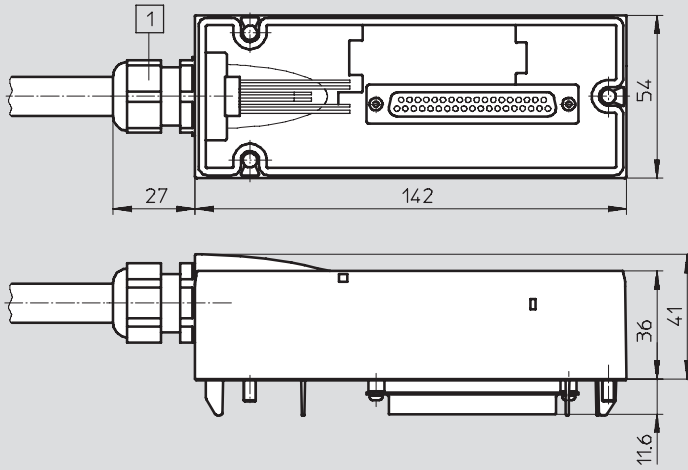


Technical data – NEBV-S1W37-...

## Dimensions

Download CAD data → [www.festo.com/en/engineering](http://www.festo.com/en/engineering)

NEBV-S1W37-...



1 Cable conduit fitting M20x1.5

# Electrical connection technology, for multi-pin plug connection

Technical data – NEBV-S1W37-...

Wiring allocation (socket view)									
		NEBV-S1W37-...-LE10		NEBV-S1W37-...-LE26		NEBV-S1W37-...-LE27		NEBV-S1W37-...-LE37	
		Pin	Core colour	Pin	Core colour	Pin	Core colour	Pin	Core colour
	1	White	1	White	1	White	1	White	
	2	Brown	2	Brown	2	Brown	2	Brown	
	3	Green	3	Green	3	Green	3	Green	
	4	Yellow	4	Yellow	4	Yellow	4	Yellow	
	5	Grey	5	Grey	5	Grey	5	Grey	
	6	Pink	6	Pink	6	Pink	6	Pink	
	7	Blue	7	Blue	7	Blue	7	Blue	
	8	Red	8	Red	8	Red	8	Red	
	9	–	9	Grey-pink	9	Grey-pink	9	Grey-pink	
	10	–	10	Red-blue	10	Red-blue	10	Red-blue	
	11	–	11	White-green	11	White-green	11	White-green	
	12	–	12	Brown-green	12	Brown-green	12	Brown-green	
	13	–	13	White-yellow	13	White-yellow	13	White-yellow	
	14	–	14	Yellow-brown	14	Yellow-brown	14	Yellow-brown	
	15	–	15	White-grey	15	White-grey	15	White-grey	
	16	–	16	Grey-brown	16	Grey-brown	16	Grey-brown	
	17	–	17	White-pink	17	White-pink	17	White-pink	
	18	–	18	Pink-brown	18	Pink-brown	18	Pink-brown	
	19	–	19	White-blue	19	White-blue	19	White-blue	
	20	–	20	Brown-blue	20	Brown-blue	20	Brown-blue	
	21	–	21	White-red	21	White-red	21	White-red	
	22	–	22	Brown-red	22	Brown-red	22	Brown-red	
	23	–	23	–	23	Grey-green	23	Grey-green	
	24	–	24	–	24	–	24	Yellow-grey	
	25	–	25	–	25	–	25	Pink-green	
	26	–	26	–	26	–	26	Yellow-pink	
	27	–	27	–	27	–	27	Green-blue	
	28	–	28	–	28	–	28	Yellow-blue	
	29	–	29	–	29	–	29	Green-red	
	30	–	30	–	30	–	30	Yellow-red	
	31	–	31	–	31	–	31	Green-black	
	32	–	32	–	32	–	32	Grey-blue	
	33	–	33	–	33	–	33	Yellow-black	
	34	–	34	White-black	34	White-black	34	White-black	
	35	–	35	Brown-black	35	Brown-black	35	Brown-black	
	36	Black	36	Black	36	Black	36	Black	
	37	Magenta	37	Magenta	37	Magenta	37	Magenta	