

An aerial night photograph of a city, featuring a large bus terminal with many buses parked, a highway interchange with light trails from traffic, and various city buildings and streets illuminated by streetlights. The image is framed by a large blue diamond shape that overlaps with the text on the right.

# ENSTO

## Enclosures and Components

**Better life.**  
With electricity.

We offer you enclosing  
solutions and industrial  
components for the most  
demanding environments.  
[ensto.com](http://ensto.com)


> Enclosures  
1

> Fire protection  
junction boxes  
2

> Industrial components  
3



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# Enclosures and components

We offer you enclosing solutions and industrial components for the most demanding environments. We are a reliable and flexible partner with experienced people. Our sound knowledge of many applications and various raw materials, make us a real expert in this field. You can rely on our competence and quality.

Our enclosures and components are developed for demanding industrial environments requiring a high degree of protection and extreme durability. We offer you high-quality standard and customer-specific enclosing solutions. We also support your operations with high-quality terminals, load-break switches and fuse bases that are designed and tested to meet a wide range of applications in various environments.

Our enclosures and components are continually developed for long lifespans and to withstand the toughest conditions on earth. Durable products mean uninterrupted operations, lower maintenance costs and, above all, satisfied customers. Durable products mean uninterrupted operations, lower maintenance costs and, above all, satisfied customers.

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# Enclosures

## For demanding environments

# 1

We are specialists in enclosures and customer-specific enclosing solutions. Our standard product range includes thermoplastic, polyester, and aluminium enclosures, with the related accessories suitable for demanding environments.

Our enclosing solutions protect your electronic equipment in numerous applications from various external risk factors, among them dust, water, moisture, impacts and tampering. Thanks to their high degree of protection and impact strength, our solutions are able to withstand challenging environments in even the most demanding industries.

### Typical applications include:

- › Food industry and agriculture
- › Infrastructure
- › Shipbuilding and transportation
- › Industrial automation
- › Energy production



# Choosing an enclosure

When choosing a protective enclosure, understanding the principles of operation of the equipment that will be installed, as well as the conditions in which that equipment will operate, is crucial. With this information, precise and accurate identification of the required enclosure parameters is possible. Parameters to be considered include:

## Material

Our Ensto Cubo range includes enclosures made of thermoplastics (ABS and polycarbonate), polyester, and aluminium. We use high-quality materials provided to us by the world's leading suppliers. Using the right material ensures the safety of the installed equipment

and its users while also eliminating the risk of unnecessary additional costs arising from unexpected downtime. The maintenance needs of an enclosure depend on the materials used.



## Dimensions

The size of the enclosure is determined by the minimum and/or maximum dimensions of the application. When selecting the size, please consider whether further components are likely to be added at a later stage and, if so, whether the dimensions of the enclosure will still be adequate.

We have a wide range of sizes available for our standard enclosures. In addition to these, we can create solutions with customer-specific sizes.



## Degree of protection

For effective enclosure, the degree of protection is an important factor. The degree of protection is defined purely for the enclosure and should be maintained during the installation work, meaning that, for instance the IP class of the cable glands used for cable entries should be higher or the same as that of the enclosure. Further information about degrees of protection is available on page 10.

### IK code (European standard EN 62262)

The IK code for our thermoplastic enclosures ranges between IK06 and IK10.

### Environmental type classification UL 50 E

Our enclosures are tested according to American environmental type classification by the UL. Environmental type classification is also known as NEMA classification. Further information can be found on the UL website [www.ul.com](http://www.ul.com).

### IP code (European standard EN 60529)

All Ensto Cubo enclosures are designed for use in demanding environments. Their IP code ranges between IP65 and IP69.



# Flammability

Flammability is defined as how easily something will burn or ignite, causing fire or combustion. The flammability-related requirements for an enclosure depend on the application for which it is used. Flammability class refers to classification of the ignition- and burning-resistance characteristics of other than

metal or ceramic materials. Our enclosures have been tested in terms of flammability by Underwriters Laboratories. Most of our polycarbonate enclosures have been tested according to UL 746C and pass the demanding five-inch flame testing performed and certified by SGS. The flammability rating of our polycar-

bonate enclosure raw material is UL 94 V-2 / 5VA and ABS enclosure is UL 94 HB.

Our plastic enclosures also fulfill the glow wire test according to IEC 60695-2-11. Please see the Ensto Cubo technical information table below for further details.

# Certificates

Ensto Cubo enclosures are certified in accordance with EN 62208 (SGS Fimko). Most of our polycarbonate enclosures are also UL and cUL listed (Underwrit-

ers Laboratories, File # E 189312). Our enclosures also have GOST R certification for sale in Russia. Many of our enclosures also have a Germanischer

Lloyd certificate for marine applications. Please see the certificates table below for further details.

Ensto Cubo series	S		D		O		C	W	Polybox	Modulo	M	N	H
Material	PC	ABS	PC	ABS	PC	ABS	PC	PC	PC	ABS	GRP	GRP	AL
SGS Fimko	X	X	X	X	X	X	X	X	X				
UL	X		X		X		X	X	X			X	
cUL	X		X		X		X	X	X			X	
GOST R	X	X	X	X	X	X	X	X					
Germanischer Lloyd	X		X		X		X						
VDE										X			

Material:

PC = polycarbonate  
 ABS = acrylonitrile butadiene styrene  
 GRP = glass reinforced polyester  
 AL = aluminium

Certificates:

UL = Underwriters Laboratories, File # E 189312 (USA)  
 cUL = Underwriters Laboratories, File # E 189312 (Canada)

Germanischer Lloyd = Category 'A'. Shipping Register (Germany)  
 VDE = Verband der Elektrotechnik, Elektronik und Informationstechnik e.V. (Germany)

# Ensto Cubo technical information

Enclosure series	Cubo S		Cubo D		Cubo O		Cubo C
Material	PC	ABS	PC	ABS	PC	ABS	PC
Enclosure side types	Plain sides, metric and Pg knockouts	Plain sides	Plain sides	Plain sides	Plain sides, metric knockouts	Plain sides	Flange knockouts
Minimum size (mm)	75 x 125 x 35		53 x 55 x 36		200 x 200 x 132		200 x 200 x 132
Maximum size (mm)	175 x 250 x 150		230 x 300 x 111		400 x 600 x 187		400 x 600 x 187
Degree of protection	IP66, IP67	IP66, IP67	IP66, IP67	IP66, IP67	IP66, IP67	IP66, IP67	IP66, IP67
Impact resistance	IK08 (-25 °C...+35 °C)	IK07 (+35 °C) IK06 (-25 °C)	IK08 (-25 °C...+35 °C)	IK07 (+35 °C) IK06 (-25 °C)	IK08 (-25 °C...+35 °C)	IK08 (+35 °C) IK07 (-25 °C)	IK08 (-25 °C...+35 °C)
Environmental type (UL / cUL)	4, 4X, 6, 12, 13	N/A	4, 4X, 6, 12, 13	N/A	4, 4X, 12, 13	N/A	4, 4X, 12, 13
Continuous operating temperature	-40 °C... +80 °C	-40 °C... +60 °C	-40 °C... +80 °C	-40 °C... +60 °C	-40 °C... +80 °C	-40 °C... +60 °C	-40 °C... +80 °C
Flammability	UL 746C (5 inch flame)	N/A	UL 746C (5 inch flame)	N/A	UL 746C (5 inch flame)	N/A	UL 746C (5 inch flame)
Flammability, material	UL 94 V-2 / 5VA	UL 94 HB	UL 94 V-2 / 5VA	UL 94 HB	UL 94 V-2 / 5VA	UL 94 HB	UL 94 V-2 / 5VA
Glow wire test	850 °C	650 °C	850 °C	650 °C	850 °C	650 °C	850 °C

Enclosure series	Cubo W	Polybox	Modulo	Cubo M	Cubo N	Cubo H
Material	PC	PC	ABS	GRP	GRP	AL
Enclosure side types	Plain sides	Plain sides	Metric knockouts	Plain sides	Plain sides	Plain sides
Minimum size (mm)	200 x 200 x 132	223 x 172 x 134	166 x 231 x 113	75 x 80 x 55	250 x 300 x 140	50 x 45 x 30
Maximum size (mm)	400 x 600 x 187	482 x 431 x 286	418 x 586 x 148	400 x 405 x 120	600 x 800 x 300	310 x 601 x 180
Degree of protection	IP66, IP67	IP66 / IP68 <sup>1)</sup> / IP69	IP65	IP66	IP66	IP66
Impact resistance	IK08 (-25 °C...+35 °C)	IK10	IK08 (5J)	7 Nm	IK10 <sup>2)</sup>	7 Nm
Environmental type (UL / cUL)	4, 4X, 12, 13	4X, 6P, 12, 13	N/A	N/A	4, 4X, 12	N/A
Continuous operating temperature	-40 °C... +80 °C	-40 °C... +80 °C	-25 °C... +70 °C	-40 °C... +110 °C	-40 °C... +80 °C	-40 °C... +110 °C
Flammability	UL 746C (5 inch flame)	UL 746C (5 inch flame)	N/A	N/A	UL 746C <sup>3)</sup> (5 inch flame)	N/A
Flammability, material	UL 94 V-2 / 5VA	UL 94 V-2 / 5VA	UL 94 HB			
Glow wire test	850 °C	850 °C	650 °C	N/A	960 °C	N/A

Material:

PC = polycarbonate  
 ABS = acrylonitrile butadiene styrene  
 GRP = glass reinforced polyester  
 AL = aluminium

N/A = No information available

<sup>1)</sup> IP68 immersion 2m/24h  
<sup>2)</sup> Models with polycarbonate window: IK07 (-5 °C...+80 °C)  
<sup>3)</sup> UL-listed versions

# Materials comparison

Our product range comprises enclosing solutions made from thermoplastics, polyester and aluminium. Below, we compare the various materials for their individual advantages and disadvantages.

## Thermoplastics

Ensto Cubo thermoplastic enclosures are manufactured in high-quality halogen-free and recyclable polycarbonate or ABS plastics. Although plastic is much lighter than steel, it still has very high impact-resistance. In addition, any dents

or bumps are not as noticeable with plastic as they would be with steel. For the maintenance of these enclosures, cleaning with a mild detergent is recommended.

### Polycarbonate (PC)

- + High impact-resistance
- + High degree of protection
- + Light weight
- + Good resistance to chemicals
- + Wide range of operating temperatures
- + Self-extinguishing material
- + Easy machining with standard tools
- + Excellent insulation properties
- + Suitable for outdoor use
- + Also available with transparent cover
- Because of the fiberglass used, possible difficulty in achieving the desired color shade
- Resistance against some solvents

### ABS (Acryl-butadiene styrene)

- + Cost-effectiveness
- + Light weight
- + Chemical-resistance
- + Easy machining with standard tools
- Impact-resistance lower than that of polycarbonate
- Narrower temperature-resistance range than polycarbonate
- Low resistance to UV radiation
- Not suitable for outdoor use
- Not available with transparent cover
- No self-extinguishing property





## Polyester

Glass-reinforced polyester shows superb resistance to even extreme temperatures. It has high corrosion-resistance and is very resistant to solvents. Polyester is more expensive than polycarbonate and ABS. Since enclosures made from this material are difficult to machine, we recommend that you let us customize them for you. In work on polyester enclosures, it is important that you use an anti-dust respirator filter.

### Polyester (GRP, glass-reinforced polyester)

- + Excellent temperature-resistance
- + Excellent impact-resistance
- + Good corrosion-resistance
- + Good resistance against solvents
- + Suitability for oil refineries and the petrochemical and chemical industries
- More expensive than thermoplastic materials
- Machining may be challenging due to fiber content
- Non-recyclable material



## Steel

Steel enclosures have a high impact resistance and protection class. However, painted steel enclosures have a high corrosion risk. Painted steel alone is not enough to protect against rust and, if rusted, the enclosure loses its mechanical properties. Additionally, a rusted enclosure is unpleasant in appearance. Steel as a material is significantly more expensive and heavier than plastic. Further, enclosures made of stainless steel grades are considerably more expensive than painted steel enclosures. Weight poses certain installation-related challenges and increases transport costs. In addition, potential dents and bumps are easily noticeable on steel. Please note that we don't have steel enclosures in its range.

### Steel

- + High impact resistance
- Corrosion risk
- Expensive
- Heavy
- Easily damaged



## Aluminium

The relative weight of aluminium is only about a quarter the weight of steel. Aluminium is, however, more expensive than steel. It has high impact-resistance, a wide temperature-resistance range and excellent corrosion-resistance.

### Aluminium

- + Lighter material than enclosure made of steel
- + High impact-resistance
- + Good resistance against solvents
- + A wide range of operating temperatures
- + Excellent corrosion-resistance
- Expensive



# Degree of protection

## IP Code (European standard EN 60529)

The IP Code consists of the letters IP followed by two digits and an optional letter. The first numeral of the code classifies the degrees of protection provided against the intrusion of solid objects and dust. The second numeral specifies the protection against water. The optional letter may be appended to classify only the level of protection against human access to hazardous components.

tection against water. The optional letter may be appended to classify only the level of protection against human access to hazardous components.

### 1st numeral: Protection against intrusion



### 2nd numeral: Protection against water



1st numeral		2nd numeral	
0	No protection	0	No protection
1	Protection against objects $\geq 50$ mm	1	Protection against vertically falling water drops
2	Protection against objects $\geq 12.5$ mm	2	Protection against rain drops falling at max. 15° angle
3	Protection against objects $\geq 2.5$ mm	3	Protection against rain drops falling at max. 60° angle
4	Protection against solid objects $\geq 1$ mm	4	Protection against rain drops falling from all directions
5	Protection against dust, limited intrusion acceptable in all directions	5	Protection against low pressure jet water from all directions*
6	Total protection against dust	6	Protection against jet water under pressure*
		7	Protection against water intrusion under submersion at 1 m depth, 0.5 hour
		8	Protection against water intrusion under long term submersion under pressure
		9	Protection against high pressure and high temperature water jets

\*Minor intrusion acceptable

## IK code (European standard EN 62262)

IK code is an international numerical classification for the degree of protection provided by enclosures for electrical equipment against external mechanical impact. The IK code for our thermoplastic enclosures ranges between IK06 and IK10.

### Protection against external mechanical impact



IK code	Impact energy (joules)
01-05	<1
06	1
07	2
08	5
09	10
10	20

# Ensto Cubo enclosures in more detail

## Enclosure covers

The enclosure cover can be transparent, so that the status of the equipment inside is easy to monitor. With thermoplastic enclosures, the whole cover is either grey or transparent. Grey covers are available in both ABS and polycarbonate. Transparent covers are available only with polycarbonate.



## Enclosure walls

The material thickness of our thermoplastic enclosures is greater than that of similar products on the market. This aids in the machining of threads. In addition, the use of, for instance, push buttons on the cover is safer, since the material is more rigid. The bases of polycarbonate enclosures with knockouts have been reinforced with fibreglass in order to add rigidity to the enclosure walls and to make it easier to knock out the cable entries. We have a modular tooling structure that enables cost-efficient mold modifications. This proves especially efficient when creating customer-specific holes and cutouts in a large series of enclosures.



## Enclosure gaskets

We use seamless sealants in our thermoplastic, polyester and aluminum enclosures to ensure a high level of protection. Our thermoplastic enclosures feature a state-of-the-art, hydrophobic polyurethane sealant that ensures reliable sealing, even under extreme conditions. The temperature-resistance of the polyurethane gasket materials is -40... +80 °C.



## Further information

Further information, technical data, accessory details, and technical drawings are available on our website at [www.ensto.com/products/enclosures](http://www.ensto.com/products/enclosures).



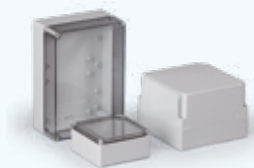
# Thermoplastic enclosures

Ensto Cubo thermoplastic enclosures are manufactured in high-quality halogen-free and recyclable polycarbonate or ABS plastics. Although plastic is much lighter than steel, it has very high impact-resistance. In addition, any dents or bumps are not as noticeable in plastic as they would be with steel. Both machining and maintenance of our thermoplastic enclosures is easy, and no special tools are needed.

## **BENEFITS:**

- › Greater material thickness
- › Fibreglass-reinforced bases
- › Cost-efficient mold modifications
- › Lightweight products
- › Durability and easy maintenance

# Range comparison



## Ensto Cubo S enclosures, IP66 and IP67

- › Sizes: 75 x 125 x 35 to 175 x 250 x 150 mm
- › Available with plain sides or knockouts
- › Cover and cover screws equipped with sealing holes



## Ensto Cubo D enclosures, IP66 and IP67

- › Sizes: 53 x 55 x 36 to 230 x 300 x 111 mm
- › Available with plain sides
- › Contemporary design with faceted corners and cover plugs
- › Fastening pods inside the cover included



## Ensto Cubo O enclosures, IP66 and IP67

- › Sizes: 200 x 200 x 132 to 400 x 600 x 187 mm
- › Available with plain sides or with metric knockouts
- › 55-millimeter-deep extension frame available for alternative depths in all sizes
- › Cover and cover screws equipped with sealing holes



## Ensto Cubo C enclosures, IP66 and IP67

- › Sizes: 200 x 200 x 132 to 400 x 600 x 187 mm
- › Available with flange knockouts
- › 55-millimeter-deep extension frame available for alternative depths in all sizes
- › Covers and cover screws equipped with sealing holes
- › A products based on the Ensto Cubo O enclosure series



## Ensto Cubo W wall cabinets, IP66 and IP67

- › Sizes: 200 x 200 x 132 to 400 x 600 x 187 mm
- › Available with plain sides
- › Pre-assembled hinges and quick-release latches as standard
- › A product based on the Ensto Cubo O enclosure series



## Ensto PolyBox

- › Sizes: 223 x 172 x 134 – 482 x 431 x 286 mm
- › Available with plain sides
- › Unique and innovative features

## UL-listed enclosures

- › Sizes: 223 x 172 x 134 – 482 x 431 x 286 mm
- › Available with plain sides



## Ensto terminal junction boxes, IP65

- › Sizes 125 x 125 x 75 to 300 x 600 x 132 mm
- › Include everything needed for connecting wires, extending or branching cables as well as enclosing
- › Available with Ensto Clampo Compact terminal blocks and Ensto Clampo Pro Universal terminals
- › Include either Ensto Cubo S or C enclosures



## Ensto Modulo distribution enclosures, IP65

- › Sizes: 166 x 231 x 113 to 418 x 586 x 148 mm
- › Available in 9 sizes, capacity for 4 to 54 modules
- › Factory installed DIN-rails, earth and neutral bars
- › Factory made metric knockouts from M20 to M40

# Ensto Cubo S enclosures IP66 and IP67

Sizes 75 x 125 x 35 to 175 x 250 x 150 mm



## Ensto Cubo S enclosure in brief:

- › Available with plain sides or knockouts
- › Available in 39 sizes, three base depths (25, 50 and the new 75 mm HG versions) and 5 different cover heights
- › Cover and cover screws equipped with sealing holes

## Contents of the product package:

- › Enclosure base
- › Cover
- › Cover screws
- › Mounting screws

## Further information

- › More information of Pg knockout versions from our webpages
- › Common enclosure accessories, pages 46-49
- › UL-listed enclosures, pages 32-34
- › Dimensional drawings, pages 95-100
- › Product cards, dimensional drawings and 3D models can be found at [ensto.com](http://ensto.com).

Conformity	
PC enclosures:	CE RoHS FI UL cUL GL CC
Standards	
	EN 62208, UL 508A
Technical information	
Degree of protection:	IP66 and IP67
Impact resistance:	PC: IK08 (-25 °C... +35 °C)
Operating temperature:	PC: -40 °C ... +80 °C
Short term temperature range:	PC: -40 °C... +120 °C
Flammability rating:	PC: UL 746C 5 inch flame
UL File no:	E189312
UL category:	NITW, NITW7
Environmental type (UL):	4, 4X, 12, 13, 6
Environmental type (cUL):	4, 4X, 12, 6
Outdoor suitability:	PC: UL 746C (f1) rated material
Insulation:	Class II
Material	
Base:	Fibreglass reinforced polycarbonate
Cover:	Polycarbonate
Cover screws:	Fibreglass reinforced polyamide
Gasket:	PUR (polyurethane)
Enclosure side types	
PC enclosures:	Plain sides, metric or Pg knockouts
Standard color	
Base:	Grey RAL 7035
Cover:	Grey RAL 7035 or transparent



The enclosure has slots in the base for printed circuit boards.



The cover can be sealed.



Enclosure with a low (10 mm) cover and a low (25 mm) base.



This enclosure is equipped with hinges (DSH11), cover plugs and wing head parts (SLW1).

## Ensto Cubo S enclosures with plain sides

Width (mm)	Height (mm)	Depth (mm)	Inner depth (mm)	Base depth (mm)	Cover depth (mm)	Polycarbonate grey cover (product code, GTIN-13)	Polycarbonate transparent cover (product code, GTIN-13)	ABS grey cover (product code, GTIN-13)	ABS transparent cover (product code, GTIN-13)
75	125	35	20,5	25	10	SPCP081304LG 6438100101299	SPCP081304LT 6438100101305	SABP081304LG 6438100101312	SABP081304LT 6438100101329
75	125	50	35,5	25	25	SPCP081305LG 6438100101336	SPCP081305LT 6438100101343	SABP081305LG 6438100101350	SABP081305LT 6438100101367
75	125	60	45,5	50	10	SPCP081306G 6438100101374	SPCP081306T 6438100101381	SABP081306G 6438100101398	SABP081306T 6438100101404
75	125	75	60,5	25	50	SPCP081308LG 6438100101459	SPCP081308LT 6438100101466	SABP081308LG 6438100101473	SABP081308LT 6438100101480
75	125	75	60,5	50	25	SPCP081308G 6418677155031	SPCP081308T 6418677155024	SABP081308G 6418677155048	SABP081308T 6418677155055
75	125	100	85,5	25	75	SPCP081310LG 6438100101497	SPCP081310LT 6438100101503	SABP081310LG 6438100101510	SABP081310LT 6438100101527
75	125	100	85,5	50	50	SPCP081310G 6418677155086	SPCP081310T 6418677155093	SABP081310G 6418677155109	SABP081310T 6418677155116
75	125	125	110,5	50	75	SPCP081313G 6418677155147	SPCP081313T 6418677155154	SABP081313G 6418677155161	SABP081313T 6418677155178
100	100	35	20,5	25	10	SPCP101004LG 6438100101534	SPCP101004LT 6438100101541	SABP101004LG 6438100101558	SABP101004LT 6438100101565
100	100	60	45,5	50	10	SPCP101006G 6438100101619	SPCP101006T 6438100101626	SABP101006G 6438100101633	SABP101006T 6438100101640
125	125	35	20,5	25	10	SPCP131304LG 6438100101671	SPCP131304LT 6438100101688	SABP131304LG 6438100101695	SABP131304LT 6438100101701
125	125	50	35,5	25	25	SPCP131305LG 6438100101718	SPCP131305LT 6438100101725	SABP131305LG 6438100101732	SABP131305LT 6438100101749
125	125	60	45,5	50	10	SPCP131306G 6438100101756	SPCP131306T 6438100101763	SABP131306G 6438100101770	SABP131306T 6438100101787
125	125	75	60,5	25	50	SPCP131308LG 6438100101817	SPCP131308LT 6438100101824	SABP131308LG 6438100101831	SABP131308LT 6438100101848
125	125	75	60,5	50	25	SPCP131308G 6418677155208	SPCP131308T 6418677155215	SABP131308G 6418677155222	SABP131308T 6418677155239
125	125	100	85,5	25	75	SPCP131310LG 6438100101855	SPCP131310LT 6438100101862	SABP131310LG 6438100101879	SABP131310LT 6438100101886
125	125	100	85,5	50	50	SPCP131310G 6418677155260	SPCP131310T 6418677155277	SABP131310G 6418677155284	SABP131310T 6418677155291
125	125	125	110,5	50	75	SPCP131313G 6418677155321	SPCP131313T 6418677155338	SABP131313G 6418677155345	SABP131313T 6418677155352
125	175	35	20,5	25	10	SPCP131804LG 6438100101893	SPCP131804LT 6438100101909	SABP131804LG 6438100101916	SABP131804LT 6438100101923
125	175	50	35,5	25	25	SPCP131805LG 6438100101930	SPCP131805LT 6438100101947	SABP131805LG 6438100101954	SABP131805LT 6438100101961
125	175	60	45,5	50	10	SPCP131806G 6438100101978	SPCP131806T 6438100101985	SABP131806G 6438100101992	SABP131806T 6438100102005
125	175	75	60,5	25	50	SPCP131808LG 6438100102050	SPCP131808LT 6438100102067	SABP131808LG 6438100102074	SABP131808LT 6438100102081
125	175	75	60,5	50	25	SPCP131808G 6418677155383	SPCP131808T 6418677155390	SABP131808G 6418677155406	SABP131808T 6418677155413
125	175	100	85,5	25	75	SPCP131810LG 6438100102098	SPCP131810LT 6438100102104	SABP131810LG 6438100102111	SABP131810LT 6438100102128
125	175	100	85,5	50	50	SPCP131810G 6418677155444	SPCP131810T 6418677155451	SABP131810G 6418677155468	SABP131810T 6418677155475
125	175	125	110,5	25	100	SPCP131813LG 6438100102135	SPCP131813LT 6438100102142	SABP131813LG 6438100102159	SABP131813LT 6438100102166
125	175	125	110,5	50	75	SPCP131813G 6418677155505	SPCP131813T 6418677155512	SABP131813G 6418677155529	SABP131813T 6418677155536
125	175	150	135,5	50	100	SPCP131815G 6418677155567	SPCP131815T 6418677155574	SABP131815G 6418677155581	SABP131815T 6418677155598
125	250	125	110,5	50	75	SPCP132513G 6438100104696	SPCP132513T 6438100104702	SABP132513G 6438100104719	SABP132513T 6438100104726
175	175	75	60,5	50	25	SPCP181808G 6418677155628	SPCP181808T 6418677155635	SABP181808G 6418677155642	SABP181808T 6418677155659
175	175	100	85,5	50	50	SPCP181810G 6418677155680	SPCP181810T 6418677155697	SABP181810G 6418677155703	SABP181810T 6418677155710
175	175	125	110,5	50	75	SPCP181813G 6418677155741	SPCP181813T 6418677155758	SABP181813G 6418677155765	SABP181813T 6418677155772
175	175	150	135,5	50	100	SPCP181815G 6418677155802	SPCP181815T 6418677155819	SABP181815G 6418677155826	SABP181815T 6418677155833
175	250	75	60,5	50	25	SPCP182508G 6418677155864	SPCP182508T 6418677155871	SABP182508G 6418677155888	SABP182508T 6418677155895
175	250	100	85,5	50	50	SPCP182510G 6418677155925	SPCP182510T 6418677155932	SABP182510G 6418677155949	SABP182510T 6418677155956
175	250	100	85,5	75	25	SPCP182510HG 6438100371586	SPCP182510HT 6438100374075	SABP182510HG 6438100371616	SABP182510HT 6438100374105
175	250	125	110,5	75	50	SPCP182513HG 6438100371579	SPCP182513HT 6438100374082	SABP182513HG 6438100371609	SABP182513HT 6438100374112
175	250	150	135,5	50	100	SPCP182515G 6418677155987	SPCP182515T 6418677155994	SABP182515G 6418677156007	SABP182515T 6418677156014
175	250	175	160,5	75	100	SPCP182518HG 6438100371562	SPCP182518HT 6438100374099	SABP182518HG 6438100371593	SABP182518HT 6438100374129

