Product group 2

Cable entry systems for entering non pre-terminated cables

Product description

At a glance ...

Even when entering standard cables Icotek offers a wide range of products that offer a lot of advantages in comparison to conventional cable glands.

The compact, slim and innovative design of the Icotek system offers a professional appearance and in many applications good strain relief.

Especially suitable for applications where a lot of cables have to be entered into a small space.

Benefits ...

1. High packing density
The cable entry plates KEL-DPZ and KEL-DP offer the opportunity to enter a large amount of cables through a small space.

2. Fast and easy assembly
The installation of cables is done by pushing the cables through the thin, pierceable membrane.

3. No new punch out tools needed
The KEL-DP range matches exactly the drilling templates, as well as cut outs according to the standard dimensions for multi pole connectors (for example from Harting, Wieland).
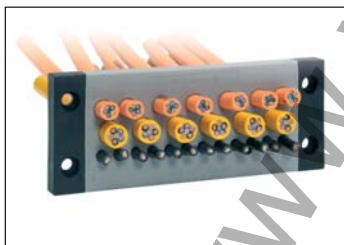
4. Tight seal
Depending on the product a high sealing rate up to IP 66 can be achieved.

5. Flexibility
Due to the large variety of designs and sizes available, there's a solution for every application.

6. Customized solutions
If you can't find what you need in our standard product offering, custom solutions are available upon request.

Product group 2

Cable entry systems for routing non pre-terminated cables

Chapter content

2

KEL - DPZ 24
Cable entry plates

Gasket on the front.

Gasket and strain relief on the back.

Product description

KEL-DPZ entry plates are designed to route and seal standard cables (from 3.2mm – 22mm in diameter) in limited space.
Simply push standard cables through the thin membrane and it's immediately sealed (IP65 / IP66) and strain relieved.
The KEL-DPZ series consists of four different versions. The size DPZ 24 matches exactly the cut-out dimensions of 24-pole standard industrial connectors (pages 46 - 47).

For applications with limited space the new KEL-DPZ-B and KEL-DPZ-E series are ideal. Despite its compact outer dimensions, up to 25 cables from 3.2 to 22 mm can be routed (pages 48 - 49).

The round versions of the KEL-DPZ series have a thread to fit in metric cut-outs from M32 to M63. Thus cut-outs for standard metric cable glands can be used (pages 50 - 51).

The assembly of the KEL-DPZ with cables or pneumatic hoses can be done within seconds. Simply put a small slit in the thin membrane and push the cable through.

ST Plugs (page 29) can be used for sealing pierced membranes if cables are removed.
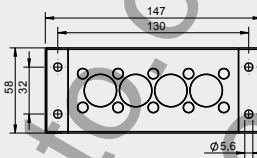
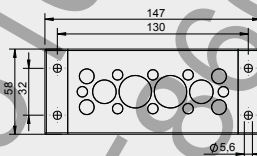| Description	Type	Order No.	Number of cables	PU
	KEL - DPZ 24 | 14	43700	10x 3.2 - 6.5 mm 4x 16 - 22 mm	10
	KEL - DPZ 24 | 15	43720	15x 7.2 - 12 mm	10
	KEL - DPZ 24 | 16	43725	8x 3.2 - 6.5 mm 4x 5.0 - 9.7 mm 2x 9.0 - 16.2 mm 2x 16 - 22 mm	10
	KEL - DPZ 24 | 17	43705	6x 3.2 - 6.5 mm 6x 5.0 - 10.2 mm 5x 9.0 - 16.2 mm	10
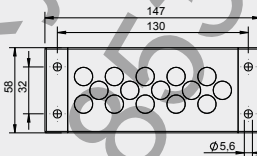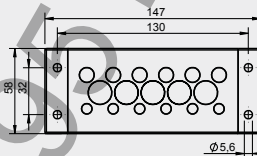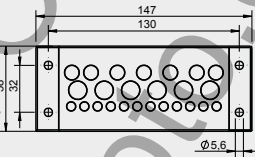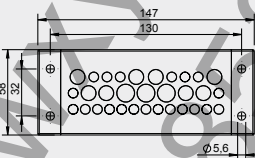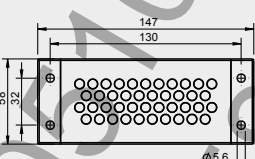
Type	Order No.	Number of cables	PU	Description
KEL - DPZ 24 | 25	43710	12x 3.2 - 6.5 mm 7x 4.8 - 9.7 mm 6x 7.5 - 12.0 mm	10	
KEL - DPZ 24 | 32	43730	3x 7.5 - 12.0 mm 8x 5.0 - 10.2 mm 21x 3.2 - 6.5 mm	10	
KEL - DPZ 24 | 42	43715	42x 3.2 - 6.5 mm	10	

Advantages

- Assembly within seconds
- High packing density
- Dual sealing of cables according to IP 65
- Automatic seal and strain relief for the cable

Specification

Material	Frame: Polyamide Sealing plate: Elastomer
Flame class	UL-94 V0, self-extinguishing
Protection class	IP 65
Temperature	- 40°C to + 90°C (static)
Properties	halogen-free, silicone-free
Cut-out dimensions	35 x 112 mm / page 124 | 125

Accessories

Plugs	Page 29
FP Flanged plates	Page 106 | 111

KEL - DPZ - B
Cable entry plates

Product description

The KEL-DPZ-B entry plates are designed for routing standard cables (without connectors) .

With an area of only 46 x 46 mm, up to 25 cables can be easily routed and sealed according to IP65.

Simply put a small slit in the thin membrane and push the cable through. Once the cable is through the membrane, it is immediately sealed and strain relieved.

ST Plugs (page 29) can be used for sealing pierced membranes if cables are removed.

Advantages

- Space saving shape
- Dual sealing of cables according to IP 66
- High packing density
- Assembly within seconds

Specification

Material	**Frame: Polyamide**
	Sealing plate: Elastomer
Flame class	**UL-94 V0, self-extinguishing**
Protection class	**IP 66**
Temperature	**- 40°C to + 90°C (static)**
Properties	**halogen-free, silicone-free**
Cut-out dimensions	**46 x 46 mm**

Accessories

FP Flanged plates

Description	Type	Order No.	Number of cables	PU
	KEL - DPZ B 13	43794	8x 3.2 - 6.5 mm 4x 5.0 - 10.2 mm 1x 16 - 22 mm	10
	KEL - DPZ B 17	43796	10x 3.2 - 6.5 mm 4x 5.0 - 10.2 mm 2x 7.5 - 12 mm 1x 9.0 - 16.2 mm	10
	KEL - DPZ B 25	43798	25x 3.2 - 6.5 mm	10

Description	Type	Order No.	Number of cables	PU
	KEL - DPZ - E 112 | 7	43780	7x 7.5 - 12 mm	10
	KEL - DPZ - E 112 | 21	43790	21x 3.2 - 6.5 mm	10

147
130
29
⌀5,70

147
130
29
⌀5,70

2

Product description

KEL-DPZ-E is designed for routing standard cables (without connectors).

With an area of only 18 x 112 mm, up to 21 cables can be easily routed and sealed according to IP66.

Simply put a small slit in the thin membrane and push the cable through. Once the cable is through the membrane, it is immediately sealed and strain relieved.

ST Plugs (page 29) can be used for sealing pierced membranes if cables are removed.

Advantages

- Space saving shape
- Dual sealing of cables according to IP 66
- High packing density
- Assembly within seconds

Specification

Material	**Frame: Polyamide**
	Sealing plate: Elastomer
Flame class	**UL-94 V0, self-extinguishing**
Protection class	**IP 66**
Temperature	**- 40°C to + 90°C (static)**
Properties	**halogen-free, silicone-free**
Cut-out dimensions	**18 x 112 mm / page 124 | 125**

KEL - DPZ round
Cable entry plates

Gasket on the front.