NEW

NEW



SPCP131304LG



SPCP131813G



SPCP131308T



SPCP182515T



## Ensto Cubo S enclosures with metric knockouts, polycarbonate

Width (mm)	Height (mm)	Depth (mm)	Inner depth (mm)	Base depth (mm)	Cover depth (mm)	Knockouts	Polycarbonate grey cover metric knockouts (product code, GTIN-13)	Polycarbonate transparent cover metric knockouts (product code, GTIN-13)
75	125	60	45,5	50	10	2 x M16/25 + 6 x M12/20	SPCM081306G 6438100101411	SPCM081306T 6438100101428
75	125	75	60,5	50	25	2 x M16/25 + 6 x M12/20	SPCM081308G 6418677166358	SPCM081308T 6418677166525
75	125	100	85,5	50	50	2 x M16/25 + 6 x M12/20	SPCM081310G 6418677166365	SPCM081310T 6418677166532
75	125	125	110,5	50	75	2 x M16/25 + 6 x M12/20	SPCM081313G 6418677166372	SPCM081313T 6418677166549
100	100	60	45,5	50	10	2 x M16/25 + 4 x M12/20	SPCM101006G 6438100101657	SPCM101006T 6438100101664
125	125	60	45,5	50	10	4 x M16/25 + 6 x M12/20	SPCM131306G 6438100100445	SPCM131306T 6438100100452
125	125	75	60,5	50	25	4 x M16/25 + 6 x M12/20	SPCM131308G 6418677166389	SPCM131308T 6418677166556
125	125	100	85,5	50	50	4 x M16/25 + 6 x M12/20	SPCM131310G 6418677166396	SPCM131310T 6418677166563
125	125	125	110,5	50	75	4 x M16/25 + 6 x M12/20	SPCM131313G 6418677166402	SPCM131313T 6418677166570
125	175	60	45,5	50	10	4 x M16/25 + 8 x M12/20	SPCM131806G 6438100102012	SPCM131806T 6438100102029
125	175	75	60,5	50	25	4 x M16/25 + 8 x M12/20	SPCM131808G 6418677166419	SPCM131808T 6418677166587
125	175	100	85,5	50	50	4 x M16/25 + 8 x M12/20	SPCM131810G 6418677166426	SPCM131810T 6418677166594
125	175	125	110,5	50	75	4 x M16/25 + 8 x M12/20	SPCM131813G 6418677166433	SPCM131813T 6418677166600
125	175	150	135,5	50	100	4 x M16/25 + 8 x M12/20	SPCM131815G 6418677166440	SPCM131815T 6418677166617
125	250	125	110,5	50	75	4 x M20/25	SPCM132513G 6438100104733	SPCM132513T 6438100104740
175	175	75	60,5	50	25	4 x M12/20 + 4 x M16/25 + 10 x M12/20	SPCM181808G 6418677166457	SPCM181808T 6418677166624
175	175	100	85,5	50	50	4 x M12/20 + 4 x M16/25 + 10 x M12/20	SPCM181810G 6418677166464	SPCM181810T 6418677166631
175	175	125	110,5	50	75	4 x M12/20 + 4 x M16/25 + 10 x M12/20	SPCM181813G 6418677166471	SPCM181813T 6418677166648
175	175	150	135,5	50	100	4 x M12/20 + 4 x M16/25 + 10 x M12/20	SPCM181815G 6418677166488	SPCM181815T 6418677166655
175	250	75	60,5	50	25	4 x M12/20 + 4 x M16/25 + 12 x M12/20	SPCM182508G 6418677166495	SPCM182508T 6418677166662
175	250	100	85,5	50	50	4 x M12/20 + 4 x M16/25 + 12 x M12/20	SPCM182510G 6418677166501	SPCM182510T 6418677166679
175	250	100	85,5	75	25	2 x M12/M20 + 18 x M20 + 4 x M25 + 4 x M20/M32 + 4 x M32/M40	SPCM182510HG 6438100375911	SPCM182510HT 6438100375942
175	250	125	110,5	75	50	2 x M12/M20 + 18 x M20 + 4 x M25 + 4 x M20/M32 + 4 x M32/M40	SPCM182513HG 6438100375928	SPCM182513HT 6438100375959
175	250	150	135,5	50	100	4 x M12/20 + 4 x M16/25 + 12 x M12/20	SPCM182515G 6418677166518	SPCM182515T 6418677166686
175	250	175	160,5	75	100	2 x M12/M20 + 18 x M20 + 4 x M25 + 4 x M20/M32 + 4 x M32/M40	SPCM182518HG 6438100375935	SPCM182518HT 6438100375966

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### Mounting plates and DIN rails

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
<b>Mounting plates, galvanized steel</b>				
SMP0813	For 75 x 125 mm enclosures	48 x 98 x 1,5	10	6418677156038
SMP1010	For 100 x 100 mm enclosures	78 x 78 x 1,5	10	6438100104849
SMP1313	For 125 x 125 mm enclosures	98 x 98 x 1,5	10	6418677156045
SMP1318	For 125 x 175 mm enclosures	98 x 148 x 1,5	10	6418677156052
SMP1325	For 125 x 250 mm enclosures	98 x 223 x 1,5	10	6438100104535
SMP1818	For 175 x 175 mm enclosures	148 x 148 x 1,5	10	6418677156069
SMP1825	For 175 x 250 mm enclosures	148 x 223 x 1,5	10	6418677156076
<b>DIN rails, DIN 46277/3, galvanized steel</b>				
DR35040.4	For 75 mm sides	35 x 50	10	6418677156090
DR35070.4	For 100 mm sides	35 x 80	10	6438100104450
DR35090.4	For 125 mm sides	35 x 100	10	6418677156106
DR35140.4	For 175 mm sides	35 x 150	10	6418677156113
DR35215.4	For 250 mm sides	35 x 225	10	6418677156120



SMP0813

### Other accessories

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
DSH11	Hinge pair, polycarbonate	28 x 28	1	6418677156144
SFL1	Fastening lug, set of 4 pcs, polycarbonate	15 x 30	1	6418677156151
SBI1	Insert for pods, brass	M2	50	6418677156168
SBI1A.04	Insert, set of 4 pcs	M2	1	6418677156830
SBS40	Spacer, 40 mm, for panels	7 x 48	12	6438100086022
SMS1	Mounting screw for plates and rails, steel	4 x 8	100	6418677156175
SCP08	Cover plug, short, for 25 mm cover	ø11 x 12	10	6418677156847
SCP10	Cover plug, long, for 50 mm cover	ø12 x 36,5	10	6418677156854
SCP1315	Cover plug, short, for 75 and 100 mm covers	ø11,5 x 12	10	6418677156861
SLS35	Cover screw, medium	11 x 35	100	6418677156182
SLS60	Cover screw, long, for 50 mm covers	11 x 60	50	6418677156199
SLSA23.04	Screw set, Includes 4 short cover screws for 10 mm cover and 4 mounting screws SMS1	11 x 23	1	6438100100407
SLSA35.04	Screw set, Includes 4 medium cover screws SLS35 and 4 mounting screws SMS1	11 x 35	1	6418677154980
SLSA60.04	Screw set, Includes 4 long cover screws for 50 mm cover SLS60 and 4 mounting screws SMS1	11 x 60	1	6418677154997
SLW1	Cover screw's wing head part, only for 25 and 50 mm covers	11 x 17	10	6418677154867



Hinge pair, DSH11.



# Ensto Cubo D enclosures IP66 and 67

Sizes 53 x 55 x 36 to 230 x 300 x 111 mm



## Ensto Cubo D enclosure in brief:

- Available with plain sides
- Contemporary design with faceted corners and cover plugs
- Includes fastening pods inside the cover

## Contents of the product package:

- Enclosure base
- Cover
- Cover screws
- Mounting screws
- Cover plugs for cover screws

## Further information

- Common enclosure accessories, pages 46-49
- UL-listed enclosures, pages 32-34
- Dimensional drawings, pages 101-103
- Product cards, dimensional drawings and 3D models can be found at [ensto.com](http://ensto.com).

Conformity	
PC enclosures:	CE <small>RoHS</small> FI UL <small>e</small> UL GL <small>UL</small>
Standards	
	EN 62208, UL 508A
Technical information	
Degree of protection:	IP66 and IP67
Impact resistance:	PC: IK08 (-25 °C... +35 °C)
Operating temperature:	PC: -40 °C ... +80 °C
Short term temperature range:	PC: -40 °C... +120 °C
Flammability rating:	PC: UL 746C 5 inch flame
UL File no:	E189312
UL category:	NITW, NITW7
Environmental type (UL):	4, 4X, 12, 13, 6
Outdoor suitability:	PC: UL 746C (f1) rated material
Insulation:	Class II
Material	
Base/cover:	Polycarbonate
Cover screws:	Stainless steel
Gasket:	PUR (polyurethane)
Enclosure side types	
PC enclosures:	Plain sides
Standard color	
Base:	Grey RAL 7035
Cover:	Grey RAL 7035 or transparent



Ensto Cubo D enclosures have a modern design with faceted corners and cover plugs.



Ensto Cubo D enclosures include fastening pods inside the cover.



This enclosure is equipped with hinges (DSH11) and fastening lugs (DFL1).



## Ensto Cubo D enclosures with plain sides

Width (mm)	Height (mm)	Depth (mm)	Base depth (mm)	Inner depth (mm)	Polycarbonate grey cover (Product code, GTIN-13)	Polycarbonate transparent cover (Product code, GTIN-13)	ABS grey cover (Product code, GTIN-13)	ABS transparent cover (Product code, GTIN-13)
53	55	36	26	27,5	DPCP050504G 6418677150005	DPCP050504T 6418677150012	DABP050504G 6418677150029	DABP050504T 6418677150036
53	63	36	26	25,0	DPCP050704G 6418677150043	DPCP050704T 6418677150050	DABP050704G 6418677150067	DABP050704T 6418677150074
80	82	56	41	42,0	DPCP080806G 6418677150081	DPCP080806T 6418677150098	DABP080806G 6418677150104	DABP080806T 6418677150111
80	82	86	71	72,0	DPCP080809G 6418677150128	DPCP080809T 6418677150135	DABP080809G 6418677150142	DABP080809T 6418677150159
80	120	56	41	42,0	DPCP081206G 6418677150166	DPCP081206T 6418677150173	DABP081206G 6418677150180	DABP081206T 6418677150197
80	120	86	71	72,0	DPCP081209G 6418677150203	DPCP081209T 6418677150210	DABP081209G 6418677150227	DABP081209T 6418677150234
80	160	56	41	42,0	DPCP081606G 6418677150241	DPCP081606T 6418677150258	DABP081606G 6418677150265	DABP081606T 6418677150272
80	160	86	71	72,0	DPCP081609G 6418677150289	DPCP081609T 6418677150296	DABP081609G 6418677150302	DABP081609T 6418677150319
120	122	56	41	42,0	DPCP121206G 6418677150326	DPCP121206T 6418677150333	DABP121206G 6418677150340	DABP121206T 6418677150357
120	122	86	71	72,0	DPCP121209G 6418677150364	DPCP121209T 6418677150371	DABP121209G 6418677150388	DABP121209T 6418677150395
120	160	91	61	77,5	DPCP121609G 6418677150401	DPCP121609T 6418677150418	DABP121609G 6418677150425	DABP121609T 6418677150432
120	200	86	71	72,0	DPCP122009G 6418677150487	DPCP122009T 6418677150494	DABP122009G 6418677150500	DABP122009T 6418677150517
150	200	76	61	62,0	DPCP152008G 6418677150562	DPCP152008T 6418677150579	DABP152008G 6418677150586	DABP152008T 6418677150593
160	240	91	76	77,5	DPCP162409G 6418677150609	DPCP162409T 6418677150616	DABP162409G 6418677150623	DABP162409T 6418677150630
160	240	121	76	107,5	DPCP162412G 6418677150647	DPCP162412T 6418677150654	DABP162412G 6418677150661	DABP162412T 6418677150678
230	300	86	56	72,5	DPCP233009G 6418677150722	DPCP233009T 6418677150739	DABP233009G 6418677150746	DABP233009T 6418677150753
230	300	111	56	97,5	DPCP233011G 6418677150760	DPCP233011T 6418677150777	DABP233011G 6418677150784	DABP233011T 6418677150791



DPCP081206G



DPCP233011T

## Mounting plates and DIN rails

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
<b>Mounting plates, galvanized steel</b>				
DMP0808	For 80 x 82 mm enclosures	55 x 65 x 1.5	10	6418677150821
DMP0812	For 80 x 120 mm enclosures	65 x 93 x 1.5	10	6418677150838
DMP0816	For 80 x 160 mm enclosures	65 x 133 x 1.5	10	6418677150845
DMP1212	For 120 x 122 mm enclosures	95 x 105 x 1.5	10	6418677150852
DMP1216	For 120 x 160 mm enclosures	105 x 132 x 1.5	10	6418677150869
DMP1220	For 120 x 200 mm enclosures	105 x 172 x 1.5	10	6418677150876
DMP1520	For 150 x 200 mm enclosures	133 x 172 x 1.5	10	6418677150890
DMP1624	For 160 x 240 mm enclosures	145 x 213 x 1.5	10	6418677150906
DMP2330	For 230 x 300 mm enclosures	210 x 285 x 1.5	10	6418677150920
<b>DIN rails 15 mm, DIN 46277/3, galvanized steel</b>				
DR15016.4	For 53 x 55 mm enclosures	15 x 26	10	6418677150937
DR15038.4	For 53 x 63 mm enclosures	15 x 48	10	6418677150944
DR15058.4	For 80 x 82 mm enclosures	15 x 68	10	6418677150951
DR15096.4	For 80 x 120 mm and 120 x 122 mm enclosures	15 x 106	10	6418677150975
DR15136.4	For 80 x 160 mm and 120 x 160 mm enclosures	15 x 146	10	6418677150999
<b>DIN rails 35 mm, DIN 46277/3, galvanized steel</b>				
DR35058.4	For 80 x 82 mm enclosures	35 x 68	10	6418677150968
DR35096.4	For 80 x 120 mm and 120 x 122 mm enclosures	35 x 106	10	6418677150982
DR35136.4	For 80 x 160 mm and 120 x 160 mm enclosures	35 x 146	10	6418677151002
DR35160.4	For 150 x 200 mm enclosures	35 x 170	10	6418677151071
DR35176.4	For 120 x 200 mm enclosures	35 x 186	10	6418677151057
DR35215.4	For 160 x 240 mm enclosures	35 x 225	10	6418677156120
DR35275.4	For 230 x 300 mm enclosures	35 x 285	10	6418677151101



DMP0808



Hinge pair, DSH1.

## Other accessories

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
DSH1	Hinge pair	28 x 28	1	6418677156144
DFL1	Fastening lug, set of 4	33 x 21 x 9.5	1	6418677151125
DCP1	Cover plug		50	6418677151149
DLS1	Cover screw, short	3 x 18/10	100	6418677151163
DLSA1.02	Screw set, 2 short cover screws DLS1 and 2 mounting screws DMS1 and cover plugs DCP1	3 x 18/10	1	6438100070113
DLSA1.04	Screw set, 4 short cover screws DLS1 and 4 mounting screws DMS1 and cover plugs DCP1	3 x 18/10	1	6418677151293
DLSA1.06	Screw set, 6 short cover screws DLS1 and 4 mounting screws DMS1 and cover plugs DCP1	3 x 50/10	1	6418677151309
DLS2	Cover screw, long, for 162412 and 233011	3 x 50/10	1	6418677151279
DLSA2.06	Screw set, 6 long cover screws DLS2 and 4 mounting screws DMS1	3 x 50/10	1	6438100087692
DLS3	Cover screw, TORX TX20	3 x 18/10	48	6418677151286
DMS1	Mounting screw	3 x 7	100	6418677151156



Fastening lug set, DFL1.

# Ensto Cubo O, C and W enclosures, IP66 and 67

Sizes 200 x 200 x 132 to 400 x 600 x 187 mm



## Ensto Cubo O, C and W enclosure in brief:

- › Ensto Cubo O has plain sides or with metric knockouts
- › Ensto Cubo C has flange knockouts
- › Ensto Cubo W has pre-assembled hinges and quick release latches as standard, available with plain sides
- › Available in 8 base sizes, one base depth and one cover height
- › Ensto Cubo O and C have 55-millimeter-deep extension frame available for alternative depths in all sizes. Several extension frames can be used on top of one another in one enclosure.
- › Cover and cover screws equipped with sealing holes
- › Cover can also be mounted onto the back of the base
- › Wide range of accessories available.

## Contents of the product package:

132-millimeter-deep standard enclosure includes:

- › Enclosure base
- › Cover
- › Cover screws or latches and hinges
- › Mounting screws

187-millimeter-deep standard enclosure includes:

- › Enclosure base
- › Cover
- › Extension frame
- › Cover screws or latches and hinges
- › Mounting screws
- › Screws for the extension frame

## Further information

- › Common enclosure accessories, pages 46-49
- › UL-listed enclosures, pages 32-34
- › Dimensional drawings, pages 104-111
- › Product cards, dimensional drawings and 3D models can be found at [ensto.com](http://ensto.com).

Conformity	
PC enclosures:	CE <small>RoHS</small> FI UL <small>cUL</small> GL <small>CCC</small>
Standards	
EN 62208, UL 508A	
Technical information	
Degree of protection:	IP66 and IP67
Impact resistance:	PC: IK08 (-25 °C... +35 °C)
Operating temperature:	PC: -40 °C ... +80 °C
Short term temperature range:	PC: -40 °C... +120 °C
Flammability rating:	PC: UL 746C 5 inch flame
UL File no:	E189312
UL category:	NITW, NITW7
Environmental type (UL):	4, 4X, 12, 13
Outdoor suitability:	PC: UL 746C (f1) rated material
Insulation:	Class II
Material	
Base:	Fibreglass reinforced polycarbonate
Cover:	Polycarbonate
Cover screws:	Fibreglass reinforced polyamide
Gasket:	PUR (polyurethane)
Enclosure side types	
PC enclosures:	Plain sides, metric knockouts, flange knockouts
Standard color	
Base:	Grey RAL 7035
Cover:	Grey RAL 7035 or transparent



Adjustable elevators are available for the base corner slots allowing the mounting of plates and panels at any height.



It is possible to mount the cover onto the back of the base.



## Ensto Cubo O enclosures with plain sides

Width (mm)	Height (mm)	Depth (mm)	Base depth (mm)	Inner depth (mm)	Polycarbonate grey cover (product code, GTIN-13)	Polycarbonate transparent cover (product code, GTIN-13)	ABS grey cover (Product code, GTIN-13)	ABS transparent cover (Product code, GTIN-13)
200	200	132	102	115,0	OPCP202013G 6418677184413	OPCP202013T 6418677184345	OABP202013G 6418677184550	OABP202013T 6418677184482
200	200	187	102 + 55*	170,0	OPCP202018G 6418677184628	OPCP202018T 6418677184697	OABP202018G 6418677184765	OABP202018T 6418677184833
200	300	132	102	115,0	OPCP203013G 6418677184420	OPCP203013T 6418677184352	OABP203013G 6418677184567	OABP203013T 6418677184499
200	300	187	102 + 55*	170,0	OPCP203018G 6418677184635	OPCP203018T 6418677184703	OABP203018G 6418677184772	OABP203018T 6418677184840
200	400	132	102	115,0	OPCP204013G 6418677184437	OPCP204013T 6418677184369	OABP204013G 6418677184574	OABP204013T 6418677184505
200	400	187	102 + 55*	170,0	OPCP204018G 6418677184642	OPCP204018T 6418677184710	OABP204018G 6418677184789	OABP204018T 6418677184857
300	300	132	102	115,0	OPCP303013G 6418677184444	OPCP303013T 6418677184376	OABP303013G 6418677184581	OABP303013T 6418677184512
300	300	187	102 + 55*	170,0	OPCP303018G 6418677184659	OPCP303018T 6418677184727	OABP303018G 6418677184796	OABP303018T 6418677184864
300	400	132	102	115,0	OPCP304013G 6418677184451	OPCP304013T 6418677184383	OABP304013G 6418677184598	OABP304013T 6418677184529
300	400	187	102 + 55*	170,0	OPCP304018G 6418677184666	OPCP304018T 6418677184734	OABP304018G 6418677184802	OABP304018T 6418677184871
300	600	132	102	115,0	OPCP306013G 6418677184468	OPCP306013T 6418677184390	OABP306013G 6418677184604	OABP306013T 6418677184536
300	600	187	102 + 55*	170,0	OPCP306018G 6418677184673	OPCP306018T 6418677184741	OABP306018G 6418677184819	OABP306018T 6418677184888
400	400	132	102	115,0	OPCP404013G 6438100112813	OPCP404013T 6438100112790	OABP404013G 6438100112851	OABP404013T 6438100112837
400	400	187	102 + 55*	170,0	OPCP404018G 6438100112820	OPCP404018T 6438100112806	OABP404018G 6438100112868	OABP404018T 6438100112844
400	600	132	102	115,0	OPCP406013G 6418677184475	OPCP406013T 6418677184406	OABP406013G 6418677184611	OABP406013T 6418677184543
400	600	187	102 + 55*	170,0	OPCP406018G 6418677184680	OPCP406018T 6418677184758	OABP406018G 6418677184826	OABP406018T 6418677184895

\* includes the extension frame



OPCP202013G



OPCP304013T

## Ensto Cubo O enclosures with metric knock-outs

Width (mm)	Height (mm)	Depth (mm)	Base depth (mm)	Inner depth (mm)	Knockouts	Polycarbonate grey cover (product code, GTIN-13)	Polycarbonate transparent cover (product code, GTIN-13)
300	300	132	102	115,0	12 x M20 + 1 x M16/25 + 8 x M20 + 4 x M25/40	OPCM303013G <sup>(1)</sup> 6418677157899	OPCM303013T <sup>(1)</sup> 6418677157929
300	300	187	102 + 55*	170,0	12 x M20 + 1 x M16/25 + 8 x M20 + 4 x M25/40	OPCM303018G <sup>(2)</sup> 6418677157950	OPCM303018T <sup>(2)</sup> 6418677157981
300	400	132	102	115,0	8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40	OPCM304013G <sup>(3)</sup> 6418677157905	OPCM304013T <sup>(3)</sup> 6418677157936
300	400	187	102 + 55*	170,0	8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40	OPCM304018G <sup>(4)</sup> 6418677157967	OPCM304018T <sup>(4)</sup> 6418677157998
300	600	132	102	115,0	8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40	OPCM306013G <sup>(3)</sup> 6418677157912	OPCM306013T <sup>(3)</sup> 6418677157943
300	600	187	102 + 55*	170,0	8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40	OPCM306018G <sup>(4)</sup> 6418677157974	OPCM306018T <sup>(4)</sup> 6418677158001

\* includes the extension frame



OPCM304018G



OPCM306018T

## Ensto Cubo C enclosures with flange knockouts, polycarbonate

Width (mm)	Height (mm)	Depth (mm)	Base depth (mm)	Inner depth (mm)	Polycarbonate grey cover (product code, GTIN-13)	Polycarbonate transparent cover (product code, GTIN-13)
200	200	132	102	115.0	CPCF202013G <sup>(1)</sup> 6418677172120	CPCF202013T <sup>(1)</sup> 6418677172199
200	200	187	102 + 55*	170.0	CPCF202018G <sup>(1)</sup> 6418677182167	CPCF202018T <sup>(1)</sup> 6418677182235
200	300	132	102	115.0	CPCF203013G <sup>(2)</sup> 6418677172137	CPCF203013T <sup>(2)</sup> 6418677172205
200	300	187	102 + 55*	170.0	CPCF203018G <sup>(2)</sup> 6418677182174	CPCF203018T <sup>(2)</sup> 6418677182242
200	400	132	102	115.0	CPCF204013G <sup>(2)</sup> 6418677172144	CPCF204013T <sup>(2)</sup> 6418677172212
200	400	187	102 + 55*	170.0	CPCF204018G <sup>(2)</sup> 6418677182181	CPCF204018T <sup>(2)</sup> 6418677182259
300	300	132	102	115.0	CPCF303013G <sup>(3)</sup> 6418677172151	CPCF303013T <sup>(3)</sup> 6418677172229
300	300	187	102 + 55*	170.0	CPCF303018G <sup>(3)</sup> 6418677182198	CPCF303018T <sup>(3)</sup> 6418677182266
300	400	132	102	115.0	CPCF304013G <sup>(3)</sup> 6418677172168	CPCF304013T <sup>(3)</sup> 6418677172236
300	400	187	102 + 55*	170.0	CPCF304018G <sup>(3)</sup> 6418677182204	CPCF304018T <sup>(3)</sup> 6418677182273
300	600	132	102	115.0	CPCF306013G <sup>(4)</sup> 6418677172175	CPCF306013T <sup>(4)</sup> 6418677172243
300	600	187	102 + 55*	170.0	CPCF306018G <sup>(4)</sup> 6418677182211	CPCF306018T <sup>(4)</sup> 6418677182280
400	400	132	102	115.0	CPCF404013G <sup>(3)</sup> 6438100112899	CPCF404013T <sup>(3)</sup> 6438100112875
400	400	187	102 + 55*	170.0	CPCF404018G <sup>(3)</sup> 6438100112905	CPCF404018T <sup>(3)</sup> 6438100112882
400	600	132	102	115.0	CPCF406013G <sup>(4)</sup> 6418677172182	CPCF406013T <sup>(4)</sup> 6418677172250
400	600	187	102 + 55*	170.0	CPCF406018G <sup>(4)</sup> 6418677182228	CPCF406018T <sup>(4)</sup> 6418677182297



CPCF202013G



CPCF203018T

<sup>1)</sup> Includes the extension frame  
<sup>1)</sup> 4 x F1 knockouts  
<sup>2)</sup> 2 x F1 knockouts + 2 x F2 knockouts

<sup>3)</sup> 4 x F2 knockouts  
<sup>4)</sup> 6 x F2 knockouts

## Ensto Cubo W wall cabinets with hinges and latches, plain sides, polycarbonate

Width (mm)	Height (mm)	Depth (mm)	Base depth (mm)	Inner depth (mm)	Polycarbonate grey cover (product code, GTIN-13)	Polycarbonate transparent cover (product code, GTIN-13)
200	200	132	102	115.0	WPCP202013G 6418677174308	WPCP202013T 6418677174384
200	200	187	102 + 55*	170.0	WPCP202018G 6418677174469	WPCP202018T 6418677174544
200	300	132	102	115.0	WPCP203013G 6418677174315	WPCP203013T 6418677174391
200	300	187	102 + 55*	170.0	WPCP203018G 6418677174476	WPCP203018T 6418677174551
200	400	132	102	115.0	WPCP204013G 6418677174322	WPCP204013T 6418677174407
200	400	187	102 + 55*	170.0	WPCP204018G 6418677174483	WPCP204018T 6418677174568
300	300	132	102	115.0	WPCP303013G 6418677174339	WPCP303013T 6418677174414
300	300	187	102 + 55*	170.0	WPCP303018G 6418677174490	WPCP303018T 6418677174575
300	400	132	102 + 55*	115.0	WPCP304013G 6418677174346	WPCP304013T 6418677174421
300	400	187	102 + 55*	170.0	WPCP304018G 6418677174506	WPCP304018T 6418677174582
300	600	132	102 + 55	115.0	WPCP306013G 6418677174353	WPCP306013T 6418677174438
300	600	187	102 + 55*	170.0	WPCP306018G 6418677174513	WPCP306018T 6418677174599
400	400	132	102 + 55	115.0	WPCP404013G 6438100113285	WPCP404013T 6438100113292
400	400	187	102 + 55*	170.0	WPCP404018G 6438100113308	WPCP404018T 6438100113315
400	600	132	102 + 55	115.0	WPCP406013G 6418677174377	WPCP406013T 6418677174452
400	600	187	102 + 55*	170.0	WPCP406018G 6418677174537	WPCP406018T 6418677174612



WPCP202013G



WPCP406018T

<sup>\*)</sup> Includes the extension frame



# Accessories for Ensto Cubo O, C enclosures

## Bases

Includes mounting screws

Width (mm)	Height (mm)	Depth (mm)	Polycarbonate plain sides (product code, GTIN-13)	Polycarbonate Metric knockouts (product code, GTIN-13)	Polycarbonate Flange knockouts (product code, GTIN-13)
200	200	102	OPCP202010B 6418677164248		CPCF202010B <sup>14</sup> 6418677171697
200	300	102	OPCP203010B 6418677164255		CPCF203010B <sup>15</sup> 6418677171703
200	400	102	OPCP204010B 6418677164262		CPCF204010B <sup>15</sup> 6418677171710
300	300	102	OPCP303010B 6418677164279	OPCM303010B <sup>11</sup> 6418677182600	CPCF303010B <sup>16</sup> 6418677171727
300	400	102	OPCP304010B 6418677164286	OPCM304010B <sup>12</sup> 6418677182617	CPCF304010B <sup>16</sup> 6418677171734
300	600	102	OPCP306010B 6418677164293	OPCM306010B <sup>13</sup> 6418677182624	CPCF306010B <sup>17</sup> 6418677171741
400	400	102	OPCP404010B 6438100112943		CPCF404010B <sup>16</sup> 6438100112929
400	600	102	OPCP406010B 6418677164309		CPCF406010B <sup>17</sup> 6418677171758

<sup>11</sup> 12 x M20 + 1 x M16/25 + 8 x M20 + 4 x M25/40

<sup>12</sup> 8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40

<sup>13</sup> 8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40

<sup>14</sup> 4 x F1 knockout,

<sup>15</sup> 2 x F1 knockout + 2 x F2 knockout

<sup>16</sup> 4 x F2 knockout,

<sup>17</sup> 6 x F2 knockout



OPCM303010B



CPCF304010B



OPCP303006E



OPCG303003L

## Extension frames, polycarbonate

Width (mm)	Height (mm)	Depth (mm)	Polycarbonate grey cover (product code, GTIN-13)
200	200	55	OPCP202006E 6418677164606
200	300	55	OPCP203006E 6418677164613
200	400	55	OPCP204006E 6418677164620
300	300	55	OPCP303006E 6418677164637
300	400	55	OPCP304006E 6418677164644
300	600	55	OPCP306006E 6418677164651
400	400	55	OPCP404006E 6438100112912
400	600	55	OPCP406006E 6418677164668

## Covers

Width (mm)	Height (mm)	Depth (mm)	Polycarbonate grey cover (product code, GTIN-13)	Polycarbonate transparent cover (product code, GTIN-13)	Grey cover with window for kWh-meter, polycarbonate (Product code, GTIN-13)
200	200	102	OPCG202003L <sup>1</sup> 6418677164453	OPCT202003L <sup>1</sup> 6418677164385	
200	300	102	OPCG203003L <sup>1</sup> 6418677164460	OPCT203003L <sup>1</sup> 6418677164392	
200	400	102	OPCG204003L <sup>1</sup> 6418677164477	OPCT204003L <sup>1</sup> 6418677164408	
300	300	102	OPCG303003L <sup>1</sup> 6418677164484	OPCT303003L <sup>1</sup> 6418677164415	
300	400	102	OPCG304003L <sup>1</sup> 6418677164491	OPCT304003L <sup>1</sup> 6418677164422	
300	600	102	OPCG306003L <sup>1</sup> 6418677164507	OPCT306003L <sup>1</sup> 6418677164439	
400	400	102	OPCG404003L <sup>1</sup> 6438100112967	OPCT404003L <sup>1</sup> 6438100112974	
400	600	102	OPCG406003L <sup>1</sup> 6418677164514	OPCT406003L <sup>1</sup> 6418677164446	OPCG36KWH <sup>2</sup> 6418677174186