Gasket and strain relief on the back.

Product description

KEL-DPZ entry plates are designed to route and seal standard cables (from 3.2mm – 22mm in diameter) in limited space.
Simply push standard cables through the thin membrane and it's immediately sealed (IP65 / IP66) and strain relieved.
The KEL-DPZ series consists of four different versions. The size DPZ 24 matches exactly the cut-out dimensions of 24-pole standard industrial connectors (pages 46 - 47).

For applications with limited space the new KEL-DPZ-B and KEL-DPZ-E series are ideal. Despite its compact outer dimensions, up to 25 cables from 3.2 to 22 mm can be routed (pages 48 - 49).

The round versions of the KEL-DPZ series have a thread to fit in metric cut-outs from M32 to M63. Thus cut-outs for standard metric cable glands can be used (pages 50 - 51).

The assembly of the KEL-DPZ with cables or pneumatic hoses can be done within seconds. Simply put a small slit in the thin membrane and push the cable through.

ST Plugs (page 29) can be used for sealing pierced membranes if cables are removed.

Type	Order No.	Number of cables	Thread metric	External diameter	Exceeds cut-out	PU
KEL - DPZ 32 | 4	43732	3x 3.2 - 6.5 mm 1x 7.2 - 12.5 mm	M 32	44 mm	8.0 mm	10
KEL - DPZ 32 | 7	43734	7x 3.2 - 6.5 mm	M 32	44 mm	8.0 mm	10
KEL - DPZ 40 | 8	43741	4x 3.2 - 6.5 mm 4x 5.0 - 10.2 mm	M 40	52 mm	8.0 mm	10
KEL - DPZ 50 | 8	43750	5x 5.0 - 10.2 mm 3x 7.2 - 12.5 mm	M 50	62 mm	8.0 mm	10
KEL - DPZ 50 | 10	43751	7x 3.2 - 6.5 mm 2x 5.0 - 10.2 mm 1x 16.0 - 22.2 mm	M 50	62 mm	8.0 mm	10
KEL - DPZ 50 | 12	43752	4x 3.2 - 6.5 mm 8x 5.0 - 10.2 mm	M 50	62 mm	8.0 mm	10
KEL - DPZ 50 | 19	43758	19x 3.2 - 6.5 mm	M 50	62 mm	8.0 mm	10

Type	Order No.	Number of cables	Thread metric	External diameter	Exceeds cut-out	PU
KEL - DPZ 63 | 9	43760	1x 3.2 - 6.5 mm 3x 5.0 - 10.2 mm 4x 9.0 - 16.2 mm 1x 16.0 - 22.2 mm	M 63	75 mm	8.0 mm	10
KEL - DPZ 63 | 13	43761	4x 3.2 - 6.5 mm 4x 5.0 - 10.2 mm 5x 9.0 - 16.2 mm	M 63	75 mm	8.0 mm	10
KEL - DPZ 63 | 35	43763	35x 3.2 - 6.5 mm	M 63	75 mm	8.0 mm	10

Advantages

- Assembly within seconds
- High packing density
- Dual sealing of cables according IP 66
- Automatic seal and strain relief for the cable
- Suitable for standard or metric cut-outs
- Polyamide locknuts are included in the shipment

Specification

Material	**Thread frame: Polyamide** **Sealing plate: Elastomer**
Flame class	**UL-94 V0, self-extinguishing**
Protection class	**IP 66**
Temperature	**- 40°C to + 90°C (static)**
Properties	**halogen-free, silicone-free**
Thread length	**14 mm**
Cut-out dim.	**metric standard sizes**

Accessories

2

KEL - DP 24
Cable entry plates

Fastening

Product description

KEL-DP entry plates are designed for routing standard cables (without connectors). The KEL-DP products are a cost saving alternative to traditional cable glands. Either push the cable through the thin membrane or simply put a small slit in the thin membrane and push the cable through. Once the cable is through the membrane, it is immediately sealed.
ST Plugs (page 29) can be used for sealing pierced membranes if cables are removed.
A special fixing rib ensures a centered fit in the cut-outs.