<sup>1</sup> Includes gasket

<sup>2</sup> Inspection window 113 x 153 mm, Includes cover screws



OPCT303003L



OPCG36KWH

# Accessories for Ensto Cubo O, C enclosures

## Mounting plates and DIN rails

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
<b>Mounting plates, galvanized steel</b>				
OMP2020	For 200 x 200 mm enclosures	160 x 160 x 1.5	1	6418677164675
OMP2030	For 200 x 300 mm enclosures	160 x 260 x 1.5	1	6418677164682
OMP2040	For 200 x 400 mm enclosures	160 x 360 x 1.5	1	6418677164699
OMP3030	For 300 x 300 mm enclosures	260 x 260 x 1.5	1	6418677164705
OMP3040	For 300 x 400 mm enclosures	260 x 360 x 1.5	1	6418677164712
OMP3060	For 300 x 600 mm enclosures	260 x 560 x 1.5	1	6418677164729
OMP4040	For 400 x 400 mm enclosures	360 x 360 x 1.5	1	6438100112370
OMP4060	For 400 x 600 mm enclosures	360 x 560 x 1.5	1	6418677164736
<b>Mounting plates for kWh meter, galvanized steel</b>				
KWHP3040	For 300 x 400 mm enclosures	260 x 360 x 1.5	1	6418677173110
KWHP3060	For 300 x 600 mm enclosures	260 x 560 x 1.5	1	6418677173097
KWHP4040	For 400 x 400 mm enclosures	360 x 360 x 1.5	1	6438100112394
KWHP4060	For 400 x 600 mm enclosures	360 x 560 x 1.5	1	6418677173127
<b>DIN rails, DIN 46277/3, galvanized steel</b>				
DR35150.5	For 200 mm side	35 x 160	1	6418677164743
DR35240.5	For 600 mm side/middle with front panel	35 x 250	1	6418677176647
DR35250.5	For 300 mm side	35 x 260	1	6418677164750
DR35340.5	For 600 mm side/middle with front panel	35 x 350	1	6418677176654
DR35350.5	For 400 mm side	35 x 360	1	6418677164767



OMP3040



KWHP3040

## Profiles for DIN rails, galvanized steel

	Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
Height 14,5 mm	PRE2.14	Pair, for 200 mm side	115 x 14 x 14	1	6418677173172
	PRE3.14	Pair, for 300 mm side	215 x 14 x 14	1	6418677173134
	PRE4.14	Pair, for 400 mm side	315 x 14 x 14	1	6418677173141
	PRE75.14	Pair, for 600 mm side or center	75 x 14 x 14	1	6418677173158
Height 32,5 mm	PRE2.32	Pair, for 200 mm side	115 x 14 x 32	1	6418677173189
	PRE3.32	Pair, for 300 mm side	215 x 14 x 32	1	6418677172687
	PRE4.32	Pair, for 400 mm side	315 x 14 x 32	1	6418677172694
	PRE75.32	Pair, for 600 mm side or center	75 x 14 x 32	1	6418677173165



PRE2.14

## Busbar support sets

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
KGH1.10	Support set for bars 10 mm x 10, 12, 20 or 30 mm	266 x 78 x 18	1	6418677172373
KGH1.05	Support set for bars 5 mm x 10, 12, 15 or 20 mm	266 x 78 x 18	1	6418677172380



KGH1.10



## Accessories for Ensto Cubo O, C enclosures

### Terminals for Al/Cu busbars

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
KG81	Terminal for 25-70 mm <sup>2</sup> cable	10 mm Al/Cu	1	6418677163739
KG83	Terminal for 16-185 mm <sup>2</sup> cable	10 mm Al/Cu	1	6418677163746
KG85	Terminal for 2 x 35 mm <sup>2</sup> + 2 x 16 mm <sup>2</sup> cables	10 mm Al/Cu	1	6418677163753
KG87	Terminal for 4 x 35 mm <sup>2</sup> + 4 x 16 mm <sup>2</sup> cables	10 mm Al/Cu	1	6418677163760
KG80	Terminal for 25-70 mm <sup>2</sup> cable	5 mm Al/Cu	1	6418677163852
KG82	Terminal for 6-70 mm <sup>2</sup> cable	5 mm Al/Cu	1	6418677163869
KG84	Terminal for 3 x 16 mm <sup>2</sup> cables	5 mm Al/Cu	1	6418677163876
KG86	Terminal for 6 x 16 mm <sup>2</sup> cables	5 mm Al/Cu	1	6418677163883



KG85

### Strain reliefs

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
KJ8.13	300 mm side/for 1 cable, galvanized steel	265 x 65 x 85	1	6418677172755
KJ8.23	300 mm side/for 2 cables, galvanized steel	265 x 65 x 85	1	6418677173271
KJ8.14	400 mm side/for 1 cable, galvanized steel	365 x 65 x 85	1	6418677173288
KJ8.24	400 mm side/for 2 cables, galvanized steel	365 x 65 x 85	1	6418677173295



KJ8.13

## Accessories for Ensto Cubo O, C, W enclosures

### Cover screws for Ensto Cubo O, C enclosures

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
OLS42	Slotted/cross head, sealable	14 x 42	1	6418677164590
OLSA42.4	Screw set, 4 slotted/cross head cover screws OLS42	14 x 42	1	6418677174704
OLSA42.6	Screw set, 6 slotted/cross head cover screws OLS42	14 x 42	1	6418677174711
OLSA42.04	Screw set, 4 slotted/cross head cover screws OLS42 and 4 mounting screws OMS1	14 x 42	1	6418677172267
OLSA42.06	Screw set, 6 slotted/cross head cover screws OLS42 and 8 mounting screws OMS1	14 x 42	1	6418677172274
OLS42N	Slotted/cross head, dark grey Noryl	14 x 42	1	6418677174728
OLS32	Slotted/cross head for 600 mm modular cover	14 x 32	1	6418677174360
PLS63	Springloaded, slotted/cross head	14 x 62	1	6418677173073
OLSH1	Hinged cover screw, slotted/cross head, blue, polyamide	14 x 96	1	6418677174247
OLWH1	Hinged cover screw, wing head, blue, polyamide	14 x 113	1	6418677174254
OLW55	Wing head	14 x 55	1	6418677171765
OLWA55.4	Screw set, 4 wing head cover screws OLW55	14 x 55	1	6418677174735
OLWA55.6	Screw set, 6 wing head cover screws OLW55	14 x 55	1	6418677174742
OLWA55.04	Screw set, 4 wing head cover screws OLW55 and 4 mounting screws OMS1	14 x 55	1	6418677172281
OLWA55.06	Screw set, 6 wing head cover screws OLW55 and 8 mounting screws OMS1	14 x 55	1	6418677174759
OLT42	DIN 3 head	14 x 42	1	6418677171772
OLTA42.4	Screw set, 4 DIN 3 head cover screws OLT42	14 x 42	1	6418677174766
OLTA42.6	Screw set, 6 DIN 3 head cover screws OLT42	14 x 42	1	6418677174773
OLTA42.04	Screw set, 4 DIN 3 head cover screws OLT42 and 4 mounting screws OMS1	14 x 42	1	6418677172298
OLTA42.06	Screw set, 6 DIN 3 head cover screws OLT42 and 8 mounting screws OMS1	14 x 42	1	6418677174780
OLTA42.041	Screw set, 4 DIN 3 head cover screws OLT42 and 4 mounting screws OMS1 + key OLT42KEY	14 x 42	1	6418677174797
OLT42KEY	Key for DIN head screw OLT42	50 x 53 x ø22	1	6418677172410



Cover screw, slotted/cross head, OLS42.



Cover screw, springloaded, slotted/cross head, PLS63.



Cover screw, wing head, OLW55.



Hinged cover screw, OLSH1.



# Accessories for Ensto Cubo O, C, W enclosures

## Other accessories

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
OCS22.46	Customizing template, transparent	300 x 400 x 6	1	6418677184338
OES1	Extension frame screw	∅ 17 x 67	1	6418677174803
OESA1.04	Extension frame screws, set of 4 pcs	∅17 x 67	1	6438100081409
OESA1.06	Extension frame screws, set of 6 pcs	∅17 x 67	1	6438100081416
OHI1	Hinge pair, Includes mounting instruction	40 x 50 x 16.5	1	6418677164774
OHICP1	Hinge pair, Includes 2 cover plugs	40 x 50 x 16.5	1	6418677172304
OFL1	Fastening lug, set of 4 pcs	19 x 40 x 35.5	1	6418677164781
OEL1	Corner elevator, Includes M5 bolt	19 x 19 x 14	1	6418677164798
OELA1.04	Corner elevator, set of 4 OEL1	19 x 19 x 14	1	6418677181696
OPHFPA1.04	Hinge set for swing panel, set of 2	-	1	6438100200817
OTS1	Threaded bushing, for cover screw when cover mounted on the back	18/30 ∅ 16	1	6418677171789
OTSA1.04	Threaded bushing, 4 x OTS1 + 4 x OLS42	17 x 30/18	1	6418677181702
OMS1	Mounting screw, for rails and plates	5 x 10	1	6418677164804
OBI1	Brass insert, for mounting pod	M3	1	6418677172328
OBI1.04	Brass insert, set of 4 OBI1	M3	1	6418677172335
OCP1	Cover plug, polyethylene	11 x ∅ 15/17	1	6418677164811
OBS15	15 mm spacer, Includes M5 screw, steel	15 x 8	1	6418677171802
OBS15.04	15 mm spacer, set of 4 pcs	15 x 8	1	6418677172342
OBS20	20 mm spacer, Includes M5 screw, steel	20 x 8	1	6418677171819
OBS20.04	20 mm spacer, set of 4 pcs	20 x 8	1	6418677172359
OBS30	30 mm spacer, Includes M5 screw, steel	30 x 8	1	6418677171826
OBS30.04	30 mm spacer, set of 4 pcs	30 x 8	1	6418677172366
WQL1.1	Latch, pair, Includes hooks and counter parts	-	1	6418677174902



Hinge pair, OHI1.



Fastening lug set, OFL1.



Corner elevator, OEL1.



Latch, pair, WQL1.1.

## N and PE rails

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
KN15.315	For 300 mm side, N + PE, Cu 2 x (2 x 16 / 13 x 6 mm <sup>2</sup> )	250	1	6418677153020
KN16.330	For 300 mm side, N, Cu 4 x 16 / 26 x 6 mm <sup>2</sup>	250	1	6418677153037
KN17.332	For 300 mm side, PE, Cu 4 x 16 / 28 x 6 mm <sup>2</sup>	250	1	6418677153044
KN15.423	For 400 mm side, N + PE, Cu 2 x (2 x 16 / 21 x 6 mm <sup>2</sup> )	350	1	6418677153051
KN16.436	For 400 mm side, N, Cu 4 x 16 / 32 x 6 mm <sup>2</sup>	350	1	6418677153068
KN17.436	For 400 mm side, PE, Cu 4 x 16 / 32 x 6 mm <sup>2</sup>	350	1	6418677153075

## Flanges and accessories for Ensto Cubo C enclosures, page 47



Inlet flange for 1 cable, F2CE.1.



Knockout flange, F2 size, F2252



Flange bolt set, F2 size, polyamide, F2PA30.



# Ensto PolyBox

## For Demanding Environments



Ensto PolyBox enclosures are rugged industrial polycarbonate enclosures with unique and innovative features, such as the integral nonmetallic latch and a corner elevator mounting system for adjustable hinged front kits and back panels.

### More than a box – all the benefits in one enclosure!

- JIC sized nonmetallic enclosure design with new stylish and robust feel and look.
- Light and tough – excellent impact and fire resistance
- Technical features and approval on high level
- Multiple modification possibilities
  - Holes & cutouts
  - Threads & countersinking
  - Silk-screening
  - Ask for other options!



Mounting bosses (screw towers) on the inside of the cover, 4 places (opaque version only).

Max. opening 223°.

Elevator part (4x)  
Can be installed on the different heights with a step of 6.75 mm (1/4").

Screw UNF 10-32 (4x).

Hydrophobic polyurethane gasket.

Wall thickness 4 mm!

Back panel - optional.

### Integral Nonmetallic Latch

A robust padlockable nonmetallic latch with only one moving part, providing superior protection.

### Corner Elevator System

Ensto's industry exclusive corner elevator system uses a slotted shelf technology that provides solid hinged front surfaces that are easy to install, align and keep level. This system also allows for a back panel to be raised off the back of the enclosure.



Note! The markings help you to install all of the elevator parts at the same height.



# Ensto PolyBox




## Rugged Industrial Enclosures



### Ensto PolyBox in Brief:

- › JIC sized nonmetallic enclosure design with new stylish and robust feel and look.
- › Light and tough – excellent impact and fire resistance
- › Technical features and approval on high level
- › Multiple modification possibilities
  - Holes & cutouts
  - Threads & countersinking
  - Silk-screening
  - Ask for other options!



Conformity	
Polycarbonate enclosures:	CE   
Technical information	
UL File no:	E189312
UL category:	NITW, NITW7
Environmental type (UL):	4X, 12, 13, 6P
Operating temperature:	-40 °F...176 °F (-40 °C...+80 °C)
Short term temperature range:	-40 °F...246 °F (-40 °C...+120 °C)
Flammability rating:	UL 746C five inch flame test
Degree of protection:	IP66/IP68/IP69 (submersion 2m/24h)
Impact resistance:	IK10 (-31 °F...104 °F / -35 °C...+40 °C)
Insulation:	Class II
Material	
Base/cover:	Polycarbonate
Gasket:	Hydrophobic PUR
Enclosure side types	
Polycarbonate enclosures:	Plain sides
Standard color	
Base:	RAL 7035
Cover:	RAL 7035 or transparent

### Ensto PolyBox Wall Mount Enclosures, Opaque Cover

Height inch (mm)	Width inch (mm)	Depth inch (mm)	Inner height inch (mm)	Inner width inch (mm)	Inner depth inch (mm)	Product code	Description	GTIN-13
8.78 (223)	6.77 (172)	5.47 (139)	7.5 (190)	5.49 (139)	4.13 (105)	UPCG080604	Lift-Off 4-Screws	6438100212049
						UPCG080604F	Lift-Off 4-Screws, Mounting Flange	6438100212056
						UPCG080604HS	Hinged 2-Screws	6438100212063
						UPCG080604HSF	Hinged 2-Screws, Mounting Flange	6438100212070
						UPCG080604HNL	Hinged Nonmetal Snap Latch	6438100212087
						UPCG080604HNLF	Hinged Nonmetal Snap Latch, Mounting Flange	6438100212094
						UPCG080604HML	Hinged Metal Snap Latch	6438100212100
UPCG080604HMLF	Hinged Metal Snap Latch, Mounting Flange	6438100212117						
10.85 (276)	8.85 (225)	7.47 (190)	9.58 (243)	7.57 (192)	6.13 (156)	UPCG100806	Lift-Off 4-Screws	6438100212254
						UPCG100806F	Lift-Off 4-Screws, Mounting Flange	6438100212261
						UPCG100806HS	Hinged 2-Screws	6438100212278
						UPCG100806HSF	Hinged 2-Screws, Mounting Flange	6438100212285
						UPCG100806HNL	Hinged Nonmetal Snap Latch	6438100212292
						UPCG100806HNLF	Hinged Nonmetal Snap Latch, Mounting Flange	6438100212308
						UPCG100806HML	Hinged Metal Snap Latch	6438100212315
UPCG100806HMLF	Hinged Metal Snap Latch, Mounting Flange	6438100212322						
12.82 (326)	10.86 (276)	7.27 (185)	11.55 (293)	9.58 (243)	6.13 (156)	UPCG121006	Lift-Off 4-Screws	6438100212476
						UPCG121006F	Lift-Off 4-Screws, Mounting Flange	6438100212483
						UPCG121006HS	Hinged 2-Screws	6438100212490
						UPCG121006HSF	Hinged 2-Screws, Mounting Flange	6438100212506
						UPCG121006HNL	Hinged Nonmetal Snap Latch	6438100212513
						UPCG121006HNLF	Hinged Nonmetal Snap Latch, Mounting Flange	6438100212520
						UPCG121006HML	Hinged Metal Snap Latch	6438100212537
UPCG121006HMLF	Hinged Metal Snap Latch, Mounting Flange	6438100212544						
18.99 (482)	16.98 (431)	11.47 (291)	17.71 (450)	15.7 (399)	10.13 (257)	UPCG181610	Lift-Off 4-Screws	6438100213152
						UPCG181610F	Lift-Off 4-Screws, Mounting Flange	6438100213169
						UPCG181610HS	Hinged 2-Screws	6438100213176
						UPCG181610HSF	Hinged 2-Screws, Mounting Flange	6438100213183
						UPCG181610HNL	Hinged Nonmetal Snap Latch	6438100213190
						UPCG181610HNLF	Hinged Nonmetal Snap Latch, Mounting Flange	6438100213206
						UPCG181610HML	Hinged Metal Snap Latch	6438100213213
UPCG181610HMLF	Hinged Metal Snap Latch, Mounting Flange	6438100213220						

## Ensto PolyBox Wall Mount Enclosures, Clear Cover

Height inch (mm)	Width inch (mm)	Depth inch (mm)	Inner height inch (mm)	Inner width inch (mm)	Inner depth inch (mm)	Product code	Description	GTIN-13
8.78 (223)	6.77 (172)	5.47 (139)	7.5 (190)	5.49 (139)	4.13 (105)	UPCT080604	Lift-Off 4-Screws	6438100212179
						UPCT080604F	Lift-Off 4-Screws, Mounting Flange	6438100212186
						UPCT080604HS	Hinged 2-Screws	6438100212193
						UPCT080604HSF	Hinged 2-Screws, Mounting Flange	6438100212209
						UPCT080604HNL	Hinged Nonmetal Snap Latch	6438100212216
						UPCT080604HNLF	Hinged Nonmetal Snap Latch, Mounting Flange	6438100212223
						UPCT080604HML	Hinged Metal Snap Latch	6438100212230
10.85 (276)	8.85 (225)	7.47 (190)	9.58 (243)	7.57 (192)	6.13 (156)	UPCT100806	Lift-Off 4-Screws	6438100212391
						UPCT100806F	Lift-Off 4-Screws, Mounting Flange	6438100212407
						UPCT100806HS	Hinged 2-Screws	6438100212414
						UPCT100806HSF	Hinged 2-Screws, Mounting Flange	6438100212421
						UPCT100806HNL	Hinged Nonmetal Snap Latch	6438100212438
						UPCT100806HNLF	Hinged Nonmetal Snap Latch, Mounting Flange	6438100212445
						UPCT100806HML	Hinged Metal Snap Latch	6438100212452
12.82 (326)	10.86 (276)	7.27 (185)	11.55 (293)	9.58 (243)	6.13 (156)	UPCT121006	Lift-Off 4-Screws	6438100212629
						UPCT121006F	Lift-Off 4-Screws, Mounting Flange	6438100212636
						UPCT121006HS	Hinged 2-Screws	6438100212643
						UPCT121006HSF	Hinged 2-Screws, Mounting Flange	6438100212650
						UPCT121006HNL	Hinged Nonmetal Snap Latch	6438100212667
						UPCT121006HNLF	Hinged Nonmetal Snap Latch, Mounting Flange	6438100340711
						UPCT121006HML	Hinged Metal Snap Latch	6438100212674
18.99 (482)	16.98 (431)	11.47 (291)	17.71 (450)	15.7 (399)	10.13 (257)	UPCT181610	Lift-Off 4-Screws	6438100213305
						UPCT181610F	Lift-Off 4-Screws, Mounting Flange	6438100213312
						UPCT181610HS	Hinged 2-Screws	6438100213329
						UPCT181610HSF	Hinged 2-Screws, Mounting Flange	6438100213336
						UPCT181610HNL	Hinged Nonmetal Snap Latch	6438100213343
						UPCT181610HNLF	Hinged Nonmetal Snap Latch, Mounting Flange	6438100213350
						UPCT181610HML	Hinged Metal Snap Latch	6438100213367
						UPCT181610HMLF	Hinged Metal Snap Latch, Mounting Flange	6438100213374



Hinged, Nonmetal Snap Latch (HNL)

Hinged, Metal Snap Latch (HML)

Hinged 2-Screws, Padlock Clamp (HS)

Lift-Off 4-Screws (No Suffix)



# Accessories for Ensto PolyBox Wall Mount Enclosures

## Mounting Flanges

Product code	Description	GTIN-13
UMF06	For 080604, bulk 100 pcs	6438100211820
UMF06.02	For 080604, Kit of 2 pcs	6438100211837
UMF08	For 100806, bulk 100 pcs	6438100212339
UMF08.02	For 100806, Kit of 2 pcs	6438100212346
UMF10	For 121006, bulk 100 pcs	6438100212551
UMF10.02	For 121006, Kit of 2 pcs	6438100212568
UMF16	For 181610, bulk 100 pcs	6438100212773
UMF16.02	For 181610, Kit of 2 pcs	6438100212780



UMF16

## Back Panels

For sizes (HxW) inch	Galvanized Steel (Product code, GTIN-13)	White painted steel (Product code, GTIN-13)	Aluminium (Product code, GTIN-13)	Polycarbonate (Product code, GTIN-13)
8.0 x 6.0	UBP0806Z 6438100212124	UBP0806ZW 6438100212131	UBP0806A 6438100212148	UBP0806P 6438100214050
10.0 x 8.0	UBP1008Z 6438100212353	UBP1008ZW 6438100212360	UBP1008A 6438100340681	UBP1008P 6438100340698
12.0 x 10.0	UBP1210Z 6438100212575	UBP1210ZW 6438100212582	UBP1210A 6438100212599	UBP1210P 6438100340704
18.0 x 16.0	UBP1816Z 6438100213251	UBP1816ZW 6438100213268	UBP1816A 6438100213275	UBP1816P 6438100340728



UBP1816Z

## Front Panels, Aluminium

For sizes (HxW) inch	Full cover front panel (Product code, GTIN-13)	Hinged front panel kit (Product code, GTIN-13)
8.0 x 6.0	UHP0806 6438100212162	UHFK0806A 6438100212155
10.0 x 8.0	UHP1008 6438100212384	UHFK1008A 6438100212377
12.0 x 10.0	UHP1210 6438100212612	UHFK1210A 6438100212605
18.0 x 16.0	UHP1816 6438100213299	UHFK1816A 6438100213282



UHP1816

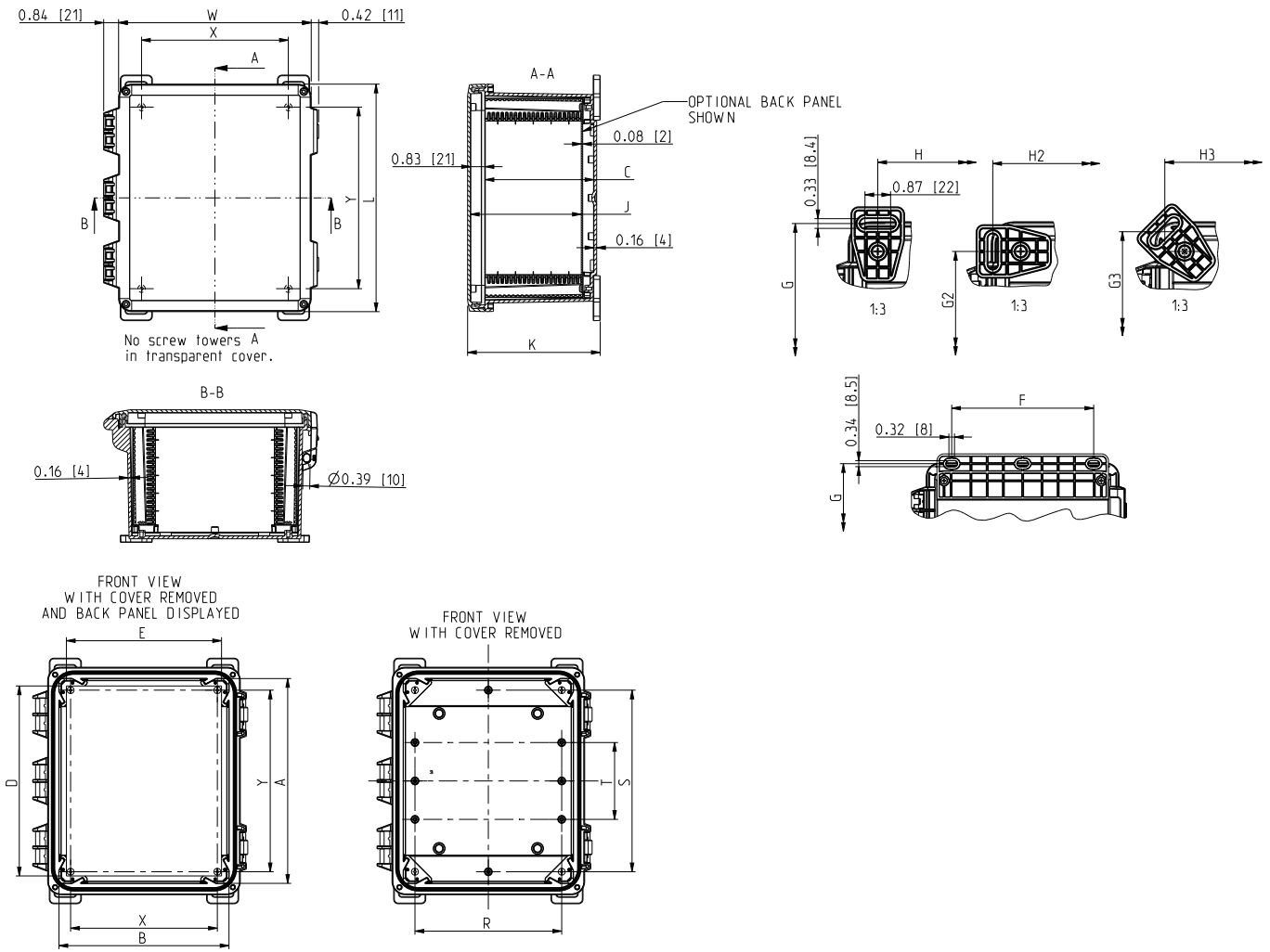
## Other Accessories

Product code	Description	GTIN-13
<b>Mounting Brackets</b>		
UMB1	Nonmetal mounting bracket/foot, bulk 500 pcs	6438100211844
UMB1.04	Nonmetal mounting bracket/foot, kit of 4 pcs	6438100211851
<b>Screws</b>		
UBPS1	Back panel screw, bulk 1000 pcs	6438100211936
UBPS1.04	Back panel screw, kit 4 pcs	6438100211943
UCS1	Metal cover screw 1000 pcs	6438100212032
UCS1.04	Metal cover screw, kit of 4 pcs	6438100340735
UFS1	Mounting flange screw, bulk 1000 pcs	6438100340766
UFS1.04	Mounting flange screw, kit 4 pcs	6438100340773
<b>Corner Elevators</b>		
UEL1	Corner elevator part 1000 pcs	6438100340742
UEL1.04S	Corner elevator part with screws, kit 4 +4 pcs	6438100350710
<b>Cover Plugs</b>		
UCBP1	Cover blanking plug, bulk 1000pcs	6438100340742
UCBP1.04	Cover blanking plug, kit 4 pcs	6438100341107
<b>Front Panel Hinge Kit</b>		
UHFP1.04	Front panel hinge kit of 2 hinges and 2 elevators	6438100344399



UHFK1008A

# Dimensional Drawing



## Dimensional Chart

Product code	Internal dimensions				External dimensions			Panel size		Mounting dimensions				Panel mounting holes		Bottom screw tower dimensions			
	A	B	C	J	L	W	K	D	E	G	H	H2	H3	F	Y	X	S	T	R
UPC#080604****	190	139	105	108	223	172	139	171	120	222	123	171	157	102	159	108	163	-	108
UPC#100806****	243	192	156	159	276	225	190	222	171	273	174	222	208	152.4	210	159	210	65	159
UPC#121006****	293	243	156	159	326	276	190	272	222	323	225	273	259	203	260	210	260	110	210
UPC#181610****	450	399	257	260	482	431	291	425	374	476	377	425	411	356	413	362	413	138	362

Dimensions in mm

# = G = Grey (Opaque)  
T = Transparent

\*\*\*\* = HNL = Hinged, Nonmetal Snap Latch  
HML = Hinged, Metal Snap Latch

HS = Hinged 2-Screws, Padlock Clamp  
No Suffix = Lift-Off 4-Screws

# UL-listed enclosures



## UL-listed enclosures in brief:

- UL-listed versions of Ensto Cubo S, D, O, C and W enclosures

## Further information

- Common enclosure accessories, pages 46-49
- Dimensional drawings, pages 95-111
- Product cards, dimensional drawings and 3D models can be found at [ensto.com](http://ensto.com).



The cover of Ensto Cubo S enclosure can be sealed.



Ensto Cubo S Enclosure with a low (10 mm) cover and a low (25 mm) base.



Ensto Cubo D enclosures have a modern design with faceted corners and cover plugs.



Ensto Cubo D enclosures include fastening pods inside the cover.



In Ensto Cubo O, C and W enclosures adjustable elevators are available for the base corner slots allowing the mounting of plates and panels at any height.



It is possible to mount the cover onto the back of the base of Ensto Cubo O,C and W enclosures.

Conformity	
PC enclosures:	
Standards	
EN 62208, UL 508A	
Technical information	
Degree of protection:	IP66 and IP67
Impact resistance:	PC: IK08 (-25 °C... +35 °C)
Operating temperature:	PC: -40 °C ... +80 °C
Short term temperature range:	PC: -40 °C... +120 °C
Flammability rating:	PC: UL 746C 5 inch flame
UL File no:	E189312
UL category:	NITW, NITW7
Environmental type (UL):	4, 4X, 12, 13 (Cubo S and D also 6)
Outdoor suitability:	PC: UL 746C (f1) rated material
Insulation:	Class II
Material	
Base:	Fibreglass reinforced polycarbonate
Cover:	Polycarbonate
Cover screws:	Fibreglass reinforced polyamide
Gasket:	PUR (polyurethane)
Enclosure side types	
PC enclosures:	Plain sides, metric knockouts
Standard color	
Base:	Grey RAL 7035
Cover:	Grey RAL 7035 or transparent



## UL-listed Ensto Cubo S -enclosures

Width (mm)	Height (mm)	Depth (mm)	Base depth (mm)	Base depth (mm)	Cover depth (mm)	UL-listed polycarbonate grey cover plain sides (product code, GTIN-13)	UL-listed polycarbonate transparent cover plain sides (product code, GTIN-13)	UL-listed polycarbonate grey cover metric knockouts (product code, GTIN-13)	UL-listed polycarbonate transparent cover metric knockouts (product code, GTIN-13)
75	125	35	20,5	25	10	SPCP081304LG.U 6438100115814	SPCP081304LT.U 6438100116170		
75	125	50	35,5	25	25	SPCP081305LG.U 6438100115821	SPCP081305LT.U 6438100116187		
75	125	60	45,5	50	10	SPCP081306G.U 6438100115838	SPCP081306T.U 6438100116194	SPCM081306G.U <sup>(1)</sup> 6438100115371	SPCM081306T.U <sup>(1)</sup> 6438100115593
75	125	75	60,5	25	50	SPCP081308LG.U 6438100115852	SPCP081308LT.U 6438100116200		
75	125	75	60,5	50	25	SPCP081308G.U 6438100115845	SPCP081308T.U 6438100116217	SPCM081308G.U <sup>(1)</sup> 6438100115388	SPCM081308T.U <sup>(1)</sup> 6438100115609
75	125	100	85,5	25	75	SPCP081310LG.U 6438100115876	SPCP081310LT.U 6438100116224		
75	125	100	85,5	50	50	SPCP081310G.U 6438100115869	SPCP081310T.U 6438100116231	SPCM081310G.U <sup>(1)</sup> 6438100115395	SPCM081310T.U <sup>(1)</sup> 6438100115616
75	125	125	110,5	50	75	SPCP081313G.U 6438100115883	SPCP081313T.U 6438100116248	SPCM081313G.U <sup>(1)</sup> 6438100115401	SPCM081313T.U <sup>(1)</sup> 6438100115623
100	100	35	20,5	25	10	SPCP101004LG.U 6438100115890	SPCP101004LT.U 6438100116255		
100	100	60	45,5	50	10	SPCP101006G.U 6438100115906	SPCP101006T.U 6438100116262	SPCM101006G.U <sup>(2)</sup> 6438100115418	SPCM101006T.U <sup>(2)</sup> 6438100115630
125	125	35	20,5	25	10	SPCP131304LG.U 6438100115913	SPCP131304LT.U 6438100116279		
125	125	50	35,5	25	25	SPCP131305LG.U 6438100115920	SPCP131305LT.U 6438100116286		
125	125	60	45,5	50	10	SPCP131306G.U 6438100115937	SPCP131306T.U 6438100116293	SPCM131306G.U <sup>(3)</sup> 6438100115425	SPCM131306T.U <sup>(3)</sup> 6438100115647
125	125	75	60,5	25	50	SPCP131308LG.U 6438100115944	SPCP131308LT.U 6438100116316		
125	125	75	60,5	50	25	SPCP131308G.U 6438100115951	SPCP131308T.U 6438100116309	SPCM131308G.U <sup>(3)</sup> 6438100115432	SPCM131308T.U <sup>(3)</sup> 6438100115654
125	125	100	85,5	25	75	SPCP131310LG.U 6438100115968	SPCP131310LT.U 6438100116330		
125	125	100	85,5	50	50	SPCP131310G.U 6438100115975	SPCP131310T.U 6438100116323	SPCM131310G.U <sup>(3)</sup> 6438100115449	SPCM131310T.U <sup>(3)</sup> 6438100115661
125	125	125	110,5	50	75	SPCP131313G.U 6438100115982	SPCP131313T.U 6438100116347	SPCM131313G.U <sup>(3)</sup> 6438100115456	SPCM131313T.U <sup>(3)</sup> 6438100115678
125	175	35	20,5	25	10	SPCP131804LG.U 6438100115999	SPCP131804LT.U 6438100116354		
125	175	50	35,5	25	25	SPCP131805LG.U 6438100116002	SPCP131805LT.U 6438100116361		
125	175	60	45,5	50	10	SPCP131806G.U 6438100116019	SPCP131806T.U 6438100116378	SPCM131806G.U <sup>(4)</sup> 6438100115463	SPCM131806T.U <sup>(4)</sup> 6438100115685
125	175	75	60,5	25	50	SPCP131808LG.U 6438100116033	SPCP131808LT.U 6438100116385		
125	175	75	60,5	50	25	SPCP131808G.U 6438100116026	SPCP131808T.U 6438100116392	SPCM131808G.U <sup>(4)</sup> 6438100115470	SPCM131808T.U <sup>(4)</sup> 6438100115692
125	175	100	85,5	25	75	SPCP131810LG.U 6438100116057	SPCP131810LT.U 6438100116408		
125	175	100	85,5	50	50	SPCP131810G.U 6438100116040	SPCP131810T.U 6438100116415	SPCM131810G.U <sup>(4)</sup> 6438100115487	SPCM131810T.U <sup>(4)</sup> 6438100115708
125	175	125	110,5	25	100	SPCP131813LG.U 6438100116064	SPCP131813LT.U 6438100116422		
125	175	125	110,5	50	75	SPCP131813G.U 6438100116071	SPCP131813T.U 6438100116439	SPCM131813G.U <sup>(4)</sup> 6438100115494	SPCM131813T.U <sup>(4)</sup> 6438100115715
125	175	150	135,5	50	100	SPCP131815G.U 6438100116088	SPCP131815T.U 6438100116446	SPCM131815G.U <sup>(4)</sup> 6438100115500	SPCM131815T.U <sup>(4)</sup> 6438100115722
125	250	125	110,5	50	75	SPCP132513G.U 6438100116095	SPCP132513T.U 6438100116453	SPCM132513G.U <sup>(5)</sup> 6438100115517	SPCM132513T.U <sup>(5)</sup> 6438100115739
175	175	75	60,5	50	25	SPCP181808G.U 6438100116101	SPCP181808T.U 6438100116477	SPCM181808G.U <sup>(6)</sup> 6438100115524	SPCM181808T.U <sup>(6)</sup> 6438100115746
175	175	100	85,5	50	50	SPCP181810G.U 6438100116118	SPCP181810T.U 6438100116484	SPCM181810G.U <sup>(6)</sup> 6438100115531	SPCM181810T.U <sup>(6)</sup> 6438100115753
175	175	125	110,5	50	75	SPCP181813G.U 6438100116125	SPCP181813T.U 6438100116460	SPCM181813G.U <sup>(6)</sup> 6438100115548	SPCM181813T.U <sup>(6)</sup> 6438100115760
175	175	150	135,5	50	100	SPCP181815G.U 6438100116132	SPCP181815T.U 6438100116491	SPCM181815G.U <sup>(6)</sup> 6438100115555	SPCM181815T.U <sup>(6)</sup> 6438100115777
175	250	75	60,5	50	25	SPCP182508G.U 6438100116149	SPCP182508T.U 6438100116507	SPCM182508G.U <sup>(7)</sup> 6438100115562	SPCM182508T.U <sup>(7)</sup> 6438100115784
175	250	100	85,5	50	50	SPCP182510G.U 6438100116156	SPCP182510T.U 6438100116514	SPCM182510G.U <sup>(7)</sup> 6438100115579	SPCM182510T.U <sup>(7)</sup> 6438100115791
175	250	150	135,5	50	100	SPCP182515G.U 6438100116163	SPCP182515T.U 6438100116521	SPCM182515G.U <sup>(7)</sup> 6438100115586	SPCM182515T.U <sup>(7)</sup> 6438100115807

<sup>1)</sup> 2 x M16/25 + 6 x M12/20 knockouts

<sup>2)</sup> 2 x M16/25 + 4 x M12/20 knockouts

<sup>3)</sup> 4 x M16/25 + 6 x M12/20 knockouts

<sup>4)</sup> 4 x M16/25 + 8 x M12/20 knockouts

<sup>5)</sup> 4 x M20/25 knockouts

<sup>6)</sup> 4 x M12/20 + 4 x M16/25 + 10 x M12/20 knockouts

<sup>7)</sup> 4 x M12/20 + 4 x M16/25 + 12 x M12/20 knockouts



SPCP131304LG



SPCP131813G



SPCP131308T



SPCP182515T



### UL-listed Ensto Cubo D -enclosures

Width (mm)	Height (mm)	Depth (mm)	Base depth (mm)	Inner depth (mm)	UL-listed polycarbonate grey cover (Product code, GTIN-13)	UL-listed Polycarbonate transparent cover (Product code, GTIN-13)
53	55	36	26	27,5	DPCP050504G.U 6438100116538	DPCP050504T.U 6438100116705
53	63	36	26	25,0	DPCP050704G.U 6438100116545	DPCP050704T.U 6438100116712
80	82	56	41	42,0	DPCP080806G.U 6438100116552	DPCP080806T.U 6438100116729
80	82	86	71	72,0	DPCP080809G.U 6438100116569	DPCP080809T.U 6438100116736
80	120	56	41	42,0	DPCP081206G.U 6438100116576	DPCP081206T.U 6438100116743
80	120	86	71	72,0	DPCP081209G.U 6438100116583	DPCP081209T.U 6438100116750
80	160	56	41	42,0	DPCP081606G.U 6438100116590	DPCP081606T.U 6438100116767
80	160	86	71	72,0	DPCP081609G.U 6438100116606	DPCP081609T.U 6438100116774
120	122	56	41	42,0	DPCP121206G.U 6438100116613	DPCP121206T.U 6438100116781
120	122	86	71	72,0	DPCP121209G.U 6438100116620	DPCP121209T.U 6438100116798
120	160	91	61	77,5	DPCP121609G.U 6438100116637	DPCP121609T.U 6438100116804
120	200	86	71	72,0	DPCP122009G.U 6438100116644	DPCP122009T.U 6438100116811
150	200	76	61	62,0	DPCP152008G.U 6438100116651	DPCP152008T.U 6438100116828
160	240	91	76	77,5	DPCP162409G.U 6438100116668	DPCP162409T.U 6438100116835
160	240	121	76	107,5	DPCP162412G.U 6438100116675	DPCP162412T.U 6438100116842
230	300	86	56	72,5	DPCP233009G.U 6438100116682	DPCP233009T.U 6438100116859
230	300	111	56	97,5	DPCP233011G.U 6438100116699	DPCP233011T.U 6438100116866

### UL-listed Ensto Cubo O -enclosures, metric knockouts

Width (mm)	Height (mm)	Depth (mm)	Base depth (mm)	Inner depth (mm)	UL-listed polycarbonate grey cover (product code, GTIN-13)	UL-listed polycarbonate transparent cover (product code, GTIN-13)
300	300	132	115	115,0	OPCP202013G.U <sup>(1)</sup> 6438100116873	OPCP202013T.U <sup>(1)</sup> 6438100117016
300	300	187	115 + 55*	170,0	OPCP202018G.U <sup>(2)</sup> 6438100116941	OPCP202018T.U <sup>(2)</sup> 6438100117085
300	400	132	115	115,0	OPCP203013G.U <sup>(3)</sup> 6438100117880	OPCP203013T.U <sup>(3)</sup> 6438100117023
300	400	187	115 + 55*	170,0	OPCP203018G.U <sup>(4)</sup> 6438100116958	OPCP203018T.U <sup>(4)</sup> 6438100117092
300	600	132	115	115,0	OPCP204013G.U <sup>(3)</sup> 6438100116897	OPCP204013T.U <sup>(3)</sup> 6438100117030
300	600	187	115 + 55*	170,0	OPCP204018G.U <sup>(4)</sup> 6438100116965	OPCP204018T.U <sup>(4)</sup> 6438100117108

\*1) Includes the extension frame  
<sup>1)</sup> 12 x M20 + 1 x M16/25 + 8 x M20 + 4 x M25/40  
<sup>2)</sup> 8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40



### UL-listed Ensto Cubo O, C and W -enclosures

Width (mm)	Height (mm)	Depth (mm)	Base depth (mm)	Inner depth (mm)	UL-listed polycarbonate grey cover (product code, GTIN-13)	UL-listed polycarbonate transparent cover (product code, GTIN-13)	UL-listed polycarbonate grey cover flange knockouts (product code, GTIN-13)	UL-listed polycarbonate transparent cover flange knockouts (product code, GTIN-13)	UL-listed polycarbonate grey cover hinges and latches (product code, GTIN-13)	UL-listed polycarbonate transparent cover, hinges and latches (product code, GTIN-13)
200	200	132	102	115,0	OPCP202013G.U 6438100116873	OPCP202013T.U 6438100117016	CPCF202013G.U <sup>(1)</sup> 6438100117276	CPCF202013T.U <sup>(1)</sup> 6438100117412	WPCP202013G.U 6438100117559	WPCP202013T.U 6438100117696
200	200	187	102 + 55*	170,0	OPCP202018G.U 6438100116941	OPCP202018T.U 6438100117085	CPCF203013G.U <sup>(1)</sup> 6438100117283	CPCF203013T.U <sup>(1)</sup> 6438100117429	WPCP203013G.U 6438100117566	WPCP203013T.U 6438100117702
200	300	132	102	115,0	OPCP203013G.U 6438100117880	OPCP203013T.U 6438100117023	CPCF204013G.U <sup>(2)</sup> 6438100117290	CPCF204013T.U <sup>(2)</sup> 6438100117436	WPCP204013G.U 6438100117573	WPCP204013T.U 6438100117719
200	300	187	102 + 55*	170,0	OPCP203018G.U 6438100116958	OPCP203018T.U 6438100117092	CPCF303013G.U <sup>(2)</sup> 6438100117306	CPCF303013T.U <sup>(2)</sup> 6438100117443	WPCP303013G.U 6438100117580	WPCP303013T.U 6438100117726
200	400	132	102	115,0	OPCP204013G.U 6438100116897	OPCP204013T.U 6438100117030	CPCF304013G.U <sup>(2)</sup> 6438100117313	CPCF304013T.U <sup>(2)</sup> 6438100117450	WPCP304013G.U 6438100117597	WPCP304013T.U 6438100117733
200	400	187	102 + 55*	170,0	OPCP204018G.U 6438100116985	OPCP204018T.U 6438100117108	CPCF306013G.U <sup>(2)</sup> 6438100117320	CPCF306013T.U <sup>(2)</sup> 6438100117467	WPCP306013G.U 6438100117603	WPCP306013T.U 6438100117740
300	300	132	102	115,0	OPCP303013G.U 6438100116903	OPCP303013T.U 6438100117047	CPCF404013G.U <sup>(3)</sup> 6438100117993	CPCF404013T.U <sup>(3)</sup> 6438100118013	WPCP404013G.U 6438100118495	WPCP404013T.U 6438100118501
300	300	187	102 + 55*	170,0	OPCP303018G.U 6438100116972	OPCP303018T.U 6438100117115	CPCF406013G.U <sup>(3)</sup> 6438100117337	CPCF406013T.U <sup>(3)</sup> 6438100117474	WPCP406013G.U 6438100117610	WPCP406013T.U 6438100117757
300	400	132	102	115,0	OPCP304013G.U 6438100116910	OPCP304013T.U 6438100117054	CPCF202018G.U <sup>(3)</sup> 6438100117344	CPCF202018T.U <sup>(3)</sup> 6438100117481	WPCP202018G.U 6438100117627	WPCP202018T.U 6438100117764
300	400	187	102 + 55*	170,0	OPCP304018G.U 6438100116989	OPCP304018T.U 6438100117122	CPCF203018G.U <sup>(3)</sup> 6438100117351	CPCF203018T.U <sup>(3)</sup> 6438100117498	WPCP203018G.U 6438100117634	WPCP203018T.U 6438100117771
300	600	132	102	115,0	OPCP306013G.U 6438100116927	OPCP306013T.U 6438100117061	CPCF204018G.U <sup>(4)</sup> 6438100117368	CPCF204018T.U <sup>(4)</sup> 6438100117504	WPCP204018G.U 6438100117641	WPCP204018T.U 6438100117788
300	600	187	102 + 55*	170,0	OPCP306018G.U 6438100116996	OPCP306018T.U 6438100117139	CPCF303018G.U <sup>(4)</sup> 6438100117375	CPCF303018T.U <sup>(4)</sup> 6438100117511	WPCP303018G.U 6438100117658	WPCP303018T.U 6438100117795
400	400	132	102	115,0	OPCP404013G.U 6438100117986	OPCP404013T.U 6438100117962	CPCF304018G.U <sup>(3)</sup> 6438100117382	CPCF304018T.U <sup>(3)</sup> 6438100117528	WPCP304018G.U 6438100117665	WPCP304018T.U 6438100117801
400	400	187	102 + 55*	170,0	OPCP404018G.U 6438100117955	OPCP404018T.U 6438100117979	CPCF306018G.U <sup>(3)</sup> 6438100117399	CPCF306018T.U <sup>(3)</sup> 6438100117535	WPCP306018G.U 6438100117672	WPCP306018T.U 6438100117818
400	600	132	102	115,0	OPCP406013G.U 6438100116934	OPCP406013T.U 6438100117078	CPCF404018G.U <sup>(4)</sup> 6438100118006	CPCF404018T.U <sup>(4)</sup> 6438100118020	WPCP404018G.U 6438100118518	WPCP404018T.U 6438100118525
400	600	187	102 + 55*	170,0	OPCP406018G.U 6438100117009	OPCP406018T.U 6438100117146	CPCF406018G.U <sup>(4)</sup> 6438100117405	CPCF406018T.U <sup>(4)</sup> 6438100117542	WPCP406018G.U 6438100117689	WPCP406018T.U 6438100117825

\*1) Includes the extension frame  
<sup>1)</sup> 4 x F1 knockouts  
<sup>2)</sup> 2 x F1 knockouts + 2 x F2 knockouts  
<sup>3)</sup> 4 x F2 knockouts  
<sup>4)</sup> 6 x F2 knockouts

# Ensto Modulo distribution enclosures

## IP65

Sizes 166 x 231 x 113 to 418 x 586 x 148 mm



### Ensto Modulo enclosure in brief:

- Available in 9 sizes, capacity for 4 to 54 modules
- Factory installed DIN-rails, earth and neutral bars
- Factory made metric knockouts from M20 to M40
- Removable DIN-rail chassis for models with two or more rows
- Sealed screws at four points for easy installation

### Contents of the product package:

- Enclosure base
- Cover with hinged window
- Cover screws
- Pre-mounted DIN rails
- Pre-mounted N/PE busbars
- Cover plate
- Marker

### Further information

- Common enclosure accessories, pages 46-49
- Dimensional drawings, pages 113-114
- Product cards, dimensional drawings and 3D models can be found at [ensto.com](http://ensto.com).

Conformity	
ABS enclosures:	CE
Standards	
	EN 62208
Technical information	
Degree of protection:	IP65
Impact resistance: (-25 °C ... +40 °C)	IK08 (5 J)
Auto-extinguishing degree:	UL 94 HB
Insulation:	Class II
Glow wire test:	650 °C
Service temperature: (empty boxes)	-25 ... +70 °C
Maximum voltage: (empty boxes)	1000 V AC / 1500 V DC
Earth and Neutral bars:	500 V / 125A
Body	
Material:	ABS
UV resistance: (ISO 4892-2 meth. A)	500 hour
Color:	Grey, RAL 7035
Window	
Material:	Polycarbonate
UV resistance: (ISO4892-2 meth. A)	1000 hour
Color:	Transparent, smoke grey

For outdoor use an enclosure of polycarbonate is highly recommended, available on request.



Earth and Neutral bars at double height, section 12 x 6.5 mm are factory installed.



Window is hinged. This means that the opening direction can be changed quickly and safely.



Joining enclosures is easy. A channel for wiring is possible with a joining kit for mounting enclosures horizontally (MODB25M) or vertically (MODB40M).



DIN-rails can be installed into two height positions. Fixing requires only one screw.



## Ensto Modulo distribution enclosures, ABS

Product code	Description	Dimensions (mm)			Weight (kg)	Package size (pcs)	GTIN-13
		Width	Height	Depth			
MODAB41PN	Distribution enclosure 4 modules	166	231	113	0.722	1	6438100196226
MODAB61PN	Distribution enclosure 6 modules	202	231	113	0.762	1	6438100196233
MODAB81PN	Distribution enclosure 8 modules	238	231	118	0.929	1	6438100196240
MODAB121PN	Distribution enclosure 12 modules	310	246	148	1.415	1	6438100196257
MODAB181PN	Distribution enclosure 18 modules	418	286	148	1.879	1	6438100196264
MODAB242PN	Distribution enclosure 24 modules	310	436	148	2.357	1	6438100196271
MODAB362PN	Distribution enclosure 36 modules	418	436	148	2.918	1	6438100196288
MODAB363PN	Distribution enclosure 36 modules	310	586	148	3.098	1	6438100196295
MODAB543PN	Distribution enclosure 54 modules	418	586	148	3.949	1	6438100196301



MODAB41PN



MODAB121PN



MODAB242PN



MODAB543PN

## Accessories

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
MODHI2	Base frame inner hinge	0.005	10	6438100197094
MODKL2	Lock triangle 2 units with key	0.018	1	6438100197100
MODKL3	Security key lock	0.038	1	6438100197117
MODB25M	Bushing joining enclosures 25M	0.017	1	6438100197124
MODB40M	Bushing joining enclosures 40M	0.025	1	6438100197131
MODKL1	Standard lock	0.012	10	6438100197148
MODHI1	Hinge, spare part	0.002	12	6438100197155

## Spare parts

Product code	Description	Dimensions (mm)			Weight (kg)	Package size (pcs)	GTIN-13
		Width	Height	Depth			
MODD041	Transparent door 4 modules	170	150	30	0.092	1	6438100197759
MODD061	Transparent door 6 modules	200	150	30	0.115	1	6438100197766
MODD081	Transparent door 8 modules	240	150	30	0.129	1	6438100197773
MODD121	Transparent door 12 modules	310	170	30	0.202	1	6438100197780
MODD181	Transparent door 18 modules	420	170	30	0.249	1	6438100197797
MODD242	Transparent door 24 mod 2r	310	320	30	0.375	1	6438100197803
MODD362	Transparent door 36 mod 2r	420	320	30	0.526	1	6438100197810
MODD363	Transparent door 36 mod 3r	310	470	30	0.556	1	6438100197827
MODD543	Transparent door 54 mod 3r	420	470	30	0.742	1	6438100197834



MODHI2



MODKL3



MODB25M



MODKL1

# Ensto terminal junction boxes IP65

Sizes 125 x 125 x 75 to 300 x 600 x 132 mm



## Ensto Cubo T enclosure in brief:

- Include everything needed for connecting wires, extending or branching cables as well as enclosing
- Available with Ensto Clampo Compact terminal blocks and Ensto Clampo Pro Universal terminals
- Include either Ensto Cubo S or C thermoplastic enclosures
- The enclosure has exactly the right dimensions in terms of the terminals and the required bending space
- Save time choosing products (all of the required items can be ordered with one ordering number only)
- Need less storage space (no separate packages)

Conformity	
CE	
Standards	
Enclosure:	EN 62208
Ensto Clampo Compact terminal:	EN 60947-7-1
Ensto Clampo Pro terminals:	EN 61238-1 for aluminium conductors, EN 60947-7-1 for copper conductors
Material	
Enclosure:	Fiberglass reinforced polycarbonate
Housing (terminals):	Polyamide
Body and screws:	Tin-coated aluminium or nickel-coated brass
Mechanical features	
Screw head:	Hexagonal or slot
Standard color	
Base and cover:	Grey RAL 7035

Item	Ensto Cubo T1	Ensto Cubo T2	Ensto Cubo T3	Ensto Cubo T4	Ensto Cubo T5
Product code	TPM131308G001	TPCF203013G002	TPCF304013G003	TPCF304013G004	TPCF306013G005
GTIN-13	6418677182372	6418677182389	6418677182396	6418677182402	6418677182419
Cross-section	Cu 12 x 6 mm <sup>2</sup>	Al/Cu 5 x 6–35 mm <sup>2</sup>	Al/Cu 5 x 16–95 mm <sup>2</sup>	Al/Cu 2 x (5 x 16 – 70) mm <sup>2</sup>	Al/Cu 2 x (5 x 35 – 150) mm <sup>2</sup>
Package content:					
Ensto Cubo enclosure	SPCM131308G	CPCF203013G	CPCF304013G	CPCF304013G	CPCF306013G
Cover screws (pcs)	4	4	4	4	6
Cable glands incl. strain relief	2 x M16, 2 x M20, 1 x M25	-	-	-	-
Counter nuts	2 x M16, 2 x M20, 1 x M25	-	-	-	-
Cover plug	1 x M25	-	-	-	-
Membrane flanges	-	2 x F1201	2 x F2204	2 x F2204	2 x F2204
Flange bolt sets	-	2	2	2	2
Base supports	-	-	2	2	2
Fastening lugs, set	1	1	1	1	1
DIN rails/mounting plate	1 x DIN 15 rail, 13 cm	1 x DIN 35 rail, 16 cm	1 x DIN 35 rail, 26 cm	1 x DIN 35 rail, 26 cm	1 x mounting plate 30 x 40 cm
Mounting screws (pcs)	2	2	2	2	4
End holder	2	2	2	2	-
Terminals	1 x 12-pole, grey (KR8121)	1 x 3-pole, grey (KE61.03), 1 x blue (KE61.2), 1 x yellow-green (KE61.3)	3 x grey (KE62), 1 x blue (KE62.2), 1 x yellow-green (KE62.3)	3 x grey (KE67), 1 x blue (KE67.2), 1 x yellow-green (KE67.3)	3 x grey (KE68), 1 x blue (KE68.2), 1 x yellow-green (KE68.3)
Marking	1–12	L1, L2, L3	L1, L2, L3	L1, L2, L3	L1, L2, L3
Cross connectors	2 x 3-pole (KRL6067.03)	-	-	-	-



Ensto Cubo T1



Ensto Cubo T2



Ensto Cubo T3



Ensto Cubo T5



# Polyester enclosures

The enclosures are made of glass-reinforced polyester and are extremely durable. They can replace stainless steel enclosures in challenging conditions. The cost-effective polyester enclosing solution used is UV-resistant, has self-extinguishing properties and is halogen-free. The cabinets can be used in various environments and application areas such as maritime, metering and control, renewable energies as well as water and waste water treatment.

## **BENEFITS:**

- › Quick deliveries
- › Wide temperature range
- › Suitable for outdoor use

# Range comparison

## Ensto Cubo N wall cabinets, IP66

- › Sizes 250 x 300 x 140 to 600 x 800 x 300 mm
- › Available with plain sides or with a polycarbonate window
- › Quick fixture brackets at the back allow fitting without drilling
- › Built-in protective edge prevents entry of water when opening the door
- › Vertical patterns on the inner side of the door enables correct fitting of devices

## Ensto Cubo M enclosures, IP66

- › Sizes 75 x 80 x 55 to 400 x 405 x 120 mm
- › Available with plain sides
- › Captive cover screws of stainless steel
- › Stainless steel inserts for DIN rails
- › Possible to make threaded entries for cable glands



# Ensto Cubo N wall cabinets, IP66

Sizes 250 x 300 x 140 to 600 x 800 x 300 mm



## Ensto Cubo N wall cabinets in brief:

- Available with plain sides or with a polycarbonate window
- The product has been tested according to standards EN 62208:2011
- Superb temperature resistance
- Sturdy construction and high resistance to corrosion and solvents
- Suitable for highly demanding environments such as waste water treatment and the petrochemical/chemical industries
- Quick fixture brackets at the back allow fitting without drilling
- Built-in protective edge allows you to open the door 180° in installations and also prevents entry of water when opening the door
- Vertical patterns on the inner side of the door enables correct fitting of devices

## Contents of the product package:

- Enclosure base
- Door
- Lock and DIN 3 keys (one for each lock) (or 3-point closing with swing handle)

## Further information

- Common enclosure accessories, pages 46-49
- Dimensional drawings, pages 115-116
- Product cards, dimensional drawings and 3D models can be found at [ensto.com](http://ensto.com).