Advantages

- Quick and easy assembly, no tools required
- High packing density
- Cost-effective
- For wall-thickness up to 1.5 - 4.0 mm

Specification

Material	**Elastomer**
Flame class	**UL-94 V0, self-extinguishing**
Protection class	**IP 64**
Temperature	**- 40°C to + 90°C (static)**
Properties	**halogen-free, silicone-free**
Cut-out dimensions	**36 x 112 mm**
Type A:	**for wall thickness 1.5 - 2.5 mm**
Type B:	**for wall thickness 2.8 - 4.0 mm**

Accessories

FP Flanged plates	Page 106 | 111
KDR1 Base plates	Page 113

Description	Type	Order No. Type A	Order No. Type B	Number of cables	PU
	KEL - DP 24 | 14	43512	43522	14x max. 12.1 mm	10
	KEL - DP 24 | 17	43514	43523	5x max. 10.5 mm 12x max. 12.6 mm	10
	KEL - DP 24 | 19	43516	43524	12x max. 6.5 mm 7x max. 12.1 mm	10
	KEL - DP 24 | 26	43518	43525	16x max. 6.5 mm 4x max. 12.1 mm 4x max. 16.1 mm 2x ASI-Leitungen	10
	KEL - DP 24 | 48	43519	43526	48x max. 6.5 mm	10
	KEL - DP 24 | 50	43520	43527	33x max. 5.3 mm 9x max. 6.4 mm 8x max. 8.3 mm	10

KEL - DP - E
Cable entry plates

Type	Order No.	Cut-out mm	Number of cables	PU	Description
KEL - DP-E 46 | 7	43585	46 x 18	5x max. **8.3 mm** 2x max. **6.5 mm**	10	
KEL - DP-E 46 | 9	43587	46 x 18	8x max. **6.5 mm** 1x max. **12.1 mm**	10	
KEL - DP-E 86 | 13	43581	86 x 18	11x max. **8.3 mm** 2x max. **6.5 mm**	10	
KEL - DP-E 86 | 17	43583	86 x 18	16x max. **6.5 mm** 1x max. **12.1 mm**	10	
KEL - DP-E 112 | 16	43576	112 x 18	4x max. **6.5 mm** 11x max. **8.3 mm** 1x max. **12.1 mm**	10	
KEL - DP-E 112 | 21	43578	112 x 18	16x max. **6.5 mm** 4x max. **8.3 mm** 1x max. **12.1 mm**	10	
KEL - DP-S 69 | 8	43591	69 x 10 Edge radii R2	8x max. **7.5 mm**	10	

Product description

KEL-DP-E entry plates are designed for routing standard cables (without connectors). The KEL-DP-E products are a cost saving alternative to traditional cable glands. Either push the cable through the thin membrane or simply put a small slit in the thin membrane and push the cable through. Once the cable is through the membrane, it is immediately sealed.
ST Plugs (page 29) can be used for sealing pierced membranes if cables are removed.
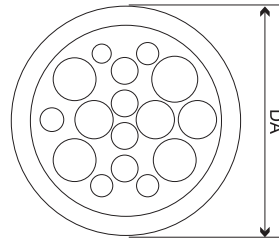A special fixing rib ensures a centered fit in the cut-outs.

Advantages

- Quick and easy assembly, no tools required
- High packing density
- Cost-effective
- For wall-thickness up to 1.5 - 2.5 mm

Specification

Material	**Elastomer**
Flame class	**UL-94 V0, self-extinguishing**
Protection class	**IP 64**
Temperature	**- 40°C to + 90°C (static)**
Properties	**halogen-free, silicone-free**

2

KEL - DP round
Cable entry plates

Fastening

Product description

KEL-DP entry plates are designed for routing standard cables (without connectors). The KEL-DP products are a cost saving alternative to traditional cable glands. Either push the cable through the thin membrane or simply put a small slit in the thin membrane and push the cable through. Once the cable is through the membrane, it is immediately sealed. ST Plugs (page 29) can be used for sealing pierced membranes if cables are removed. A special fixing rib ensures a centered fit in the cut-outs.