Conformity	
GRP enclosures:	CE RoHS UL cUL
Standards	
EN 62208, UL 508A	
Technical information	
Degree of protection:	IP66
Impact resistance:	IK10, IK08 +25 °C, window
Operating temperature:	-40 °C... 80 °C
Short term temperature range:	-50 °C... 140 °C
Glow wire test:	960 °C
Flammability rating:	UL 746C (5 inch flame)
UL File no:	E189312
UL category:	NITW, NITW7
Insulation:	Class II
Material	
Base/cover:	Fibreglass reinforced polyester
Lock:	Double bit DIN 3.0 mm
Gasket:	PUR (polyurethane)
Enclosure side types	
GRP enclosures:	Plain sides / customer-specific holes
Standard color	
Base/cover:	Grey RAL 7035

## Ensto Cubo N wall cabinets

Width (mm)	Height (mm)	Depth (mm)	Polyester plain sides (product code, GTIN-13)	Polyester 3-point closing with swing handle / DIN3, plain sides (product code, GTIN-13)	Polyester polycarbonate window plain sides (product code, GTIN-13)	UL-listed, polyester plain sides (product code, GTIN-13)	UL-listed, polyester polycarbonate window plain sides (product code, GTIN-13)
250	300	140	NGRP253014 6438100123451		NGRW253014 6438100123642	NGRP253014.U 6438100133528	NGRW253014.U 6438100133597
300	400	200	NGRP304020 6438100123468	NGRP304020P3SH 6438100123581	NGRW304020 6438100123659	NGRP304020.U 6438100133535	NGRW304020.U 6438100133603
400	400	200	NGRP404020 6438100123475	NGRP404020P3SH 6438100123598	NGRW404020 6438100123666	NGRP404020.U 6438100133542	NGRW404020.U 6438100133610
400	500	200	NGRP405020 6438100123482	NGRP405020P3SH 6438100123604	NGRW405020 6438100123673	NGRP405020.U 6438100133559	NGRW405020.U 6438100133627
400	600	230	NGRP406023 6438100123499	NGRP406023P3SH 6438100123611	NGRW406023 6438100123680	NGRP406023.U 6438100133566	NGRW406023.U 6438100133634
500	600	230	NGRP506023 6438100123505	NGRP506023P3SH 6438100123628	NGRW506023 6438100123697	NGRP506023.U 6438100133573	NGRW506023.U 6438100133641
600	800	300	NGRP608030 6438100123512	NGRP608030P3SH 6438100123635	NGRW608030 6438100123703	NGRP608030.U 6438100133580	NGRW608030.U 6438100133658
800	600	300	NGRP806030 6438100205010	NGRP806030P3SH 6438100206772			



NGRP506023



NGRP404020P3SH



NGRW304020



NGRP806030P3SH



## Mounting plates and DIN rails

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
<b>Mounting plates, GRP</b>				
NGRMP2530	For 250 x 300 mm enclosures	213 x 268 x 4	1	6438100123833
NGRMP3040	For 300 x 400 mm enclosures	260 x 358 x 4	1	6438100123840
NGRMP4040	For 400 x 400 mm enclosures	360 x 358 x 4	1	6438100123857
NGRMP4050	For 400 x 500 mm enclosures	360 x 458 x 4	1	6438100123864
NGRMP4060	For 400 x 600 mm enclosures	360 x 558 x 4	1	6438100123871
NGRMP5060	For 500 x 600 mm enclosures	460 x 558 x 4	1	6438100123888
NGRMP6080	For 600 x 800 mm enclosures	556 x 754 x 4	1	6438100123895
<b>Mounting plates, galvanized steel</b>				
NMP2530	For 250 x 300 mm enclosures	207 x 268 x 2	1	6438100123970
NMP3040	For 300 x 400 mm enclosures	254 x 358 x 2	1	6438100123987
NMP4040	For 400 x 400 mm enclosures	354 x 358 x 2	1	6438100123994
NMP4050	For 400 x 500 mm enclosures	354 x 458 x 2	1	6438100124007
NMP4060	For 400 x 600 mm enclosures	354 x 558 x 2	1	6438100124014
NMP5060	For 500 x 600 mm enclosures	454 x 558 x 2	1	6438100124021
NMP6080	For 600 x 800 mm enclosures	558 x 754 x 2	1	6438100124038
<b>DIN rails, DIN 46277/3, galvanized steel</b>				
DR35220.6	For 250 mm sides	230 x 35	1	6438100174071
DR35270.6	For 300 mm sides	280 x 35	1	6438100174088
DR35370.6	For 400 mm sides	380 x 35	1	6438100159733
DR35470.6	For 500 mm sides	480 x 35	1	6438100174095
DR35565.6	For 600 mm sides	575 x 35	1	6438100174101



NGRMP3040



NMP5060



Chassis for modular devices, NMC4060.54. The kit includes a metal frame with DIN rails and module cover plates.

## Front panels and accessories

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
<b>Mounting plates, GRP</b>				
NMC3040.24	For 300 x 400 mm wall cabinets, 2 DIN openings for 12 modules	-	1	6438100124366
NMC4040.36	For 400 x 400 mm wall cabinets, 2 DIN openings for 18 modules	-	1	6438100124373
NMC4050.54	For 400 x 500 mm wall cabinets, 3 DIN openings for 18 modules	-	1	6438100124380
NMC4060.54	For 400 x 600 mm wall cabinets, 3 DIN openings for 18 modules	-	1	6438100124397
NMC5060.69	For 500 x 600 mm wall cabinets, 3 DIN openings for 23 modules	-	1	6438100124403
NMC6080.116	For 600 x 800 mm wall cabinets, 4 DIN openings for 29 modules	-	1	6438100124410
<b>Internal door kit, GRP</b>				
NID3040	For 300 x 400 mm wall cabinets	258 x 366	1	6438100124304
NID4040	For 400 x 400 mm wall cabinets	358 x 366	1	6438100124311
NID4050	For 400 x 500 mm wall cabinets	358 x 466	1	6438100124328
NID4060	For 400 x 600 mm wall cabinets	358 x 566	1	6438100124335
NID5060	For 500 x 600 mm wall cabinets	458 x 566	1	6438100124342
NID6080	For 600 x 800 mm wall cabinets	558 x 766	1	6438100124359
<b>Wall mounting lugs</b>				
NFL1	Set of 4 pcs, plastic	-	1	6438100124670
NFL2	Set of 4 pcs, AISI 304	-	1	6438100169954
<b>Locks</b>				
NDIN1	DIN 3 lock with T-handle (standard lock)	-	1	6438100160296
NKL1	Key lock with a T-handle	-	1	6438100124816
NPD3041	Padlocking accessory, AISI 304	-	1	6438100124854



Internal door kit, NID4060.



Wall mounting lugs, NFL1.



Key lock with a T-handle, NKL1.



Padlocking accessory, NPD3041.

# Ensto Cubo M enclosures, IP66

Sizes 75 x 80 x 55 to 400 x 405 x 120 mm



## Ensto Cubo M enclosure in brief:

- Available with plain sides
- Available in 13 sizes
- Sturdy construction and high resistance to corrosion and solvents
- Suitable for highly demanding environments such as oil refineries and the petrochemical/chemical industries
- Due to the nature of polyester, ordering enclosures with ready-made cut-outs is recommended

## Contents of the product package:

- Enclosure base
- Cover
- Cover screws
- Mounting screws

## Further information

- Common enclosure accessories, pages 46-49
- Dimensional drawings, pages 117-119
- Product cards, dimensional drawings and 3D models can be found at [ensto.com](http://ensto.com).

## Technical information

Degree of protection:	IP66
Impact resistance:	7 Nm
Operating temperature:	-40 °C... 110 °C
Insulation:	Class II
<b>Material</b>	
Base/cover:	Glass reinforced polyester (GRP)
Cover screws:	Stainless steel
Gasket:	EPDM*
<b>Enclosure side types</b>	
GRP enclosures:	Plain sides
<b>Standard color</b>	
Base/cover:	Similar to grey RAL 7000

\*ethylene propylene diene M-class rubber

Width (mm)	Height (mm)	Depth (mm)	Inner depth (mm)	Polyester plain sides (product code, GTIN-13)	Mounting plates, galvanized steel	DIN rails galvanized steel	
						DIN-15	DIN-35
75	80	55	47.5	MGRP080806 6418677165610	MMP0808B 6418677157752	DR15.0808M 6418677158018	
75	110	55	47.5	MGRP081106 6418677165627	MMP0811B 6418677157769	DR15.0811 6418677158025	
75	160	55	47.5	MGRP081606 6418677165634	MMP0816B 6418677157776	DR15.0816 6418677158032	
75	190	55	47.5	MGRP081906 6418677165641	MMP0819B 6418677157783	DR15.0819 6418677158063	
120	122	90	81.0	MGRP121209 6418677165658	MMP1212B 6418677157790		DR35.1212 6418677157059
120	220	90	82.0	MGRP122209 6418677165672	MMP1222B 6418677157806		DR35.1220 6418677157066
160	160	91	81.5	MGRP161609 6418677165689	MMP1616B 6418677157813		DR35.1616 6418677157080
160	260	91	80.0	MGRP162609 6418677165702	MMP1626B 6418677157820		DR35.1626 6418677157097
160	360	91	81.5	MGRP163609 6418677165719	MMP1636B 6418677157837		DR35.1636 6418677158070
160	560	91	81.5	MGRP165609 6418677165726	MMP1656B 6418677157844		DR35.1656 6418677157103
250	255	120	109.0	MGRP252612 6418677165733	MMP2526B 6418677157851		DR35.2526 6418677158087
250	400	120	109.0	MGRP254012 6418677165757	MMP2540B 6418677157868		DR35.2540.41 6418677158094
400	405	120	109.0	MGRP404112 6418677165764	MMP4041B 6418677157875		DR35.2540.41 6418677158094



Ensto Cubo M enclosures have plain sides and captive cover screws of stainless steel.



## Other accessories

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
HMH12	Hinge pair	25 x 40 x 11.5	1	6418677165443

Machining polyester enclosures is difficult, for which reason ordering customized enclosures is recommended.

# Aluminium enclosures

The weight of aluminium is only about a quarter of that of steel. It has high impact-resistance, a wide temperature-resistance range and excellent corrosion-resistance.

## **BENEFITS:**

- › Quick deliveries
- › Wide size range
- › Light weight
- › Excellent water-resistance



# Ensto Cubo H enclosures, IP66

Sizes 50 x 45 x 30 to 310 x 601 x 180 mm



## Ensto Cubo H enclosure in brief:

- › Available with plain sides
- › Available in 29 sizes
- › Meets the requirements of the machine and military industry as regards to resistance to solvents, petrol and oil

## Contents of the product package:

- › Enclosure base
- › Cover
- › Cover screws
- › Mounting screws

## Further information

- › Common enclosure accessories, pages 46-49
- › Dimensional drawings, pages 120-124
- › Product cards, dimensional drawings and 3D models can be found at [ensto.com](http://ensto.com).

## Technical information

Degree of protection:	IP66
Impact resistance:	7 Nm
Operating temperature:	-40 °C... +110 °C
<b>Material</b>	
Base/cover:	Polyester-painted aluminium
Cover screws:	Stainless steel
Gasket:	PUR (polyurethane)
<b>Enclosure side types</b>	
Aluminium enclosures:	Plain sides
<b>Standard color</b>	
Base/cover:	Grey RAL 7001



Captive cover screws of stainless steel are included in the delivery of Ensto Cubo H enclosures. Mounting screws are integrated in the enclosure base.

## Ensto Cubo H enclosures

Width (mm)	Height (mm)	Depth (mm)	Inner depth (mm)	Polyester-painted aluminium plain sides (product code, GTIN-13)	Mounting plates, galvanized steel (product code, GTIN-13)	DIN rails, galvanized steel	
						DIN-15	DIN-35
50	45	30.0	24.5	HALP050503 6418677165450			
64	58	34.0	28.5	HALP060604 6418677165771			
64	98	35.0	29.0	HALP061004 6418677165788		DR15.0610 6418677156991	
64	150	35.0	27.5	HALP061504 6418677165795		DR15.0615 6418677157004	
80	75	57.5	51.5	HALP080806 6418677165801	HMP0808B 6418677157578	DR15.0808H 6418677157011	
80	125	58.0	52.5	HALP081306 6418677165818	HMP0813B 6418677157585	DR15.0813 6418677157028	
80	125	125.5	117.5	HALP081313 6438100088279	HMP0813B 6418677157585	DR15.0813 6418677157028	
80	175	58.0	52.0	HALP081806 6418677165825	HMP0818B 6418677157592	DR15.0818 6418677157035	
80	250	57.5	50.5	HALP082506 6418677165832		DR15.0825 6418677157042	
120	122	82.0	72.5	HALP121208 6438100090395	HMP1212B 6418677157608		DR35.1212 6418677157059
120	122	92.5	83.0	HALP121209 6418677165849	HMP1212B 6418677157608		DR35.1212 6418677157059
120	220	81.5	72.5	HALP122208 6438100088286	HMP1222B 6418677157615		DR35.1220 6418677157066
120	220	91.0	82.5	HALP122009 6418677165856	HMP1222B 6418677157615		DR35.1220 6418677157066
121	360	82.5	72.5	HALP123608 6418677165863	HMP1236B 6418677157622		DR35.12/1636 6418677157073
160	160	92.0	82.0	HALP161609 6418677165870	HMP1616B 6418677157639		DR35.1616 6418677157080
160	260	91.5	82.0	HALP162609 6418677165887	HMP1626B 6418677157646		DR35.1626 6418677157097
160	360	91.5	82.0	HALP163609 6418677165894	HMP1636B 6418677157653		DR35.12/1636 6418677157073
160	560	92.0	81.0	HALP165609 6418677165900	HMP1656B 6418677157660		DR35.1656 6418677157103
202	232	111.5	102.5	HALP202311 6418677165917	HMP2023B 6418677157677		DR35.2023 6418677157110
200	230	181.0	172.0	HALP202318 6418677165924	HMP2023B 6418677157677		DR35.2023 6418677157110
230	280	111.5	102.5	HALP232811 6418677165931	HMP2333B 6418677157691		DR35.2333 6418677157141
233	335	112.0	102.5	HALP233311 6418677165948	HMP2360B 6418677157714		DR35.23/3160 6418677157165
234	335	182.0	172.0	HALP233318 6418677165955	HMP2328B 6418677157684		DR35.2328 6418677157134
230	400,5	111.5	99.0	HALP234011 6418677165962	HMP2333B 6418677157691		DR35.2333 6418677157141
230	600	114.0	101.5	HALP236011 6418677165979	HMP2340B 6418677157707		DR35.23/3140 6418677157158
310	403	111.5	100.5	HALP314011 6418677165986	HMP3160B 6418677157738		DR35.23/3160 6418677157165
310	403	181.5	171.0	HALP314018 6418677165993	HMP3160B 6418677157738		DR35.23/3160 6418677157165
310	601	112.0	102.0	HALP316011 6418677166006	HMP3140B 6418677157721		DR35.23/3140 6418677157158
310	601	180.0	169.0	HALP316018 6418677166013	HMP3140B 6418677157721		DR35.23/3140 6418677157158

## Other accessories

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
HMH12	Hinge pair	25 x 40 x 11.5	1	6418677165443



HALP050503



HALP163609



HMH12



HMP0808B



DR15.0808H

# Common enclosure accessories

We offer a wide range of accessories, for instance flanges, pole mounting brackets, thermal management accessories, cable glands, rubber grommets, expansion and reduction nipples.

## **BENEFITS:**

- › Wide range of accessories
- › Sourcing of third-party accessories
- › Assembly services

## Flanges

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
<b>Cover plates for flange openings</b>				
F1151	F1 size excl. gasket, PC/ABS	137 x 48	1	6418677171833
F2251	F2 size Includes PUR gasket, PC	216 x 86	1	6418677171949
<b>Gland flanges</b>				
F1165	F1 size, excl. gasket, 3 x M20, PC/ABS	137 x 48	1	6418677152641
F1166	F1 size, excl. gasket, 3 x M25, PC/ABS	137 x 48	1	6418677152658
F1167	F1 size, excl. gasket, 1 x M32, PC/ABS	137 x 48	1	6418677152665
F2157	F2 size, Includes PUR gasket, 3 x Pg21 + 4 x Pg16, PC	216 x 86	1	6418677171956
F2158	F2 size, Includes PUR gasket, 2 x Pg29 + 6 x Pg16, PC	216 x 86	1	6418677171963
F2159	F2 size, Includes PUR gasket, 2 x Pg36 + 4 x Pg16, PC	216 x 86	1	6418677171970
F2160	F2 size, Includes PUR gasket, 8 x Pg16, PC	216 x 86	1	6418677171987
F2161	F2 size, Includes PUR gasket, 10 x Pg13.5, PC	216 x 86	1	6418677171994
F2168	F2 size, Includes PUR gasket, 4 x M20 + 1 x M25 + 2 x M32, PC	216 x 86	1	6418677152672
F2169	F2 size, Includes PUR gasket, 6 x M20 + 1 x M32 + 1 x M40, PC	216 x 86	1	6418677152689
F2170	F2 size, Includes PUR gasket, 4 x M20 + 2 x M40, PC	216 x 86	1	6418677152696
F2171	F2 size, incl. PUR gasket, 8 x M20, PC	216 x 86	1	6418677152702
F2172	F2 size, incl. PUR gasket, 10 x M16, PC	216 x 86	1	6418677152719
<b>Knockout flanges</b>				
F2252	F2 size, Includes PUR gasket, 7 x Pg11 + 7 x Pg9/16, PC	216 x 86	1	6418677172113
F2253	F2 size, Includes PUR gasket, 2 x Pg21/29/36 + 2 x Pg9/16 + 1 x Pg11, PC	216 x 86	1	6418677172397
F2254	F2 size, Includes PUR gasket, 5 x Pg16/21 + 2 x Pg11 + 1 x Pg9/16, PC	216 x 86	1	6418677172403
F2255	F2 size, Includes PUR gasket, 7 x M16 + 7 x M12/20, PC	216 x 86	1	6418677172595
F2256	F2 size, Includes PUR gasket, 2 x M20/32/50 + 2 x M12/20 + 2 x M16, PC	216 x 86	1	6418677172625
F2257	F2 size, Includes PUR gasket, 5 x M20/32 + 2 x M16 + 1 x M12/20, PC	216 x 86	1	6418677172700
<b>Membrane flanges</b>				
F1201	F1 size, for 5x $\varnothing$ 7-30 mm cables, EPDM	138 x 48	1	6418677171871
F2202	F2 size, for 25 x $\varnothing$ 5-26 mm cables, EPDM	216 x 84	1	6418677172007
F2203	F2 size, for 35 x $\varnothing$ 5-26 mm cables, EPDM	216 x 84	1	6418677172014
F2204	F2 size, for 3 x $\varnothing$ 24-60 mm cables, EPDM	216 x 84	1	6418677172021
F1155	F1 size, excl. gasket, 3 x $\varnothing$ 21 + 4 x $\varnothing$ 15 mm, TPE	135 x 47	1	6418677171888
F1156	F1 size, excl. gasket, 4 x $\varnothing$ 16 + 6 x $\varnothing$ 13 mm, TPE	135 x 47	1	6418677171895
F2162	F2 size, excl. gasket, 3 x $\varnothing$ 30 + 6 x $\varnothing$ 18 + 16 x $\varnothing$ 14 mm, TPE	226 x 87	1	6418677172038
F2163	F2 size, excl. gasket, 9 x $\varnothing$ 18 + 24 x $\varnothing$ 14 mm, TPE	226 x 87	1	6418677172045

EPDM = ethylene propylene diene M-class rubber  
TPE = thermoplastic elastomer



F2251



F2157



F2252



F2202

## Flange accessories

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
F2CE.1	Cable spreader for 1 cable	216 x 86 x 68	1	6418677181672
F2C50E	50 mm extension frame for F2 flange, polycarbonate	216 x 86 x 50	1	6418677173448
F1G	Self-adhesive flange gasket, F1 size	137 x 48	1	6418677171925
F2G	Self-adhesive flange gasket, F2 size	216 x 84	1	6418677172076
F1SS20	Flange bolt set, F1 size, steel bolt with plastic head	M6 x 20	1	6418677173066
F2SS20	Flange bolt set, F2 size, steel bolt with plastic head	M8 x 20	1	6418677171932
F2SS20L	Flange bolt set, F2 size, steel bolt with plastic head + steel connector	M8 x 20	1	6418677181689
F1PA25	Flange bolt set, F1 size, polyamide	M6 x 25	1	6418677173080
F2PA30	Flange bolt set, F2 size, polyamide	M8 x 30	1	6418677172083
PMR1857	Flange/base support for F2 size, polyamide	216 x 22	10	6418677172106
PMR1858	Isolating cup for support PMR1857, polyamide	$\varnothing$ 18 mm	20	6418677171796



Cable spreader for 1 cable, F2CE.1.

## Flange and gland sets

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
F2202KIT	Flange set, F2202, F2 size	84 x 215 x 40	1	6418677182556
F2CE.1T	Complete cable entry, F2 size	84 x 215 x 40	1	6418677181535
KTM1.1	Cable gland set: 2 x M12, 3 x M16, 2 x M20	135 x 210 x 25	1	6418677173233
KTM2.1	Cable gland set: 3 x M16, 2 x M20, 2 x M25	135 x 210 x 30	1	6418677173240
KTM3.1	Cable gland set: 4 x M20, 2 x M25, 1 x M32	135 x 210 x 55	1	6418677173257
F2GSS20T	Mounting kit for Cubo C bases, F2 size	200 x 250 x 15	1	6418677181504
OLSH1.2	Hinged and slotted cover screw, pair (blue)	130 x 170 x 15	1	6418677181511




## Pole mounting brackets for Cubo O, C, W and N enclosures

Pole mounting brackets were designed to securely fasten your enclosure to a pole. The pole mounting brackets are a set of two rails or a plate with a pole clamp and needed screws.

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
<b>Sets of two rails</b>				
PMB20	For 200 mm wide enclosure	28 x 35 x 195	1	6438100131739
PMB25	For 250 mm wide enclosure	28 x 35 x 245	1	6438100135430
PMB30	For 300 mm wide enclosure	28 x 35 x 295	1	6438100131753
PMB40	For 400 mm wide enclosure	28 x 35 x 395	1	6438100131760
PMB50	For 500 mm wide enclosure	28 x 35 x 495	1	6438100131777
PMB60	For 600 mm wide enclosure	28 x 35 x 595	1	6438100131784
<b>Sets with a plate</b>				
PMB2020	For 200 mm wide enclosure	41 x 200 x 205	1	6438100131746



## Condensation and pressure relief

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
<b>Ventilation and drain valve</b>				
BVD22	Ventilation device, IP55 type 4x, polycarbonate siloxane, 	50 x 50 x 20	1	6438100161590
DWP1	Drain water plug, IP44, rubber	Ø33	1	6418677172731
<b>Breathers</b>				
BPA10H	Breather, IP68, polyamide, grey, 120 l/h	Ø19 x 17	1	6418677184314
BPA10HB	Breather, IP68, polyamide, black, 120 l/h	Ø19 x 17	1	6418677184321



Ventilation device, IP55, BVD22.

## Distance bushings

Product code	Description	Dimensions	Package size (pcs)	GTIN-13
PSK36.050	External Ø 10 mm, aluminium	Length 5.0 mm	100	6418677166907
PSK36.085	External Ø 10 mm, aluminium	Length 8.5 mm	100	6418677166914
PSK36.100	External Ø 10 mm, aluminium	Length 10.0 mm	100	6418677166921
PSK36.120	External Ø 10 mm, aluminium	Length 12.0 mm	100	6418677166938
PSK36.150	External Ø 10 mm, aluminium	Length 15.0 mm	100	6418677166945
PSK36.200	External Ø 10 mm, aluminium	Length 20.0 mm	100	6418677166952
PSK36.250	External Ø 10 mm, aluminium	Length 25.0 mm	100	6418677166969
PSK36.300	External Ø 10 mm, aluminium	Length 30.0 mm	50	6418677166976
PSK36.350	External Ø 10 mm, aluminium	Length 35.0 mm	50	6418677166983
PSK36.400	External Ø 10 mm, aluminium	Length 40.0 mm	50	6418677166990
PSK36.450	External Ø 10 mm, aluminium	Length 45.0 mm	50	6418677167003
PSK36.500	External Ø 10 mm, aluminium	Length 50.0 mm	50	6418677167010



PSK36.150

## Cable glands, metric thread

Dimensions	Cable gland, grey polyamide with strain relief, IP68 (product code, GTIN-13)	Cable gland, grey polyamide with strain relief, IP68, long thread (product code, GTIN-13)	Counter nut grey polyamide (product code, GTIN-13)	Cover plug grey polyamide (product code, GTIN-13)
M12	KTM24.12 6416031851124 Cable Ø 3-6.5 mm, thread length 8 mm		PMR1218.12 6416031859120	PMR1217.12 6416031853128
M16	KTM24.16 6416031851162 Cable Ø 5-10 mm, thread length 10 mm	KTM24.16L 6418677171062 Cable Ø 5-10 mm, thread length 15 mm	PMR1218.16 6416031859168	PMR1217.16 6416031853166
M20	KTM24.20 6416031851209 Cable Ø 10-14 mm, thread length 10 mm	KTM24.20L 6418677171079 Cable Ø 10-14 mm, thread length 15 mm	PMR1218.20 6416031859205	PMR1217.20 6416031853203
M25	KTM24.25 6416031851254 Cable Ø 13-18 mm, thread length 10 mm	KTM24.25L 6418677171086 Cable Ø 13-18 mm, thread length 15 mm	PMR1218.25 6416031859250	PMR1217.25 6416031853258
M32	KTM24.32 6416031851322 Cable Ø 18-25 mm, thread length 18 mm		PMR1218.32 6416031859328	PMR1217.32 6416031853326
M40	KTM24.40 6416031851407 Cable Ø 22-32 mm, thread length 18 mm		PMR1218.40 6416031859403	PMR1217.40 6416031853401
M50	KTM24.50 6416031851506 Cable Ø 30-38 mm, thread length 18 mm		PMR1218.50 6416031859502	PMR1217.50 6416031853500
M63	KTM24.63 6418677171031 Cable Ø 34-44 mm, thread length 18 mm		PMR1218.63 6418677171048	PMR1217.63 6418677171055



KTM24.12



KTM24.07



## Rubber grommets, metric thread

Dimensions	Membrane gasket (product code, GTIN-13)	Membrane gasket, V-0 (product code, GTIN-13)
M12	RGM12 6438100143442 Cable Ø 4-7 mm	RGM12.V0 6438100143305 Cable Ø 3-5 mm
M16	RGM16 6438100143459 Cable Ø 5-9 mm	RGM16.V0 6438100143312 Cable Ø 5-7 mm
M20	RGM20 6438100143466 Cable Ø 8-13 mm	RGM20.V0 6438100143329 Cable Ø 7-10 mm
M25	RGM25 6438100143473 Cable Ø 11-17 mm	RGM25.V0 6438100143336 Cable Ø 10-14 mm
M32	RGM32 6438100143480 Cable Ø 15-20 mm	RGM32.V0 6438100143343 Cable Ø 14-20 mm
M40	RGM40 6438100143497 Cable Ø 19-28 mm	RGM40.V0 6438100143350 Cable Ø 20-26 mm
M50	RGM50 6438100143503 Cable Ø 27-35 mm	RGM50.V0 6438100143367 Cable Ø 26-35 mm



RGM25

## Inspection windows, polycarbonate

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
<b>Hinged windows</b>				
VMA2	For 2 modules	67 x 59	1	6418677151170
VMA4	For 4 modules	67 x 94	1	6418677151187
VMA6	For 6 modules	67 x 130	1	6418677151194
VMA8	For 8 modules	67 x 163	1	6418677151200
VMA10	For 10 modules	67 x 200	1	6418677151217
VMA12	For 12 modules	67 x 233	1	6418677151224
<b>Window</b>				
VMA1519	Opening: 113 x 153 mm, includes screws	150 x 190 x 10	1	6418677174193



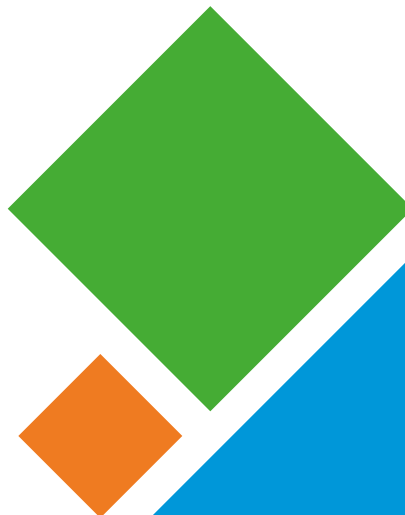
VMA2



VMA1519

## Other accessories

Product code	Description	Dimensions (mm)	Package size (pcs)	GTIN-13
PMR70.1612	Wiring plug, cable lead-through 16 mm, 12 ea./set	Ø 20/16	5	6418677163784
PMR1387	Plug for cover panel, Ø 6 mm hole	20 x 31 x 6	100	6418677166730
PME1	Cover plate, width 45 mm, length 2 m (PVC)	45 x 2000 x 7	1	6418677166747
KY2.15	Plastic latch, 15 mm closing space	Ø 23 x 26	100	6418677166754
ST80/U	Delta key, △ 11 mm	34 x 52 x 16	10	6418677170430
KY1.20	Fixing screw for kWh meter	M5 x 22	100	6418677166792
PTK14	Sealing screw, M4 x 10/16mm	L = 16	100	6418677166808
PTK13	Sealing screw, M4 x 16/22mm	L = 22	100	6418677166815
PTK11	Sealing screw, M4 x 20/25mm	L = 25	100	6418677166822
PLE152	Sealing screw, F4,2 x 16/21 mm	L = 21	100	6418677166839



Because life matters



# 2

## Ensto Vulcano junction boxes

E30

E60

E90

Technical equipment with function maintenance is critical at all locations where large numbers of people tend to gather such as airports, hospitals, government agencies and industrial plants.

The Ensto Vulcano high-quality fire protection junction boxes are designed to be used in cable systems with system circuit integrity.

### **BENEFITS:**

- › Save time - ease of installation
- › High temperature-resistant ceramic terminals
- › Tapping blocks available
- › Compact size, takes less space at the installation site

# Function maintenance required from 30 to 90 minutes in the case of fire

The requirement for electrical installations with function maintenance is part of the construction regulations. Regulations require a power supply to be assured for a specific period of time, even if there is a fire.