Advantages

- Quick and easy assembly, no tools required
- High packing density
- Cost-effective
- For wall thickness up to 1.5 - 4.0 mm

Specification

Material	**Elastomer**
Flame class	**UL-94 V0, self-extinguishing**
Protection class	**IP 65**
Temperature	**- 40°C to + 90°C (static)**
Properties	**halogen-free, silicone-free**
Cut-out dimensions	**metric standard sizes**
Type A:	**for wall thickness 1.5 - 2.5 mm**
Type B:	**for wall thickness 2.8 - 4.0 mm**

Accessories

Typ	Best.Nr. Typ A	Best.Nr. Typ B	Anzahl Leitungen	Ausbruch	Außendurch- messer DA	VE
KEL - DP 25 | 4	43533	-	4x max. 8.0 mm	ø 25	32 mm	10
KEL - DP 25 | 6	43531	-	4x max. 5.2 mm 2x max. 9.4 mm	ø 25	32 mm	10
KEL - DP 32 | 10	43532	43560	6x max. 5.2 mm 2x max. 6.4 mm 2x max. 9.4 mm	ø 32	38 mm	10
KEL - DP 50 | 9	43554	43568	5x max. 7.0 mm 4x max. 18 mm	ø 50	60 mm	10
KEL - DP 50 | 11	43555	43569	7x max. 7.2 mm 3x max. 11.2 mm 1x max. 22.5 mm	ø 50	60 mm	10
KEL - DP 50 | 12	43551	43562	10x max. 9.2 mm 2x max. 11.2 mm	ø 50	60 mm	10
KEL - DP 50 | 16	43550	43564	4x max. 5.3 mm 5x max. 6.3 mm 3x max. 9.5 mm 4x max. 11.3 mm	ø 50	60 mm	10
KEL - DP 50 | 18	43553	43567	5x max. 5.3 mm 5x max. 6.3 mm 4x max. 7.2 mm 2x max. 6.0 mm	ø 50	60 mm	10
KEL - DP 50 | 20	43552	43566	16x max. 6.3 mm 4x max. 9.3 mm	ø 50	60 mm	10
KEL - DP 50 | 35	43556	43570	35x max. 5.2 mm	ø 50	60 mm	10

KEL - DPF
Cable entry inserts

Type	Order No.	Thread metric	External dimension	Clamping range	PU
KEL - DPF 25 | 3-17	42652	M 25	39 mm	3 - 17 mm	5
KEL - DPF 32 | 6-24	42653	M 32	46 mm	6 - 24 mm	5
KEL - DPF 40 | 11-32	42654	M 40	54 mm	11 - 32 mm	5
KEL - DPF 50 | 17-42	42655	M 50	64 mm	17 - 42 mm	5
KEL - DPF 63 | 23-55	42656	M 63	77 mm	23 - 55 mm	5

Product description

The KEL-DPF was developed particulary for routing supply cables into the switch cabinet.

Due to the flexibility and unique pyramid shape, cable entry and positioning is much easier compared to using conventional cable glands.

Cutting of DPF inserts:
- Cable diameter less 5 mm
- The corresponding diameters are marked on the insert

Advantages

- Assembly within seconds
- It is possible to install rigid cables at angles
- Suitable for standard or metric cut-outs
- Polyamide locknuts are included in the shipment

Specification

Material	**Thread frame: Polyamide** **Pyramid: Elastomer**
Flame class	**UL-94 V0, self-extinguishing**
Protection class	**IP 66**
Temperature	**- 40°C to + 90°C (static)**
Properties	**halogen-free, silicone-free**
Thread length	**14 mm**
Cut-out dimensions	**metric standard sizes**

Accessories

2

KEL - JUMBO flex
Cable entry inserts

Product description

The KEL-JUMBO flex is a flexible cable entry system for standard cables with a diameter range from 27 - 68 mm.