Emergency lighting, smoke extractors, and alarms must remain operational for at least 30, 60 or 90 minutes, according to requirements, so people can leave the building and rescue forces can work.

Junction boxes must be verified with EN 60670 conformity. This includes environmental requirements, such as moisture, protection from dust and environmental temperature, corrosion and mechanical stress, as well as electrical testing conditions. In order to meet fire protection requirements, electrical installation systems must operate for 30, 60 or 90 minutes and withstand temperatures of up to 1000 °C, according to DIN 4102-12.



## Function maintenance for a safe evacuation and rescue

# 30 minutes

For buildings to be cleared quickly, function maintenance must be guaranteed e.g. for the following equipment:

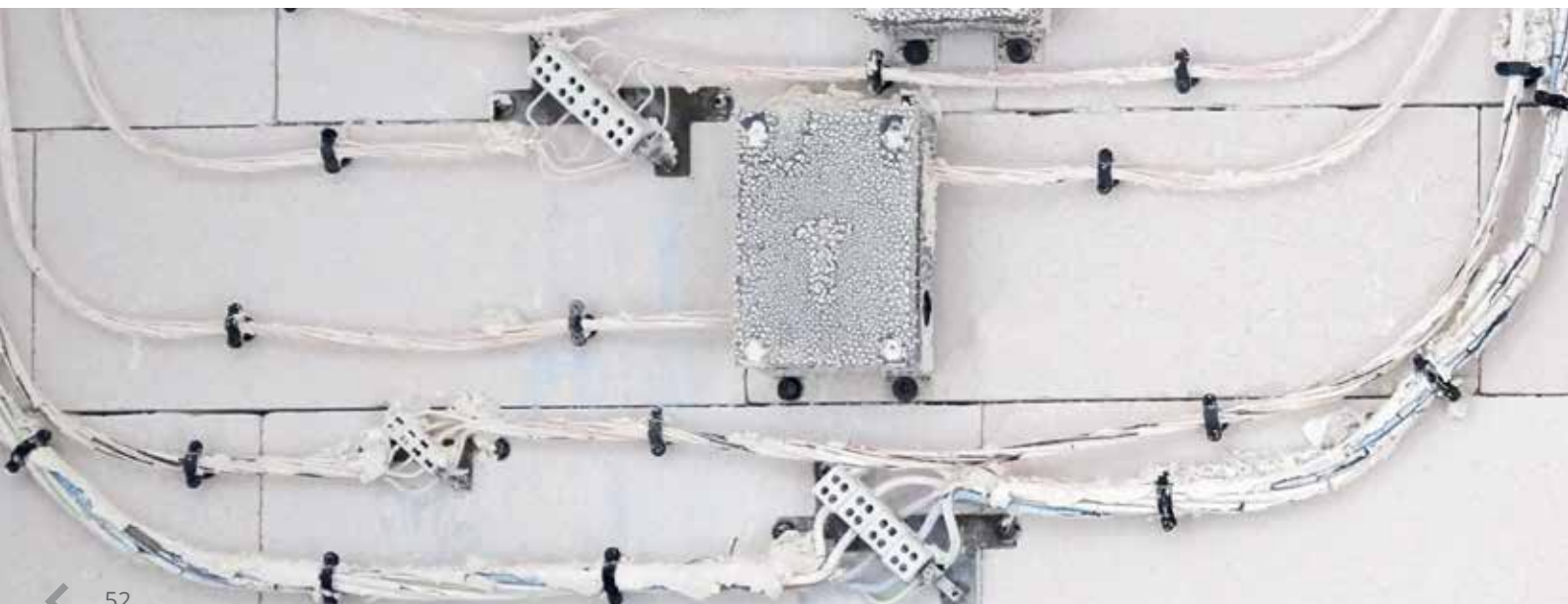
- Safety lighting systems
- Lifts with fire control
- Fire alarm systems
- Alarm systems and systems to issue instructions
- Fire extraction systems

## Function maintenance for effective fire-fighting

# 90 minutes

To support fire-fighting operations, it is important that technical equipment is supplied with sufficient power, even up to 90 minutes after a fire breaks out. This equipment includes:

- Water pressure increase systems for the fire water supply
- Mechanical smoke extraction systems and smoke protection pressure systems
- Fire brigade lifts



# Benefits of using our solution

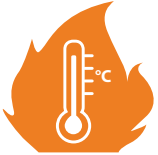
We offer high-quality fire protection junction boxes made from plastics and metals. Our solutions are developed for demanding industrial use requiring durability. The product range comprises

junction boxes made of plastic and metal, especially manufactured for fire resistant cable systems. We also produce our own high temperature-resistant ceramic terminals.



## Save time - ease of installation

- Everything factory-mounted
- Terminal rail, easy to mount/dismount
- Quick-release cover screws



## High temperature-resistant ceramic terminals

- The conductive terminal body is made of a special alloy with a very high melting point
- Ensto terminals



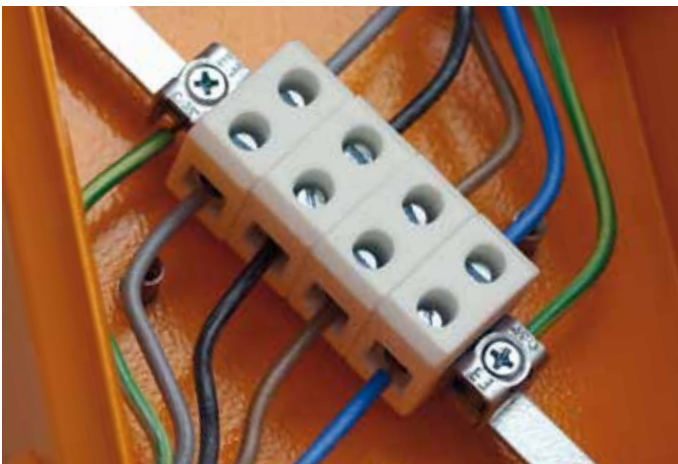
## Tapping blocks

- Ceramic 1-pole tapping terminals
- Large tapping capacity - 4 conductor spaces
- Easy to expand later on - tapping places may be left as a reserve for later use

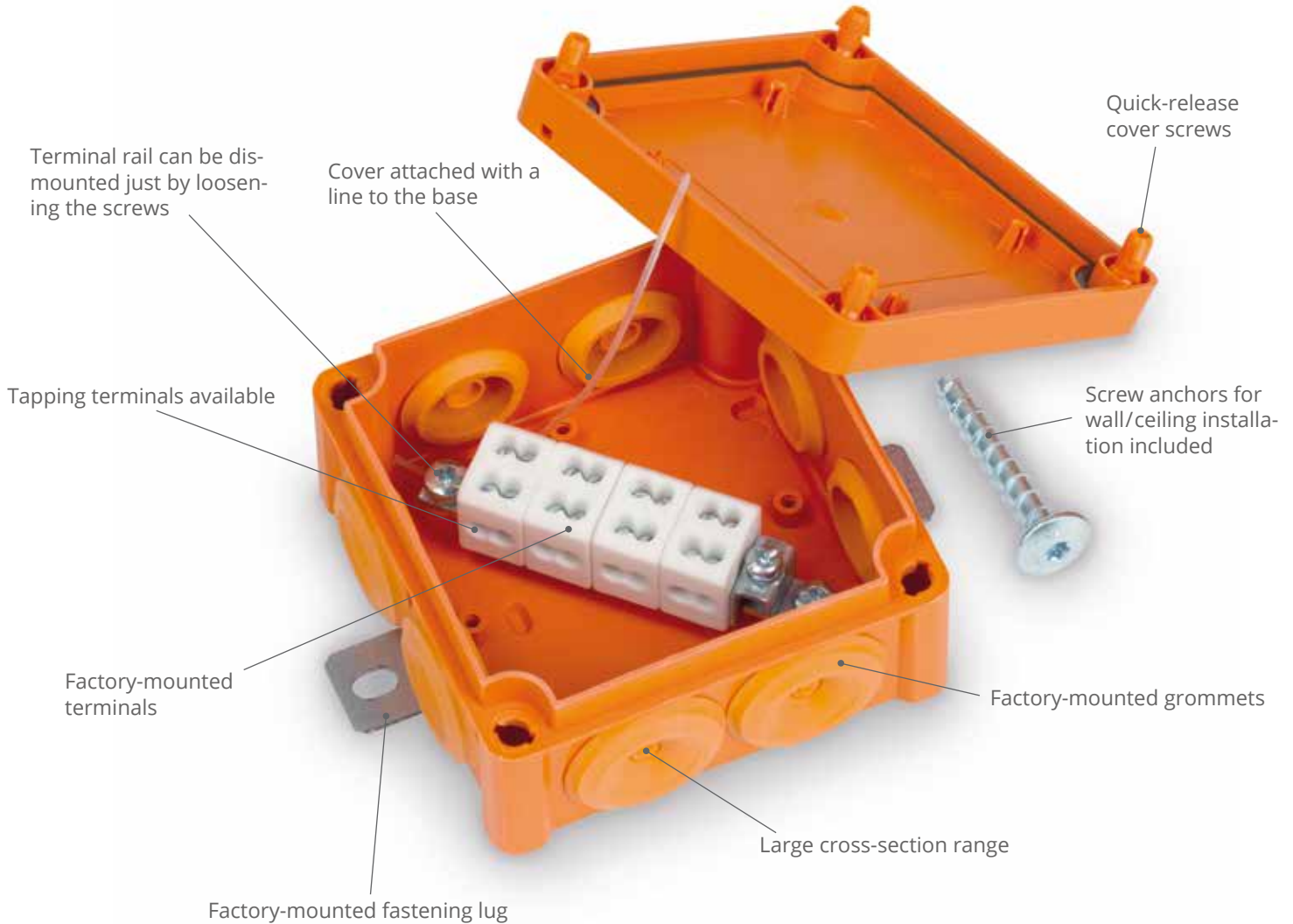


## Compact size

- Takes less space at the installation site
- Stylish solution for a wide range of applications



# We have thought of every small detail – for efficient installations



# Ensto Vulcano plastic junction boxes

The Ensto Vulcano plastic fire protection junction boxes are manufactured from halogen-free thermoplastic with ceramic terminals. Junction boxes are tested to E30, E60, E90, according to DIN 4102-12. The degree of protection is IP65.





## Plastic junction boxes in brief

- › Halogen-free elastic thermoplastic
- › Compact sizes
- › Available in two sizes
- › Factory-mounted cable entries and fastening lugs
- › Screw anchors for wall/ceiling installation included
- › Terminal rail easy to mount/dismount
- › Quick-release cover screws
- › Cover and cover screws equipped with sealing holes
- › Cover attached with a line to the base to prevent losing the cover
- › Available with single terminal blocks or tapping terminals

## Contents of product package

- › Enclosure base
- › Cover
- › Cover screws
- › Cover line
- › Fastening plate
- › Screw anchors for wall/ceiling mounting
- › Terminal rail
- › Terminal rail mounting screws
- › Ceramic terminals
- › PE terminal(s)
- › Rubber grommets

Conformity	
CE  	
Standards	
Boxes for household and similar fixed electrical installations	EN 60670-1:2005 EN 60670-22:2006
Terminal blocks for copper conductors	EN 60947-7-1:2009
Connecting devices for household	EN 60998-2-1:2004
Fire resistance of electric cable systems	DIN 4102-12
Technical information	
Degree of protection	IP65
Cross-section range	Cu 1.5 - 16 mm <sup>2</sup>
Nominal current range	41 - 76 A
Nominal insulation voltage	750 V
Ambient temperature (min.)	-25 °C
Ambient temperature (max.)	+40 °C
Ambient temperature (24 h)	+35 °C
Fire resistance class	E30 - E90
Material	
Enclosure	Polypropylene
Screws	Polycarbonate
Gasket	PUR (polyurethane)
Mechanical features	
Cable entries	Rubber grommets and knock-outs
Colour	RAL 2003 orange

Product code	Enclosure size	Cross-section (mm <sup>2</sup> )	Number of terminals	Number of termination points/terminal	Earthing terminal cross section (mm <sup>2</sup> )	Rubber grommets	Knock-outs	Package size (pcs)	Weight (kg)	GTIN-13
FPT1010PP46	100 x 100 x 50	1.5 - 6	4	2	16	8 x M25	2 x M25	8	0.290	6438100180782
FPT1010PP46.4	100 x 100 x 50	1.5 - 6	4	4	16	8 x M25	2 x M25	8	0.307	6438100180799
FPT1815PP416	175 x 150 x 80	2.5 - 16	4	2	35	2 x M32 + 2 x M40	2 x M25 + 6 x M32	6	0.745	6438100180805
FPT1815PP416.4	175 x 150 x 80	2.5 - 16	4	4	35	2 x M32 + 2 x M40	2 x M25 + 6 x M32	6	0.900	6438100180812



FPT1010PP46



FPT1010PP46.4



FPT1815PP416



FPT1815PP416.4



# Ensto Vulcano steel junction boxes

Ensto Vulcano steel fire protection junction boxes are manufactured from polyester painted mild steel. They meet the degree of protection of IP65 and impact resistance of IK09. The boxes are equipped with ceramic terminals.





## Steel junction boxes in brief

- › Available in three sizes
- › Factory-mounted cable entries and fastening lugs
- › Screw anchors for wall/ceiling installation included
- › Terminal rail easy to mount/dismount
- › Available with single terminal blocks or tapping terminals

## Contents of product package

- › Enclosure base
- › Cover
- › Cover screws with gaskets and cage nuts
- › Screw anchors for wall/ceiling mounting
- › Terminal rail
- › Terminal rail mounting screws
- › Ceramic terminals
- › PE terminal(s)
- › Rubber grommets
- › Accessories for earthing the cover

Conformity	
CE  	
Standards	
Boxes for household and similar fixed electrical installations	EN 60670-1:2005 EN 60670-22:2006
Terminal blocks for copper conductors	EN 60947-7-1:2009
Connecting devices for household	EN 60998-2-1:2004
Fire resistance of electric cable systems	DIN 4102-12
Technical information	
Degree of protection	IP65
Impact resistance	IK09
Cross-section range	Cu 1.5 – 16 mm <sup>2</sup>
Nominal current range	41 – 76 A
Nominal insulation voltage	750 V
Ambient temperature (min.)	-25 °C
Ambient temperature (max.)	+40 °C
Ambient temperature (24 h)	+35 °C
Fire protection	E30 – E90
Material	
Enclosure	Polyester painted mild steel
Screws	Steel
Gasket	PUR (polyurethane)
Mechanical features	
Cable entries	Rubber grommets and knockouts
Colour	RAL 2003E orange

Product code	Enclosure size	Cross-section (mm <sup>2</sup> )	Number of terminals	Number of termination points / terminal	Earthing terminal cross-section (mm <sup>2</sup> )	Rubber grommets	Knock-outs	Package size (pcs)	Weight (kg)	GTIN-13
FPT1515FE46	150 x 150 x 80	1.5 - 6	4	2	16	4 x M25	4 x M25	1	1.430	6438100180829
FPT1515FE46.4	150 x 150 x 80	1.5 - 6	4	4	16	4 x M25	4 x M25	1	1.455	6438100180836
FPT2215FE416	220 x 150 x 80	2.5 - 16	4	2	35	4 x M32	2 x M32 + 4 x M25	1	1.965	6438100180843
FPT2215FE416.4	220 x 150 x 80	2.5 - 16	4	4	35	4 x M32	2 x M32 + 4 x M25	1	2.115	6438100180850
FPT2222FE416	220 x 220 x 100	2.5 - 16	4	2	35	2 x M32 + 2 x M40	4 x M25 + 2 x M32 + 2 x M40	1	2.600	6438100180867
FPT2222FE416.4	220 x 220 x 100	2.5 - 16	4	4	35	2 x M32 + 2 x M40	4 x M25 + 2 x M32 + 2 x M40	1	2.750	6438100180874



FPT1515FE46



FPT1515FE46.4



FPT2215FE416



FPT2222FE416.4



## Accessories

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
<b>Fuse element</b>				
FPT-FH.2A	Fuse element for fire protection junction boxes, 2A	0.0331	50	6438100363734
<b>Rubber grommets</b>				
RMM25.O	M25, cable diameter 8-17 mm, TPE, IP67	0.005	50	6438100191580
RMM32.O	M32, cable diameter 12-24 mm, TPE, IP67	0.007	25	6438100191597
RMM40.O	M40, cable diameter 19-30 mm, TPE, IP67	0.012	25	6438100191603



RMM32.O



The fuse element is mounted outside the junction box to a M25 opening. This way the wiring space inside the box is maximized.



The fuse element includes a fuse holder, 2A ceramic fuse, M25 cable gland with a counter nut and 2 pcs of fire protected conductors. The conductors are 200 mm long with 1,5 mm<sup>2</sup> cross-section.





# 3

## Industrial components Critical to the safety of your operations

We support your operations with high-quality terminals, load-break switches and fuse bases that are designed and tested to meet a wide range of applications in various environments.

You can rely on our components as they are certified against demanding industry standards to ensure high performance and quality of your operations. We have sound experience of terminal solutions targeted at the OEM industries and panel builders.

# Terminals

Our Ensto Clampo terminals are specially developed for the needs of the industry. Our offering includes a large range of terminal series, some of which are suitable for both aluminium and copper conductors.

## **BENEFITS:**

- › Connecting aluminium and copper conductors
- › Wide application range
- › Wide cross-section range

# Ensto Clampo Pro

Small item – great significance



It is of paramount importance that the equipment functions properly. It is vital to have a suitable connection between the devices and the power grid. Most of the connections are made using cables and wires, terminals, or conductor rails at higher currents. The reliability and safety of the device depend on the type and use of the terminals. It is therefore extremely important to use reliable terminals of the highest quality.





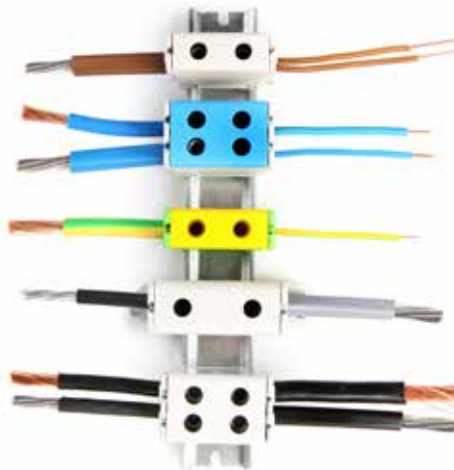
**For all installation needs**

The Ensto Clampo Pro universal terminal series is a versatile solution for all installation needs, ranging from low-voltage switchgear and control gears for industry and construction to building automation.



**Safe connections**

The connectors can be used with both aluminum and copper conductors, it makes life easier for designers in both the OEM industry and mechanical engineering.



**Wide cross-section range**

Ensto Clampo Pro universal terminals are suitable for a wide cross-section range of conductors.



**Branching possibilities**

Several copper conductors of the same size can be installed in the same conductor space.



**Sturdy and strong**

High-quality materials have been used and the terminals are sturdy and strong, so they do not break or twist.

# Ensto Clampo Pro universal terminals

For Al/Cu conductors from 2.5 mm<sup>2</sup> to 240 mm<sup>2</sup>



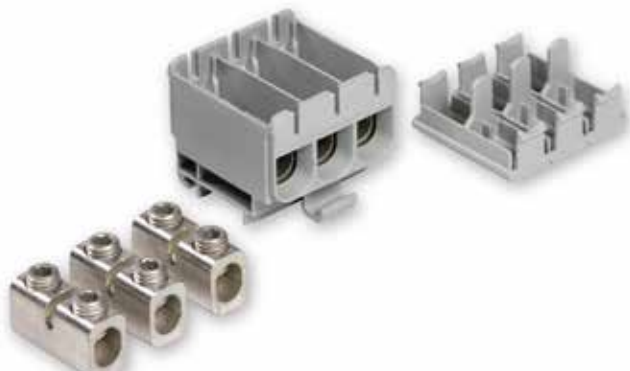
## Ensto Clampo Pro universal terminals in brief:

- Certified according to the latest standards
- UL- recognized and EAC certified (switchboards/equipment suitable for exporting to the US and Russia)
- Suitable for both aluminium and copper conductors
- Suitable for transitioning between aluminium and copper conductors without any extra cable clamps
- Suitable for use for the feed-in conductors (short circuit tested)
- Suitable for a wide cross-section range of conductors (a single terminal can be used in a wide range of applications)
- Also suitable for stranded wires also, without extra bushings

## Technical features:

- Compact in size compared to similar products on the market
- Oxidation-inhibiting compound applied at the factory
- Simple and reliable construction made of a monoblock
- Can be fixed directly onto a DIN rail or, with screws, onto a base
- Quickly and easily connected using one screw only
- Reliable and strong tightening of connection with hexagonal screws (possible to reuse without damage)
- Color coding for N and PE terminals

Conformity	
Standards	
For copper conductors:	EN 60947-7-1 EN 60947-7-2
For aluminium conductors:	EN 61238-1
UL- recognition:	UL 1059
Connector class:	A
Technical information	
Cross-section range:	Al 6 – 240 mm <sup>2</sup> , Cu 2.5 – 240 mm <sup>2</sup>
Nominal current range:	145 – 425 A
Operating temperature:	Max. 80 °C
Pollution degree:	3
Material	
Housing:	Polyamide
Body and screws:	Tin-coated aluminium
Mechanical features	
Screw head:	Hexagonal
Mounting:	Screws or DIN rail



KE61.03 is a three-pole terminal block with three individual circuits.



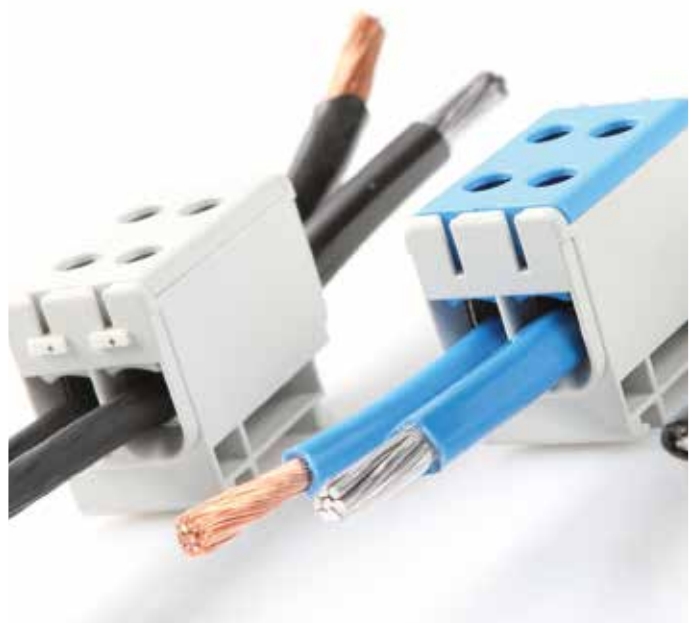
Tapping terminals consist of a single pole with four connection points (single circuit).

**Note:** The use of ferrules is recommended for installations with flexible conductors\* with the following cross-sections (single conductor installation):

- KE61, KE 66      2.5 – 16 mm<sup>2</sup>
- KE62, KE67      16 – 35 mm<sup>2</sup>
- KE63, KE68      35 – 70 mm<sup>2</sup>
- KE64, KE69      35 – 120 mm<sup>2</sup>

The use of 240 mm<sup>2</sup> flexible conductors is not recommended.

\*Class 5, according to IEC 228 Second Edition 1978



Ensto Clampo Pro allows a safe connection between Al/Cu conductors.



Product code	Conductor cross-section	Color	Nominal current	Nominal insulation voltage	Screw head hexagon	Bit length min.	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
<b>Ensto Clampo Pro, one-pole terminal blocks</b>												
KE61	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Grey	Cu 160 A, Al 145 A	800 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail	17.8 x 49 x 43	0.030	30	6418677191817
KE61.2	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Blue	Cu 160 A, Al 145 A	800 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail	17.8 x 49 x 43	0.030	30	6418677191831
KE61.3	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Yellow/ Green		800 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail	17.8 x 49 x 43	0.030	30	6418677191848
KE62	Al/Cu 16-95 mm <sup>2</sup>	Grey	Cu 245 A, Al 220 A	800 V	5 mm	25	20 Nm	DIN rail/ screw	24 x 86 x 49	0.074	30	6418677191855
KE62.2	Al/Cu 16-95 mm <sup>2</sup>	Blue	Cu 245 A, Al 220 A	800 V	5 mm	25	20 Nm	DIN rail/ screw	24 x 86 x 49	0.074	30	6418677191862
KE62.3	Al/Cu 16-95 mm <sup>2</sup>	Yellow/ Green		800 V	5 mm	25	20 Nm	DIN rail/ screw	24 x 86 x 49	0.074	30	6418677191879
KE63	Al/Cu 35-150 mm <sup>2</sup>	Grey	Cu 320 A, Al 290 A	800 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	29.5 x 95 x 59	0.120	30	6418677191886
KE63.2	Al/Cu 35-150 mm <sup>2</sup>	Blue	Cu 320 A, Al 290 A	800 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	29.5 x 95 x 59	0.120	30	6418677191893
KE63.3	Al/Cu 35-150 mm <sup>2</sup>	Yellow/ Green		800 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	29.5 x 95 x 59	0.120	30	6418677191909
KE64	Al/Cu 35-240 mm <sup>2</sup>	Grey	Cu 425 A, Al 380 A	800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	Screw	37.5 x 130 x 67	0.249	30	6418677191916
KE64.2	Al/Cu 35-240 mm <sup>2</sup>	Blue	Cu 425 A, Al 380 A	800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	Screw	37.5 x 130 x 67	0.249	30	6418677191923
KE64.3	Al/Cu 35-240 mm <sup>2</sup>	Yellow/ Green		800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	Screw	37.5 x 130 x 67	0.249	30	6418677191930
<b>Ensto Clampo Pro, three-pole terminal block</b>												
KE61.03	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Grey	Cu 160 A, Al 145 A	800 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail	49.5 x 49 x 43	0.077	30	6418677191824
KE62.03	Al/Cu 16-95 mm <sup>2</sup>	Grey	Cu 245 A, Al 220 A	800 V	5 mm	25	20 Nm	DIN rail/ screw	69 x 86 x 49	0.222	30	6438100347451
KE63.03	Al/Cu 35-150 mm <sup>2</sup>	Grey	Cu 320 A, Al 290 A	800 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	85 x 96 x 59	0.3	30	6438100347468
<b>Ensto Clampo Pro, tapping blocks, single pole, four connections</b>												
KE66	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Grey	Cu 160 A, Al 145 A	800 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail	29.8 x 49 x 43	0.049	30	6418677191947
KE66.2	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Blue	Cu 160 A, Al 145 A	800 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail	29.8 x 49 x 43	0.049	30	6418677191954
KE66.3	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Yellow/ Green		800 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail	29.8 x 49 x 43	0.049	30	6418677191961
KE67	Al/Cu 16-95 mm <sup>2</sup>	Grey	Cu 245 A, Al 220 A	800 V	5 mm	25	20 Nm	DIN rail/ screw	42 x 86 x 49	0.128	30	6418677191978
KE67.2	Al/Cu 16-95 mm <sup>2</sup>	Blue	Cu 245 A, Al 220 A	800 V	5 mm	25	20 Nm	DIN rail/ screw	42 x 86 x 49	0.128	30	6418677191985
KE67.3	Al/Cu 16-95 mm <sup>2</sup>	Yellow/ Green		800 V	5 mm	25	20 Nm	DIN rail/ screw	42 x 86 x 49	0.128	30	6418677191992
KE68	Al/Cu 35-150 mm <sup>2</sup>	Grey	Cu 320 A, Al 290 A	800 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	51.5 x 95 x 59	0.210	30	6418677192005
KE68.2	Al/Cu 35-150 mm <sup>2</sup>	Blue	Cu 320 A, Al 290 A	800 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	51.5 x 95 x 59	0.210	30	6418677192012
KE68.3	Al/Cu 35-150 mm <sup>2</sup>	Yellow/ Green		800 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	51.5 x 95 x 59	0.210	30	6418677192029
KE69	Al/Cu 35-240 mm <sup>2</sup>	Grey	Cu 425 A, Al 380 A	800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	Screw	64 x 130 x 67	0.438	30	6418677192036
KE69.2	Al/Cu 35-240 mm <sup>2</sup>	Blue	Cu 425 A, Al 380 A	800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	Screw	64 x 130 x 67	0.438	30	6418677192043
KE69.3	Al/Cu 35-240 mm <sup>2</sup>	Yellow/ Green		800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	Screw	64 x 130 x 67	0.438	30	6418677192050

The nominal currents in the table are for maximum cross-sections.



KE61



KE62



KE63.2



KE64.3



KE61.03



KE66



KE68.2



KE69.3



## Ensto Clampo terminal sets

Packed in convenient retail packages.

Cross-section (mm²)	Product code	GTIN-13	Description
Cu 2.5 – 50, Al 6 – 50	KE61SET	6418677191800	Mounting kit, KE61.03 + KE61.2 + KE61.3
	KE61T	6418677192326	Universal terminal, grey, bag of 3 pcs
	KE61.03T	6418677192357	Universal terminal, grey, 3-pole, bag of 2 pcs
	KE61.2T	6418677192333	Universal terminal, blue, bag of 3 pcs
	KE61.3T	6418677192340	Universal terminal, yellow-green, bag of 3 pcs
Al/Cu 16 – 95	KE62SET	6418677192432	Mounting kit, 3 x KE62 + KE62.2 + KE62.3
	KE62T	6418677192364	Universal terminal, grey, bag of 3 pcs
	KE62.2T	6418677192371	Universal terminal, blue, bag of 3 pcs
	KE62.3T	6418677192388	Universal terminal, yellow-green, bag of 3 pcs
Cu 2.5 – 50, Al 6 – 50	KE66T	6418677192395	Tapping block, grey, bag of 3 pcs
	KE66.2T	6418677192401	Tapping block, blue, bag of 3 pcs
	KE66.3T	6418677192418	Tapping block, yellow-green, bag of 3 pcs



KE61SET includes Ensto Clampo Pro universal terminals.

## Accessories

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
<b>Terminal shrouds</b>				
KEL61	Terminal shroud for KE61, KE66	0.001	100	6438100020064
KEL62	Terminal shroud for KE62, KE67	0.002	100	6438100020071
KEL63	Terminal shroud for KE63, KE68	0.003	100	6438100020088
KEL64	Terminal shroud for KE64, KE69	0.004	100	6438100020095
<b>Other accessories</b>				
PP37	DIN rail, 35 mm, steel, length 2 m	0.622	10	6418677161896
KRL2	End clip for fixing components to Din rail, PP37	0.009	50	6418677161919



The terminal shroud is L-shaped, thus protecting both the conductor space and the hole from the tightening tool.

The terminals are easy to mark using the marking strips.

## Marking strips

Each strip contains 10 markers.

Product code	Markings	Weight (kg)	Package size (strips)	GTIN-13
PM34.10	⊕	0.001	10	6418677192166
PM34.22	+	0.001	10	6418677192241
PM34.23	-	0.001	10	6418677192258
PM34.24	⊥	0.001	10	6418677192265
PM34.25	N	0.001	10	6418677192272
PM34.26	L1	0.001	10	6418677192289
PM34.27	L2	0.001	10	6418677192296
PM34.28	L3	0.001	10	6418677192302
PM34.29	PE	0.001	10	6418677192319

## UL recognitions

Product code	Wire type	AWG* 1 wire/terminal	AWG* 2 Cu-wires/terminal	AWG* 3 Cu-wires/terminal	Maximum voltage	Maximum current	Tightening torque	Allen-hex socket head terminal screw	Dimensions (W x L x H)
<b>One-pole universal terminals</b>									
KE61	Cu	1/0 – 6	6	8	600 V	150 A	90 lb-in (10 Nm)	5 mm	0.7 x 1.9 x 1.7 in (17.8 x 49 x 43 mm)
	Al	1/0 – 6			600 V	120 A			
KE62	Cu	4/0 – 4	2 – 6	6	600 V	230 A	126 lb-in (14 Nm)	5 mm	0.9 x 3.4 x 1.9 in (24 x 86 x 49 mm)
	Al	4/0 – 4			600 V	180 A			
KE63	Cu	300 – 2	1/0 – 2	2	600 V	285 A	216 lb-in (24 Nm)	8 mm	1.2 x 3.7 x 2.3 in (29.5 x 95 x 59 mm)
	Al	300 – 2			600 V	230 A			
KE64	Cu	500 – 3/0	2/0 – 2	1/0 – 2	600 V	380 A	360 lb-in (40 Nm)	8 mm	1.5 x 5.1 x 2.6 in (37.5 x 130 x 67 mm)
	Al	500 – 3/0			600 V	310 A			
<b>Three-pole universal terminal</b>									
KE61.03	Cu	1/0 – 6	6	8	600 V	150 A	90 lb-in (10 Nm)	5 mm	1.9 x 1.9 x 1.7 in (49.5 x 49 x 43 mm)
	Al	1/0 – 6			600 V	120 A			
KE62.03	Cu	4/0 – 4	2 – 6	6	600 V	230 A	126 lb-in (14 Nm)	5 mm	2.7 x 3.4 x 1.9 in (69 x 86 x 49 mm)
	Al	4/0 – 4			600 V	180 A			
KE63.03	Cu	300 – 2	1/0 – 2	2	600 V	285 A	216 lb-in (24 Nm)	8 mm	3.3 x 3.7 x 2.3 in (85 x 96 x 59 mm)
	Al	300 – 2			600 V	230 A			
<b>Tapping blocks</b>									
KE66	Cu	1/0 – 6	6	8	600 V	150 A	90 lb-in (10 Nm)	5 mm	1.2 x 1.9 x 1.7 in (29.8 x 49 x 43 mm)
	Al	1/0 – 6			600 V	120 A			
KE67	Cu	4/0 – 4	2 – 6	6	600 V	230 A	126 lb-in (14 Nm)	5 mm	1.7 x 3.4 x 1.9 in (42 x 86 x 49 mm)
	Al	4/0 – 4			600 V	180 A			
KE68	Cu	300 – 2	1/0 – 2	2	600 V	285 A	216 lb-in (24 Nm)	8 mm	2.0 x 3.7 x 2.3 in (51.5 x 95 x 59 mm)
	Al	300 – 2			600 V	230 A			
KE69	Cu	500 – 3/0	2/0 – 2	1/0 – 2	600 V	380 A	360 lb-in (40 Nm)	8 mm	2.5 x 5.1 x 2.6 in (64 x 130 x 67 mm)
	Al	500 – 3/0			600 V	310 A			

Standard UL 1059, UL category XCFR2, file no. E192532.

\* AWG = American Wire Gauge

Insulating material polyamide, flammability rating V-2 (UL94).

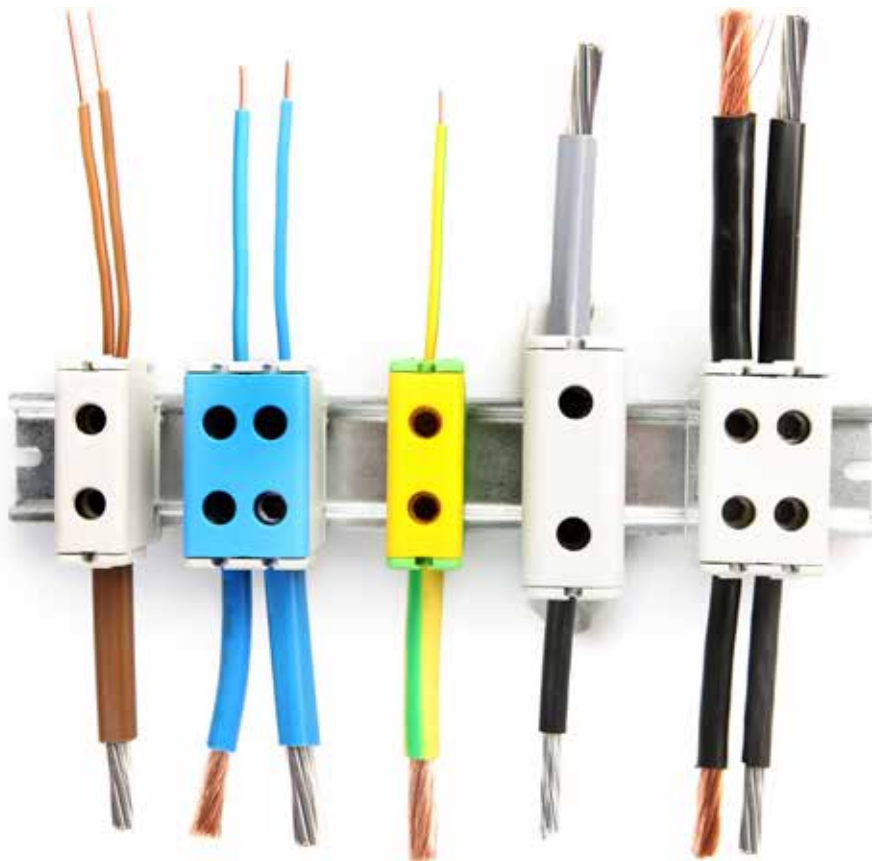
All terminal blocks KE61–KE69 are delivered with oxide inhibiting compound applied.

# Conductor table

## Conductors that can be used with the terminals: number, cross-section and type.

- Nominal cross-sections are in **bold type**.
- Often the requirements of a specific apparatus restrict the number of conductors.
- The nominal current of the terminal must not be exceeded.
- In general, the conductors connected to one conductor space of a connector must be of the same type.
- Table values require careful installation.
- After installation, check that all conductors are pressed into a connection.
- We recommend a ferrule when using a fine stranded conductor.
- Each incoming and outgoing protection conductor in a panel must have its own separate terminal.
- The conductor numbers below refer only to industrially-installed terminals (internal connections in a panel), (SGS Fimko).

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.														Nominal current (A)	Nominal insulation voltage (V)	Tightening torque (Nm)	
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150	185				240
<b>Ensto Clampo Pro universal terminals</b>																			
KE61	Al				1	1	1	1	1	<b>1</b>							145	800	4 (2.5–4 mm <sup>2</sup> )
	Cu		3	3	3	3	2	1	1	<b>1</b>							160		12 (6–50 mm <sup>2</sup> )
KE62	Al						1	1	1	1	1	<b>1</b>					220	800	20
	Cu						3	2	2	1	1	<b>1</b>					245		
KE63	Al								1	1	1	1	1	<b>1</b>			290	800	20 (35–95 mm <sup>2</sup> )
	Cu								3	2	1	1	1	<b>1</b>			320		30 (120–150 mm <sup>2</sup> )
KE64	Al								1	1	1	1	1	1	1	<b>1</b>	380	800	12 (35–70 mm <sup>2</sup> )
	Cu								3	3	2	1	1	1	1	<b>1</b>	425		45 (95–240 mm <sup>2</sup> )
KE66	Al				1	1	1	1	1	<b>1</b>							145	800	4 (2.5–4 mm <sup>2</sup> )
	Cu		3	3	3	3	2	1	1	<b>1</b>							160		12 (6–50 mm <sup>2</sup> )
KE67	Al						1	1	1	1	1	<b>1</b>					220	800	20
	Cu						3	2	2	1	1	<b>1</b>					245		
KE68	Al								1	1	1	1	1	<b>1</b>			290	800	20 (35–95 mm <sup>2</sup> )
	Cu								3	3	2	1	1	<b>1</b>			320		30 (120–150 mm <sup>2</sup> )
KE69	Al								1	1	1	1	1	1	1	<b>1</b>	380	800	12 (35–70 mm <sup>2</sup> )
	Cu								3	3	2	1	1	1	1	<b>1</b>	425		45 (95–240 mm <sup>2</sup> )



Ensto Clampo Pro terminals are suitable for both aluminum and copper conductors. Several copper conductors may be installed in the same conductor housing, in accordance with the table above.

# Ensto Clampo Pro 1000 V terminals

For Al/Cu conductors from 2.5 mm<sup>2</sup> to 240 mm<sup>2</sup>



## Ensto Clampo Pro 1000 V terminals in brief

- Suitable for 1000 VAC and VDC
- Compact size
  - Can be installed next to each other without partition plates
- Suitable for both aluminium and copper conductors
- Short circuit tested class A terminals
- Higher temperature range (90 °C)
- UL- recognized and EAC certified (switchboards/equipment suitable for exporting to the US and Russia)

## Technical features

- Housing: fiberglass reinforced polyamide
  - Better mechanical strength vs. polyamide
  - Better insulating capacity
  - 90°C temperature range achieved for the material
- Colors:
  - Red and black versions for DC applications
  - Grey and blue for AC applications (KE6x.3 to be used as a grounding terminal)

**Note:** The use of ferrules is recommended for installations with flexible conductors\* with the following cross-sections (single conductor installation):

- KE61, KE 66 2.5 – 16 mm<sup>2</sup>
- KE62, KE67 16 – 35 mm<sup>2</sup>
- KE63, KE68 35 – 70 mm<sup>2</sup>
- KE64, KE69 35 – 120 mm<sup>2</sup>

The use of 240 mm<sup>2</sup> flexible conductors is not recommended.

\*Class 5, according to IEC 228 Second Edition 1978

## Conformity



## Standards

For copper conductors:	EN 60947-7-1
For aluminium conductors:	EN 61238-1
UL recognition	UL 1059
Connector class:	A

## Technical information

Cross-section range:	Al 6 – 240 mm <sup>2</sup> Cu 2.5 – 240 mm <sup>2</sup>
Nominal current range:	145 – 425 A
Operating temperature:	max. 90 °C
Pollution degree:	3

## Material

Housing:	Fiberglass reinforced polyamide
Body and screws:	Tin-coated aluminium

## Mechanical features

Screw heads:	Hexagonal
Mounting:	Screws or DIN rail

NEW

➤ Now available  
240 mm<sup>2</sup> size!



1000 V terminals are well suited for applications where higher supply voltages are used, such as in drivers, railway systems and ships. They are also suitable for DC applications, making them a perfect choice for photovoltaic connections.

## Ensto Clampo Pro 1000 V, one-pole terminal blocks

Product code	Conductor cross-section (mm <sup>2</sup> )	Color	Nominal current (A)	Nominal insulation voltage (V)	Screw head hexagon (mm)	Bit length min.	Tightening torque (Nm)	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
KE161	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Grey	Cu 160 A, Al 145 A	1000 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail/ screw	19.2 x 82.5 x 48.5	0.045	30	6438100181758
KE161.2	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Blue	Cu 160 A, Al 145 A	1000 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail/ screw	19.2 x 82.5 x 48.5	0.045	30	6438100181765
KE161.4	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Red	Cu 160 A, Al 145 A	1000 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail/ screw	19.2 x 82.5 x 48.5	0.045	30	6438100181772
KE161.6	Cu 2.5-50 mm <sup>2</sup> Al 6-50 mm <sup>2</sup>	Black	Cu 160 A, Al 145 A	1000 V	5 mm	20	4 Nm (2.5-4mm <sup>2</sup> ), 12 Nm (6-50mm <sup>2</sup> )	DIN rail/ screw	19.2 x 82.5 x 48.5	0.045	30	6438100181789
KE162	Al/Cu 16-95 mm <sup>2</sup>	Grey	Cu 245 A, Al 220 A	1000 V	5 mm	25	20 Nm	DIN rail/ screw	25 x 93.5 x 55.5	0.091	30	6438100160616
KE162.2	Al/Cu 16-95 mm <sup>2</sup>	Blue	Cu 245 A, Al 220 A	1000 V	5 mm	25	20 Nm	DIN rail/ screw	25 x 93.5 x 55.5	0.091	30	6438100160623
KE162.4	Al/Cu 16-95 mm <sup>2</sup>	Red	Cu 245 A, Al 220 A	1000 V	5 mm	25	20 Nm	DIN rail/ screw	25 x 93.5 x 55.5	0.091	30	6438100160647
KE162.6	Al/Cu 16-95 mm <sup>2</sup>	Black	Cu 245 A, Al 220 A	1000 V	5 mm	25	20 Nm	DIN rail/ screw	25 x 93.5 x 55.5	0.091	30	6438100160654
KE163	Al/Cu 35-150 mm <sup>2</sup>	Grey	Cu 320 A, Al 290 A	1000 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	30.4 x 108 x 64.5	0.143	30	6438100181796
KE163.2	Al/Cu 35-150 mm <sup>2</sup>	Blue	Cu 320 A, Al 290 A	1000 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	30.4 x 108 x 64.5	0.143	30	6438100181802
KE163.4	Al/Cu 35-150 mm <sup>2</sup>	Red	Cu 320 A, Al 290 A	1000 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	30.4 x 108 x 64.5	0.143	30	6438100181819
KE163.6	Al/Cu 35-150 mm <sup>2</sup>	Black	Cu 320 A, Al 290 A	1000 V	8 mm	34	20 Nm (35-95mm <sup>2</sup> ), 30 Nm (120-150mm <sup>2</sup> )	DIN rail/ screw	30.4 x 108 x 64.5	0.143	30	6438100181826
NEW KE164	Al/Cu 35-240 mm <sup>2</sup>	Grey	Cu 425 A, Al 380 A	800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	DIN rail/ screw	37,5x130x70	0.265	30	6438100351083
KE164.2	Al/Cu 35-240 mm <sup>2</sup>	Blue	Cu 425 A, Al 380 A	800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	DIN rail/ screw	37,5x130x70	0.265	30	6438100357641
KE164.4	Al/Cu 35-240 mm <sup>2</sup>	Red	Cu 425 A, Al 380 A	800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	DIN rail/ screw	37,5x130x70	0.265	30	6438100357658
KE164.6	Al/Cu 35-240 mm <sup>2</sup>	Black	Cu 425 A, Al 380 A	800 V	8 mm	38	12 Nm (35-70mm <sup>2</sup> ), 45 Nm (95-240mm <sup>2</sup> )	DIN rail/ screw	37,5x130x70	0.265	30	6438100357665

## UL recognitions

Product code	Wire type	AWG* 1 wire/ terminal	AWG* 2 Cu-wires/ terminal	AWG* 3 Cu-wires/ terminal	Max insulation voltage	Max current	Tightening torque	Allen-hex socket head terminal screw	Dimensions (W x H x D)
KE161	Cu	1/0 - 6	6	8	1000 V	150 A	90 lb-in (10 Nm)	5 mm	0.76 x 3.25 x 1.91 In (19.2 x 82.5 x 48.5 mm)
	Al	1/0 - 6			1000 V	120 A			
KE162	Cu	4/0 - 4	2 - 6	6	1000 V	230 A	126 lb-in (14 Nm)	5 mm	0.98 x 3.68 x 2.19 In (25 x 93.5 x 55.5 mm)
	Al	4/0 - 4			1000 V	180 A			
KE163	Cu	300 - 2	1/0 - 2	2	1000 V	285 A	216 lb-in (24 Nm)	8 mm	1.20 x 4.25 x 2.54 In (30.4 x 108 x 64.5 mm)
	Al	300 - 2			1000 V	230 A			
KE164	Cu	500 - 3/0	2/0 - 2	1/0 - 2	1000 V	380 A	360 lb-in (40 Nm)	8 mm	1,5 x 5,1 x 2,76 In (37,5 x 130 x 70 mm)
	Al	500 - 3/0			1000 V	310 A			



KE161

Standard UL 1059, UL category XCFR2, file # E 192532.

\* AWG = American Wire Gauge

All terminal blocks are delivered with oxide-inhibiting compound applied.

## Terminal shrouds

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
KEL161	Terminal shroud for KE161	0,00124	100	6438100357672
KEL162	Terminal shroud for KE162	0,00195	100	6438100357689
KEL163	Terminal shroud for KE163	0,00297	100	6438100357696
KEL164	Terminal shroud for KE164	0,00394	100	6438100357702



KE162.6



KE163.4

## Conductors that can be used with the terminals: number, cross-section and type.

- Nominal cross-sections are in **bold type**.
- Often the requirements of a specific apparatus restrict the number of conductors.
- The nominal current of the terminal must not be exceeded.
- In general, the conductors connected to one conductor space of a connector must be of the same type.
- Table values require careful installation.
- After installation, check that all conductors are pressed into a connection.
- We recommend a ferrule when using a fine stranded conductor.
- Each incoming and outgoing protection conductor in a panel must have its own separate terminal.
- The conductor numbers below refer only to industrially-installed terminals (internal connections in a panel), (SGS Fimko).

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.													Nominal current (A)	Nominal insulation voltage (V)	Tightening torque (Nm)			
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150				185	240	300
KE161	Al				1	1	1	1	1	<b>1</b>								145	1000	4 Nm (2,5–4 mm <sup>2</sup> )
	Cu		3	3	3	3	2	1	1	<b>1</b>								160		12 Nm (6–50 mm <sup>2</sup> )
KE162	Al						1	1	1	1	1	<b>1</b>					220	1000	20	
	Cu						3	2	2	1	1	<b>1</b>					245			
KE163	Al								1	1	1	1	1	<b>1</b>			290	1000	30 Nm (120–150 mm <sup>2</sup> )	
	Cu								3	2	1	1	1	<b>1</b>			320		20 Nm (35–95 mm <sup>2</sup> )	
KE164	Al								1	1	1	1	1	1	1	<b>1</b>	380	800	12 (35–70 mm <sup>2</sup> )	
	Cu								3	3	2	1	1	1	1	<b>1</b>	425		45 (95–240 mm <sup>2</sup> )	



# Ensto Clampo Apparatus equipment terminals

For Al/Cu conductors from 2.5 mm<sup>2</sup> to 300 mm<sup>2</sup>



## Ensto Clampo Apparatus equipment terminals in brief:

- › Universal terminal series for connecting aluminium and copper conductors to equipment
- › Specially developed to meet the needs of equipment manufacturers
- › Wide application area (traditional panel-building and the manufacture of machinery and equipment in which both aluminium and copper conductors can be used)
- › Used in equipment or as a transfer terminal between copper and aluminium
- › Directly connected to one or two conductors
- › Terminals with insulation base also available
- › Reliable product with simple construction
- › Oxidation-inhibiting compound applied at the factory
- › Easy to install
- › Models with two inputs also suitable for branching
- › Fixing possibilities: with a bolt to a copper bar or with a base together with screws onto a DIN rail
- › Short circuit tested class A terminals (not KE12.12 and KE12.20)

Conformity	
Standards	
KE12.12, KE12.20:	IEC 61545, EN 60947-7-1
Other terminals:	EN 61238-1, EN 60947-7-1
Connector class:	A
Technical information	
Cross-section range:	Al 2.5 – 300 mm <sup>2</sup> Cu 6 – 300 mm <sup>2</sup>
Nominal current range:	145 – 630 A
Operating temperature:	max 80 °C
Pollution degree:	3
Material	
Housing KE12.xx and insulation base KE7x:	Polyamide
Body and screws:	Tin-coated aluminium, KE55 and KE75 with steel screws
Mechanical features	
Screw head:	Hexagonal
Mounting:	Screws or DIN rail

## Ensto Clampo Apparatus, adapter terminals

Product code	Conductor cross-section	Number of poles	Nominal current	Screw head hexagon	Tightening torque	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
KE12.12	Cu 2.5–50 mm <sup>2</sup> Al 6–50 mm <sup>2</sup>	1	Cu 160 A, Al 145 A	5 mm	12 Nm	16.4 x 43 x 29.1	0.013	90	6418677181788
KE12.20	Cu 2.5–50 mm <sup>2</sup> Al 6–50 mm <sup>2</sup>	1	Cu 160 A, Al 145 A	5 mm	12 Nm	16.4 x 51 x 29.1	0.014	90	6418677181795

The nominal currents in the table are for maximum cross-sections.

## Ensto Clampo Apparatus, equipment terminals

Product code	Conductor cross-section	Number of poles	Nominal current	Screw head hexagon	Tightening torque	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
KE52.2	Al/Cu 16–95 mm <sup>2</sup>	1	270 A	5 mm	14 Nm	20 x 47 x 33	0.030	30	6418677192449
KE53.2	Al/Cu 35–150 mm <sup>2</sup>	1	320 A	8 mm	24 Nm (35–95 mm <sup>2</sup> ), 24 Nm (120–150 mm <sup>2</sup> )	24.5 x 60 x 40	0.050	30	6418677192456
KE54.2	Al/Cu 35–240 mm <sup>2</sup>	1	425 A	8 mm	12 Nm (35–70 mm <sup>2</sup> ), 40 Nm (95–240 mm <sup>2</sup> )	32 x 77 x 48	0.115	15	6418677192463

The nominal currents in the table are for maximum cross-sections.

## Accessories

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
SR1	Contact grease, 225 g tube	0.254	25	6418677405402



KE12.12



KE52.2



Contact grease, SR1.

## Conductors that can be used with the terminals: number, cross-section and type.

- Nominal cross-sections are in **bold type**.
- Often the requirements of a specific apparatus restrict the number of conductors.
- The nominal current of the terminal must not be exceeded.
- In general, the conductors connected to one conductor space of a connector must be of the same type.
- Table values require careful installation.
- After installation, check that all conductors are pressed into a connection.
- We recommend a ferrule when using a fine stranded conductor.
- Each incoming and outgoing protection conductor in a panel must have its own separate terminal.
- The conductor numbers below refer only to industrially-installed terminals (internal connections in a panel), (SGS Fimko).

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.																Nominal current (A)	Tightening torque (Nm)
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150	185	240	300		
KE12.12, KE12.20	Al				1	1	1	1	1	<b>1</b>								145	12
	Cu		1	1	1	1	1	1	1	<b>1</b>								160	
KE52.2	Al						1	1	1	1	1	<b>1</b>						270	14
	Cu						3	2	2	1	1	<b>1</b>							
KE53.2	Al									1	1	1	1	1	<b>1</b>			320	14 (35–95 mm <sup>2</sup> )
	Cu									3	2	1	1	1	<b>1</b>			24 (120–150 mm <sup>2</sup> )	
KE54.2	Al									1	1	1	1	1	1	1	<b>1</b>	425	12 (35–70 mm <sup>2</sup> )
	Cu									3	3	2	1	1	1	1	<b>1</b>	40 (95–240 mm <sup>2</sup> )	



# Ensto Clampo Tap tapping terminals

For Cu conductors from 6 mm<sup>2</sup> to 70 mm<sup>2</sup>



## Ensto Clampo Tap tapping terminals in brief:

- › One-pole and four-pole terminal plates for 6 – 70 mm<sup>2</sup> copper conductors
- › Particularly suitable for use with higher voltages or when improved shrouding is required
- › Terminals have insulating partitions
- › Can be mounted onto a DIN rail

Conformity	
Standards	
All terminals:	EN 60947-7-1
Technical information	
Cross-section range:	Cu 6 – 70 mm <sup>2</sup>
Nominal current range:	192 A
Nominal insulation voltage:	750 V
Operating temperature:	Max. 80 °C
Pollution degree:	3
Material	
Housing:	Polyamide
Body and screws:	Steel
Mechanical features	
Screw head:	Slot head or nut
Mounting:	Screws or DIN rail

## Ensto Clampo Tap, tapping terminal, 750 V

Product code	Conductor cross-section	Nominal current	Nominal insulation voltage	Screw head	Key size	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
<b>Four-pole terminal plates</b>											
KF7.70	Cu 6 – 70 mm <sup>2</sup>	192 A	750 V	Nut	8 mm	4 Nm	DIN rail/screw	122 x 64 x 43	0.160	25	6418677162602
<b>One-pole terminal plates</b>											
KF8.70	Cu 6 – 70 mm <sup>2</sup>	192 A	750 V	Nut	8 mm	4 Nm	DIN rail/screw	38 x 64 x 43	0.050	20	6418677162619



KF7.70



KF8.10

The nominal currents in the table are for maximum cross-sections.

## Protective covers

Product code	Description	Length	Weight (kg)	Package size (pcs)	GTIN-13
RDP6	For KF7 and KF8	2 m	0.247	10	6418677162626

Not RoHS compliant



RDP6

## Conductors that can be used with the terminals: number, cross-section and type

See more details, conductor table, page 83.

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.															Nominal current (A)	Nominal insulation voltage (V)	Tightening torque (Nm)	
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150	185	240				300
KF7.70	Cu				7	7	6	4	4	2	2	1						192	750	4
KF8.70	Cu				7	7	6	4	4	2	2	1						192	750	4



# Ensto Clampo Compact terminal blocks

For Cu conductors from 1.5 mm<sup>2</sup> to 16 mm<sup>2</sup>



## Ensto Clampo Compact terminal blocks in brief:

- For 1.5 – 16 mm<sup>2</sup> copper conductors
- Used in controlling, instrumentation and automation applications
- Cost-effective solution
- Compact in size (ideal for installations with limited space)
- Include wire protection (to prevent damage to fine wire strands, while also preventing wires from entering too deeply into the terminal)
- Body of polyamide, heat resistance 105 °C
- Installation onto a DIN rail or directly onto surface
- Easy to mark (either by using marking tape or printing directly onto the terminal body)

Conformity	
Standards	
EN 60947-7-1, UL 1059, CSA C22.2 No. 158-1987	
Technical information	
Cross-section range:	Cu 1.5 – 16 mm <sup>2</sup>
Nominal current range:	17.5 – 82 A
Nominal insulation voltage:	450 – 750 V
Operating temperature:	Max. 105 °C
Material	
Housing:	Polyamide
Body:	Ni-coated brass
Mechanical features	
Screw head:	Slot head
Mounting:	Screws or DIN rail

## Ensto Clampo Compact, terminal blocks

Product code	Conductor cross-section	Number of poles	Nominal current	Nominal insulation voltage	Screw head slot head	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
KR5031	Cu 1.5 mm <sup>2</sup>	3	17.5 A	750 V (pollution degree 2)*	M2.6	0.4 Nm	DIN rail/ screw	26 x 22 x 18	0.007	200	6418677111402
KR5131	Cu 1.5 mm <sup>2</sup>	12	17.5 A	750 V (pollution degree 2)*	M2.6	0.4 Nm	DIN rail/ screw	70.9 x 22 x 18	0.026	50	6418677111426
KR8031	Cu 1.5 – 6 mm <sup>2</sup>	3	41 A	750 V (pollution degree 2)*	M3.5	0.8 Nm	DIN rail/ screw	31.4 x 22 x 22	0.015	200	6418677111778
KR8041	Cu 1.5 – 6 mm <sup>2</sup>	4	41 A	750 V (pollution degree 2)*	M3.5	0.8 Nm	DIN rail/ screw	38.2 x 22 x 22	0.021	200	6418677111792
KR8121	Cu 1.5 – 6 mm <sup>2</sup>	12	41 A	750 V (pollution degree 2)*	M3.5	0.8 Nm	DIN rail/ screw	90.8 x 22 x 22	0.060	100	6418677111822
KR10021	Cu 6 – 16 mm <sup>2</sup>	2	82 A	750 V (pollution degree 2)**	M6	2.5 Nm	DIN rail/ screw	34 x 30.8 x 39.5	0.044	100	6418677111334
KR10031	Cu 6 – 16 mm <sup>2</sup>	3	82 A	750 V (pollution degree 2)**	M6	2.5 Nm	DIN rail/ screw	45.3 x 30.8 x 39.5	0.065	100	6418677111358

\* Pollution degree 3: nominal insulation voltage 450 V  
 \*\* Pollution degree 3: nominal insulation voltage 500 V

The nominal currents in the table are for maximum cross-sections.