They are ideal for the routing supply cables into the switch cabinets.

Cutting of KEL-JUMBO flex inserts:
- Cable diameter less 5 mm
- The corresponding diameters are marked on the insert

Advantages

- Assembly within seconds
- Inserts allow dynamic and flexible movement of rigid cables
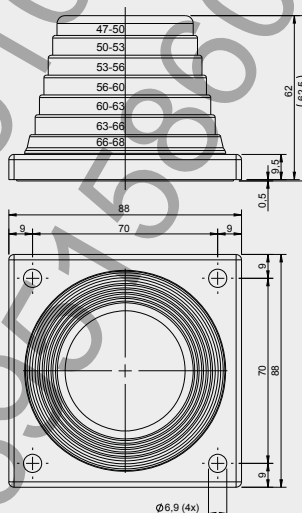- Small installation dimensions (88 x 88 mm)

Specification

Material	**Frame: Polyamide**
	Inserts: Elastomer
Flame class	**UL-94 V0, self-extinguishing**
Protection class	**IP 54**
Temperature	**- 40°C to + 90°C (static)**
Properties	**halogen-free, silicone-free**
Cut-out dimensions	**round, ø-cable + 20%**

Accessories
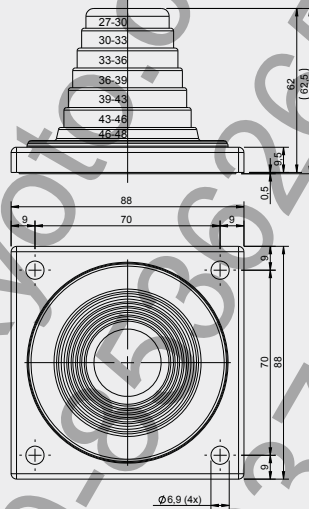
Description	Type	Order No.	Clamping range	PU
	KEL - JUMBO flex 27-48	**42614**	**27 - 48 mm**	**1**
	KEL - JUMBO flex 47-68	**42616**	**47 - 68 mm**	**1**

KEL - ULTRA flex
Cable entry inserts

Type	Order No.	Sealing range	PU
KEL-ULTRA flex 1 incl. Fixing screws	**42630**	**25 - max. 90 mm cable diameter**	**1**
KEL-ULTRA flex 2 incl. Fixing screws	**42631**	**75 - max. 115 mm cable diameter**	**1**

Product description

The product line KEL-ULTRA flex is designed as a cable entry system for power supply cables or any cable or conduit that is difficult to manage. The KEL-ULTRA flex comes in two sizes and is good for routing and sealing cables and conduits with a diameter from 25 to 115 mm. Inserting large, thick cables is easier than using standard cable glands due to the high flexibility of the KEL-Ultra Flex elastomer pyramide.

After inserting the cable or conduit, the KEL-ULTRA flex is quickly and easily mounted with the metal ring and screws. The metal ring enables a circular fixing and sealing of the insert at the enclosure wall. The metal ring is supplied with each KEL-ULTRA flex.

Advantages

- Assembly within seconds
- Inserts allow dynamic and flexible movement of rigid cables
- Protection class IP66

Specification

Material	**Insert: Elastomer**
	Fixing metal ring: Steel, zinc-plated
	Blind plate: Steel, zinc-plated
Flame class	**UL-94 V0, self-extinguishing**
Protection class	**IP 66 (when fastened with 8 screws)**
Temperature	**- 40°C to + 90°C (static)**
Properties	**halogen-free, silicone-free**
Cut-out dimension	**ø-cable + 30%,**
	max. ø 140mm

Accessories

2