KR5131

KR8041

KR10031

KR10021



## UL recognitions

Product code	Number of poles	Wire type	AWG* 1 wire/terminal	Maximum voltage	Maximum current	Nominal tightening torque	Screwdriver terminal screw	Dimensions (W x L x H)
KR5031	3	Cu	14 – 22	150 V	10 A	4.4 lb-in (0.5 Nm)	Max. 3.5 mm slot	1.0 x 0.9 x 0.7 In (26 x 22 x 18 mm)
KR5131	12	Cu	14 – 22	150 V	10 A	4.4 lb-in (0.5 Nm)	Max. 3.5 mm slot	2.8 x 0.9 x 0.7 In (70.9 x 22 x 18 mm)
KR8031	3	Cu	8 – 18	150 V	50 A	7 lb-in (0.8 Nm)	Max. 5 mm slot	1.2 x 0.9 x 0.9 In (31.4 x 22 x 22 mm)
KR8041	4	Cu	8 – 18	150 V	50 A	7 lb-in (0.8 Nm)	Max. 5 mm slot	1.5 x 0.9 x 0.9 In (38.2 x 22 x 22 mm)
KR8121	12	Cu	8 – 18	150 V	50 A	7 lb-in (0.8 Nm)	Max. 5 mm slot	3.6 x 0.9 x 0.9 In (90.8 x 22 x 22 mm)
KR10021	2	Cu	6 – 18	300 V	65 A	20 lb-in (2.25 Nm)	Max. 6.5 mm slot	1.3 x 1.2 x 1.6 In (34 x 30.8 x 39.5 mm)
KR10031	3	Cu	6 – 18	300 V	65 A	20 lb-in (2.25 Nm)	Max. 6.5 mm slot	1.8 x 1.2 x 1.6 In (45.3 x 30.6 x 39.5 mm)

Standard UL 1059, UL category XCFR2, file no. E192532.

\* AWG = American Wire Gauge

Insulating material polyamide, flammability rating V-2 (UL94).

## Accessories

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
KRL1505.02	Cross connector, 2-pole, 1.5 mm <sup>2</sup>	0.001	100	6418677111860
KRL6067.02	Cross connector, 2-pole, 6 mm <sup>2</sup>	0.001	100	6418677112003
KRL6067.03	Cross connector, 3-pole, 6 mm <sup>2</sup>	0.002	100	6418677112010
KRL6067.04	Cross connector, 4-pole, 6 mm <sup>2</sup>	0.002	100	6418677112027
KRL7	Adapter for 35 x 7.5 mm DIN rail mounting, grey	0.001	100	6418677112034
KRL8	End holder, fits both DIN 15 and 35 mm rails	0.003	100	6418677112041
PMR143	End plate for direct mounting	0.001	100	6418677112614
PMR370	Spacer plate, fits both DIN 15 and 35 mm rails	0.002	100	6418677112645
KRL6	Spacer plate for KR8121	0.002	100	6418677111952
PP44	DIN rail, 15 mm, steel, length = 2 m	0.290	10	6418677112720



Cross connector, 3-pole, KRL6067.03.



Adapter for 35 x 7.5 mm DIN rail mounting, KRL7.



End holder, fits both DIN 15 and 35 mm rails, KRL8.



End plate for direct mounting, PMR143.



Spacer plate, fits both DIN 15 and 35 mm rails, PMR370.

## Conductors that can be used with the terminals: number, cross-section and type

See more details, conductor table, page 83.

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.														Nominal current (A)	Nominal insulation voltage (V)	Tightening torque (Nm)		
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150	185				240	300
KR5031/5121	Cu	1																17,5	450	0,4
KR8031...8121	Cu	3	2	1	1													41	450	0,8
KR10021/10031	Cu				1	1	1											82	500	2,5

# Ensto Clampo Eurostrips

For Cu conductors from 1.5 mm<sup>2</sup> to 16 mm<sup>2</sup>



## Ensto Clampo Eurostrips in brief:

- For 1.5 – 16 mm<sup>2</sup> copper conductors
- For flexible, stranded and solid wires
- Produced as 12-pole
  - can be ordered precut with the required number of poles
- On request individual pole positions can be marked with desired markings
- Available with or without standoff feet
- Available with or without wire protection

Conformity	
Standards	
EN 60998-1, EN 60998-2-1, UL1059, UL 486, CSA C22.2 No. 158-10	
Technical information	
Cross-section range:	Cu 1.5 – 16 mm <sup>2</sup>
Nominal current range:	15 – 65 A
Nominal insulation voltage:	450 – 750 V
Operating temperature:	Max. 80 °C
Material	
Housing:	Polyamide
Body:	Ni-coated brass
Mechanical features	
Screw head:	Slot head
Mounting:	Screws

## Ensto Clampo Eurostrips

Product code	Conductor cross-section	Flat base or standoff feet	Wire protection	Number of poles	Nominal current	Nominal insulation voltage	Screw head slot head	Tightening torque	Mounting hole diameter (mm)	Dimensions W x L x H (mm)	Weight (kg)	GTIN-13
KA16.12	1.5 mm <sup>2</sup>	Flat base	No	12	15 A	450 V	M2.6	0.3–0.5 Nm	2.8	93.5 x 18.2 x 13.8	0.0191	6418677102608
KB16.12	1.5 mm <sup>2</sup>	Flat base	Yes	12	15 A	450 V	M2.6	0.3–0.5 Nm	2.8	93.5 x 18.2 x 13.8	0.0191	6418677105593
KA17.12	1.5 mm <sup>2</sup>	Standoff feet	No	12	15 A	450 V	M2.6	0.3–0.5 Nm	2.8	93.5 x 18.2 x 17.3	0.0190	6418677102721
KB17.12	1.5 mm <sup>2</sup>	Standoff feet	Yes	12	15 A	450 V	M2.6	0.3–0.5 Nm	2.8	93.5 x 18.2 x 17.3	0.0200	6418677105715
KA241.12	4 mm <sup>2</sup>	Flat base	No	12	30 A	450 V	M3	0.4–0.6 Nm	3.5	117 x 22.2 x 15.8	0.0320	6418677103445
KB241.12	4 mm <sup>2</sup>	Flat base	Yes	12	30 A	450 V	M3	0.4–0.6 Nm	3.5	117 x 22.2 x 15.8	0.0330	6418677106439
KA242.12	4 mm <sup>2</sup>	Standoff feet	No	12	30 A	450 V	M3	0.4–0.6 Nm	3.5	117 x 22.2 x 19.8	0.0350	6418677103568
KB242.12	4 mm <sup>2</sup>	Standoff feet	Yes	12	30 A	450 V	M3	0.4–0.6 Nm	3.5	117 x 22.2 x 19.8	0.0360	6418677106552
KA460.12	6 mm <sup>2</sup>	Flat base	No	12	40 A	450 V	M3.5	0.6–0.8 Nm	4.2	140 x 23.2 x 17.7	0.0460	6418677104701
KB460.12	6 mm <sup>2</sup>	Flat base	Yes	12	40 A	450 V	M3.5	0.6–0.8 Nm	4.2	140 x 23.2 x 17.7	0.0480	6418677107283
KA463.12	6 mm <sup>2</sup>	Standoff feet	No	12	40 A	450 V	M3.5	0.6–0.8 Nm	4.2	140 x 23.2 x 21.2	0.0480	6418677104824
KB463.12	6 mm <sup>2</sup>	Standoff feet	Yes	12	40 A	450 V	M3.5	0.6–0.8 Nm	4.2	140 x 23.2 x 21.2	0.0490	6418677107405
KA612.12	16 mm <sup>2</sup>	Standoff feet	No	12	65 A	750 V	M5	1.8–2.0 Nm	4.0	176 x 28 x 26.5	0.0920	6418677105302
KB612.12	16 mm <sup>2</sup>	Standoff feet	Yes	12	65 A	750 V	M5	1.8–2.0 Nm	4.0	176 x 28 x 26.5	0.0940	6418677108006

Package size 250 pcs.

The nominal currents in the table are for maximum cross-sections.



KA16.12



KA241.12



KA460.12



KA612.12



## UL recognitions

Product code	AWG* 1 wire/terminal	Number of poles	Maximum current	Maximum insulation voltage	Screw head slot head	Tightening torque	Dimensions L x W x H (mm)
KA / KB16.12	12 - 22	12	20 A	300 V	M2.6	0.3 - 0.5 Nm	93.5 x 18.2 x 13.8
KA / KB17.12	12 - 22	12	20 A	600 V	M2.6	0.3 - 0.5 Nm	93.5 x 18.2 x 17.3
KA / KB241.12	10 - 20	12	30 A	300 V	M3	0.4 - 0.6 Nm	117 x 22.2 x 15.8
KA / KB242.12	10 - 20	12	30 A	600 V	M3	0.4 - 0.6 Nm	117 x 22.2 x 19.3
KA / KB460.12	8 - 20	12	40 A	300 V	M3.5	0.6 - 0.8 Nm	140 x 23.2 x 17.7
KA / KB463.12	8 - 20	12	40 A	600 V	M3.5	0.6 - 0.8 Nm	140 x 23.2 x 21.2
KA / KB612.12	6 - 14	12	65 A	600 V	M5	1.8 - 2.0 Nm	176 x 28 x 26.5

Standard UL 1059, UL category XCFR2, file no. E192532.

\* AWG = American Wire Gauge

Insulating material polyamide, flammability rating V-2 (UL94).

## Accessories

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
<b>Cross connectors</b>				
KRL1508.02	2-pole, 1.5 mm <sup>2</sup>	0.0008	100	6418677111891
KRL1508.03	3-pole, 1.5 mm <sup>2</sup>	0.0014	100	6418677111907
KRL4010.02	2-pole, 4 mm <sup>2</sup>	0.0012	100	6418677114856
KRL4010.03	3-pole, 4 mm <sup>2</sup>	0.0019	100	6418677111938
KRL6012.02	2-pole, 6 mm <sup>2</sup>	0.0013	100	6418677111969
KRL6012.03	3-pole, 6 mm <sup>2</sup>	0.0021	100	6418677111983
KRL16015.02	2-pole, 16 mm <sup>2</sup>	0.0018	100	6418677112959
<b>Mounting pins</b>				
AH2242	For KA/KB242, white, total length 20.5 mm, insertion length 14 mm, hole Ø 4.5 mm	0.0002	10 000	6418677100161
AH2463	For KA/KB463, grey, total length 21.5 mm, insertion length 14.5 mm, hole Ø 4.5 mm	0.0003	10 000	6418677100178
AH2512	For KA/KB612, black, total length 24.5 mm, insertion length 19 mm, hole Ø 5.5 mm	0.0003	10 000	6418677100185
<b>Spacer plate</b>				
KA46	For 4-6 mm <sup>2</sup> terminal blocks with standoff feet	0.002	1000	6418677104589



KRL6012.02



Mounting pins



KA46



PMK2812, PMK3012

## Marking plates

Product code	Single or double	Markings	Nominal cross-section mm <sup>2</sup>	For products	Weight (kg)	Package size (pcs)	GTIN-13
PMK2612	2	Plain	4	241, 242	0.0040	500	6418677112485
PMK2712	2	(1-12)	4	241, 242	0.0040	500	6418677112492
PMK2812	1	Plain	4	241, 242	0.0023	500	6418677112508
PMK2912	1	(1-12)	4	241, 242	0.0023	500	6418677112515
PMK3012	2	Plain	6	460, 463	0.0050	500	6418677112522
PMK3212	1	Plain	6	460, 463	0.0050	500	6418677112546
PMK4412	2	Plain	16	612	0.0080	500	6418677112560
PMK4512	2	(1-12)	16	612	0.0080	500	6418677112577
PMK4612	1	Plain	16	612	0.0040	500	6418677112584

## Conductors that can be used with the terminals: number, cross-section and type

See more details, conductor table, page 83.

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.														Nominal current (A)	Nominal insulation voltage (V)	Tightening torque (Nm)		
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150	185				240	300
KA / KB16.12	Cu	1																15	450	0,3 - 0,5
KA / KB17.12	Cu	1																15	450	0,3 - 0,5
KA / KB241.12	Cu	1	1	1														30	450	0,4 - 0,6
KA / KB242.12	Cu	1	1	1														30	450	0,4 - 0,6
KA / KB460.12	Cu		1	1	1													40	450	0,6 - 0,8
KA / KB463.12	Cu		1	1	1													40	450	0,6 - 0,8
KA / KB612.12	Cu				1	1	1											65	750	1,8 - 2,0

# Ensto Clampo Wire Connectors

For Cu conductors from 2.5 mm<sup>2</sup> to 16 mm<sup>2</sup>



- Ensto Clampo Wire Connectors in brief:
- For 2.5 – 16 mm<sup>2</sup> copper conductors
- For flexible, stranded and solid wires
- Produced as 12-pole
  - can easily be cut without any tools

Conformity	
Terminal blocks:	CE <sup>RoHS</sup> (F) EAC
Standards	
Terminal blocks:	EN 60998-1
Technical information	
Cross-section range:	Cu 2.5 – 16 mm <sup>2</sup>
Nominal insulation voltage:	450 V
Operating temperature:	Max. 80 °C
Material	
Housing:	Polyamide (KD160 Polycarbonate)
Body:	Steel (KD160 Ni-coated brass)
Mechanical features	
Screw head:	Slot head
Mounting:	Screws or DIN rail

## Ensto Clampo Wire Connectors

Product code	Conductor cross-section	Number of poles	Nominal insulation voltage	Screw head slot head	Tightening torque	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
AL1.12	3 x 2.5 mm <sup>2</sup> / 4 x 1.5 mm <sup>2</sup>	12	450 V	M3.5	0.8 – 1.0 Nm	128.6 x 19.2 x 28.8	0.0545	50	6410019230543
AL2.12	2 x 6 mm <sup>2</sup> / 3 x 4 mm <sup>2</sup> / 4 x 2.5 mm <sup>2</sup>	12	450 V	M4.5	1.8 – 2.0 Nm	130 x 26 x 32.1	0.0812	50	6410019230550
AL13	2 x 16 mm <sup>2</sup> / 2 x 10 mm <sup>2</sup> / 3 x 6 mm <sup>2</sup> / 4 x 4 mm <sup>2</sup>	1	450 V	M6	2.5 – 2.7 Nm	16 x 39.5 x 40	0.0120	500	6410019230604
KD160.01	4 x 1 mm <sup>2</sup> / 3 x 1.5 mm <sup>2</sup> / 2 x 2.5 mm <sup>2</sup>	1	450 V	M4	1.2 – 1.4 Nm	9 x 15.5 x 17	0.0002	2000	6418677109348
KD160.12	4 x 1 mm <sup>2</sup> / 3 x 1.5 mm <sup>2</sup> / 2 x 2.5 mm <sup>2</sup>	12	450 V	M4	1.2 – 1.4 Nm	110 x 15.5 x 17	0.0025	500	6418677109454

The nominal currents in the table are for maximum cross-sections.



AL1.12



AL2.12



AL13



KD160.12

## Conductors that can be used with the terminals: number, cross-section and type

See more details, conductor table, page 83.

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.														Nominal current (A)	Nominal insulation voltage (V)	Tightening torque (Nm)	
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150	185				240
Ensto Clampo Wire connectors																			
AL1.12	Cu	4	3														24	450	0,8 – 1,0
AL2.12	Cu	4	3	2													41	450	1,8 – 2,0
AL13	Cu		4	3	2	2											76	450	2,5 – 2,7
KD160.01	Cu	3	2	1													24	450	1,2 – 1,4
KD160.12	Cu	3	2	1													24	450	1,2 – 1,4



# Ensto Clampo Ground N and PE terminals

For Cu conductors from 1.5 mm<sup>2</sup> to 35 mm<sup>2</sup>



## Ensto Clampo Ground N and PE terminals in brief:

- Used in control and panel building applications
- Versatile installation and mounting alternatives
- Products as complete units in wide selection of sizes and markings
- Separate components of terminals also available for special assemblies
- Models with wire protection (to prevent damage to fine wire strands)

Conformity	
Standards	
N busbars:	EN 60947-7-1
PE busbars:	EN 60947-7-2
N and PE busbars:	EN 60947-7-1, EN 60947-7-2
Technical information	
Cross-section range:	Cu 1.5 – 35 mm <sup>2</sup>
Nominal current range:	82 – 135 A
Nominal insulation voltage:	500 V
Operating temperature:	max 80 °C
Pollution degree:	3
Material	
Body:	Polyamide/polycarbonate
Base:	Brass/steel
Mechanical features	
Screw head:	+/-
Mounting:	Screws or DIN rail

## Ensto Clampo Ground, neutral busbars

Product code	Conductor cross-section	Nominal current	Nominal insulation voltage	Screw head	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
<b>N busbars with 16 mm<sup>2</sup> and 6 mm<sup>2</sup> pillar terminals</b>										
KNA4.104	Cu 2 x (1 x 16 mm <sup>2</sup> + 3 x 6 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 53 x 35	0.063	50	6418677162770
KNA4.106	Cu 2 x (1 x 16 mm <sup>2</sup> + 5 x 6 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 65 x 35	0.085	50	6418677162787
KNA4.108	Cu 2 x (1 x 16 mm <sup>2</sup> + 7 x 6 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 79 x 35	0.104	25	6418677162794
KNA4.110	Cu 2 x (2 x 16 mm <sup>2</sup> + 8 x 6 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 95 x 35	0.130	25	6418677162817
KNA4.112	Cu 2 x (2 x 16 mm <sup>2</sup> + 10 x 6 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 106 x 35	0.153	25	6418677162824
KNA4.114	Cu 2 x (3 x 16 mm <sup>2</sup> + 11 x 6 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 122 x 35	0.178	25	6418677162831
KNA4.120	Cu 2 x (4 x 16 mm <sup>2</sup> + 16 x 6 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 160 x 35	0.243	25	6418677162848
<b>N busbars with 16 mm<sup>2</sup> pillar terminals</b>										
KN4.102	Cu 2 x (2 x 16 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 43 x 43	0.052	100	6418677152849
KN4.104	Cu 2 x (4 x 16 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 61 x 43	0.088	50	6418677152856
KN4.106	Cu 2 x (6 x 16 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 79 x 43	0.122	50	6418677152863
KN4.108	Cu 2 x (8 x 16 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 97 x 43	0.162	25	6418677152870
KN4.110	Cu 2 x (10 x 16 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 115 x 43	0.198	25	6418677152887
KN4.112	Cu 2 x (12 x 16 mm <sup>2</sup> )	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 133 x 43	0.230	25	6418677152894

The nominal currents in the table are for maximum cross-sections.



KNA4.110



KNA4.106

## Ensto Clampo Ground, PE busbars

Product code	Conductor cross-section	Screw head	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
<b>PE busbars with 16 mm<sup>2</sup> and 6 mm<sup>2</sup> pillar terminals</b>								
KNA4.104P	Cu 2 x (1 x 16 mm <sup>2</sup> + 3 x 6 mm <sup>2</sup> )	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 58 x 35	0.063	50	6418677152900
KNA4.106P	Cu 2 x (1 x 16 mm <sup>2</sup> + 5 x 6 mm <sup>2</sup> )	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 65 x 35	0.085	50	6418677152917
KNA4.108P	Cu 2 x (1 x 16 mm <sup>2</sup> + 7 x 6 mm <sup>2</sup> )	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 79 x 35	0.104	25	6418677152924
KNA4.110P	Cu 2 x (2 x 16 mm <sup>2</sup> + 8 x 6 mm <sup>2</sup> )	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 95 x 35	0.130	25	6418677152931
KNA4.112P	Cu 2 x (2 x 16 mm <sup>2</sup> + 10 x 6 mm <sup>2</sup> )	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 106 x 35	0.153	25	6418677152948
KNA4.114P	Cu 2 x (3 x 16 mm <sup>2</sup> + 11 x 6 mm <sup>2</sup> )	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 122 x 35	0.178	25	6418677152955
KNA4.120P	Cu 2 x (4 x 16 mm <sup>2</sup> + 16 x 6 mm <sup>2</sup> )	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 160 x 35	0.243	25	6418677152962

The nominal currents in the table are for maximum cross-sections.



KNA4.110P

## Ensto Clampo Ground, N and PE busbars

Product code	Conductor cross-section	Nominal current	Nominal insulation voltage	Screw head	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
<b>N and PE busbars with 16 mm<sup>2</sup> and 6 mm<sup>2</sup> pillar terminals, 6 mm<sup>2</sup> pillar terminals with wire protection</b>										
KNA5.108	Cu, N 1 x 16 mm <sup>2</sup> + 7 x 6 mm <sup>2</sup> , PE 2 x 16 mm <sup>2</sup> + 7 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 121.5 x 35	0.176	25	6418677162954
KNA5.113	Cu, N 1 x 16 mm <sup>2</sup> + 12 x 6 mm <sup>2</sup> , PE 2 x 16 mm <sup>2</sup> + 12 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 152 x 35	0.233	25	6418677162961
KNA5.117	Cu, N 1 x 16 mm <sup>2</sup> + 16 x 6 mm <sup>2</sup> , PE 2 x 16 mm <sup>2</sup> + 16 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 176.5 x 35	0.276	25	6418677162978
KNA5.120	Cu, N 1 x 16 mm <sup>2</sup> + 19 x 6 mm <sup>2</sup> , PE 2 x 16 mm <sup>2</sup> + 19 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 195 x 35	0.309	25	6418677162985
KNA5.125	Cu, N 2 x 16 mm <sup>2</sup> + 23 x 6 mm <sup>2</sup> , PE 3 x 16 mm <sup>2</sup> + 23 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 240.5 x 35	0.377	25	6418677162992
KNA5.130	Cu, N 2 x 16 mm <sup>2</sup> + 28 x 6 mm <sup>2</sup> , PE 3 x 16 mm <sup>2</sup> + 28 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 271 x 35	0.438	20	6418677163005
KNA5.134	Cu, N 2 x 16 mm <sup>2</sup> + 32 x 6 mm <sup>2</sup> , PE 3 x 16 mm <sup>2</sup> + 32 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 295.5 x 35	0.470	20	6418677163012
KNA5.138	Cu, N 2 x 16 mm <sup>2</sup> + 36 x 6 mm <sup>2</sup> , PE 3 x 16 mm <sup>2</sup> + 36 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm/0.8 Nm	DIN rail/screw	40 x 320 x 35	0.520	10	6418677163029
<b>N and PE busbars with 16 mm<sup>2</sup> and 6 mm<sup>2</sup> pillar terminals</b>										
KNA4.108NP	Cu, N 1 x 16 mm <sup>2</sup> + 7 x 6 mm <sup>2</sup> , PE 1 x 16 mm <sup>2</sup> + 7 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 79 x 35	0.104	25	6418677153105
KNA4.114NP	Cu, N 3 x 16 mm <sup>2</sup> + 11 x 6 mm <sup>2</sup> , PE 3 x 16 mm <sup>2</sup> + 11 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 122 x 35	0.178	25	6418677153112
KNA4.120NP	Cu, N 4 x 16 mm <sup>2</sup> + 16 x 6 mm <sup>2</sup> , PE 4 x 16 mm <sup>2</sup> + 16 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 160 x 35	0.243	25	6418677153129
KNA4.126NP	Cu, N 4 x 16 mm <sup>2</sup> + 22 x 6 mm <sup>2</sup> , PE 4 x 16 mm <sup>2</sup> + 22 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 203 x 35	0.315	25	6418677153136
KNA4.136NP	Cu, N 4 x 16 mm <sup>2</sup> + 32 x 6 mm <sup>2</sup> , PE 4 x 16 mm <sup>2</sup> + 32 x 6 mm <sup>2</sup>	82 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 269 x 35	0.415	25	6418677153143
<b>N and PE busbars with 16 mm<sup>2</sup> pillar terminals</b>										
KN4.204	Cu, N 4 x 16 mm <sup>2</sup> , PE 4 x 16 mm <sup>2</sup>	76 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 68.5 x 40	0.100	50	6418677162909
KN4.206	Cu, N 6 x 16 mm <sup>2</sup> , PE 6 x 16 mm <sup>2</sup>	76 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 86.5 x 40	0.146	25	6418677162916
KN4.208	Cu, N 8 x 16 mm <sup>2</sup> , PE 8 x 16 mm <sup>2</sup>	76 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 104.5 x 40	0.181	25	6418677162923
KN4.210	Cu, N 10 x 16 mm <sup>2</sup> , PE 10 x 16 mm <sup>2</sup>	76 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 122.5 x 40	0.219	25	6418677162930
KN4.212	Cu, N 12 x 16 mm <sup>2</sup> , PE 12 x 16 mm <sup>2</sup>	76 A	500 V	+/-	2 Nm	DIN rail/screw	40 x 140.5 x 40	0.254	25	6418677162947

The nominal currents in the table are for maximum cross-sections.



KNA5.108



KNA4.120NP



KNA4.206

## Ensto Clampo Ground, N and PE busbars in parts

Product code	Description	Nominal current	Tightening torque	Weight (kg)	Package size (pcs)	GTIN-13
<b>N and PE busbars in parts, saddle terminals</b>						
KN2.2	Cu 2 x (1.5–16 mm <sup>2</sup> )	82 A	1.2 Nm	0.019	250	6418677163050
KN2.3	Cu 3 x (1.5–16 mm <sup>2</sup> )	82 A	1.2 Nm	0.028	250	6418677163067
KN2.4	Cu 4 x (1.5–16 mm <sup>2</sup> )	82 A	1.2 Nm	0.035	200	6418677163074
KN2.5	Cu 5 x (1.5–16 mm <sup>2</sup> )	82 A	1.2 Nm	0.045	200	6418677163081
KN2.6	Cu 6 x (1.5–16 mm <sup>2</sup> )	82 A	1.2 Nm	0.052	200	6418677163098
KN2.7	Cu 7 x (1.5–16 mm <sup>2</sup> )	82 A	1.2 Nm	0.061	100	6418677163104
KN2.8	Cu 8 x (1.5–16 mm <sup>2</sup> )	82 A	1.2 Nm	0.070	100	6418677163111
PM58	Support for busbar KN2.x			0.003	2000	6418677163128



N and PE busbar in parts with saddle terminals, KN2.2.

## Terminal saddles

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
PPK28	Cu 1.5–25 mm <sup>2</sup>	0.002	100	6418677166853
PPK9	Cu 1.5–35 mm <sup>2</sup>	0.003	100	6418677166860
PPK2	Cu 6–70 mm <sup>2</sup>	0.009	100	6418677166877
PSS63	Cu 16–185 mm <sup>2</sup>	0.064	10	6418677182068



PPK9

## Pillar terminals

Product code	Description	Tightening torque	Screw head	Weight (kg)	Package size (pcs)	GTIN-13
KJ25	Cu 1–6 mm <sup>2</sup> , width 6 mm	0.8 Nm	+/-	0.004	1000	6418677163135
KJ25.1	Cu 1–6 mm <sup>2</sup> , with wire protection, width 6 mm	0.8 Nm	+/-	0.004	1000	6418677163142
KJ18	Cu 1.5–16 mm <sup>2</sup> , width 9 mm	2 Nm	+/-	0.007	1000	6418677163173
KJ18.1	Cu 1.5–16 mm <sup>2</sup> , with wire protection, width 9 mm	2 Nm	+/-	0.007	1000	6418677171505
KJ20	Cu 2.5–35 mm <sup>2</sup> , width 13 mm	4 Nm	PH2	0.011	1000	6418677163425
KJ20.1	Cu 2.5–35 mm <sup>2</sup> , width 13 mm, for hexagonal key	4 Nm	Hexagon 5 mm	0.012	1000	6418677163043



KJ25



KJ25.1



KJ20



KJ20.1

## Busbar supports

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
PMR117	Support for 2 x 10 mm busbar, marked N	0.005	100	6418677163180
PMR117.1	Support for 2 x 10 mm busbar, marked PE	0.005	100	6418677163197
PMR1413	Support for 2 x 10 mm busbar	0.002	100	6418677163203
PMR1427	Support for 2 x 10 mm busbar	0.002	100	6418677163531
KJ19	Support for two 2 x 10 mm busbars, with joint	0.023	100	6418677163234
KNL2	Protective cover support for RDP6, used together with PMR117	0.004	200	6418677163241
RDP6	Protective cover, length 2000 mm	0.247	10	6418677162626



Support for 2 x 10 mm busbar, PMR117.



## Busbars

2 x 10 mm brass busbars.

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
PSK20.037	Length 37 mm	0.006	100	6418677163296
PSK20.046	Length 46 mm	0.008	100	6418677163302
PSK20.055	Length 55 mm	0.009	100	6418677163319
PSK20.064	Length 64 mm	0.011	100	6418677163326
PSK20.073	Length 73 mm	0.012	100	6418677163333
PSK20.082	Length 82 mm	0.014	100	6418677163340
PSK20.100	Length 100 mm	0.017	100	6418677163364
PSK20.109	Length 109 mm	0.018	100	6418677163371
PSK20.118	Length 118 mm	0.020	100	6418677163388
PSK20.127	Length 127 mm	0.021	100	6418677163395
PSK20.136	Length 136 mm	0.023	100	6418677163401
PSK20.161	Length 161 mm	0.027	100	6418677163623
PSK20.175	Length 175 mm	0.029	100	6418677163630
PSK152	Length 1000 mm	0.171	10	6418677163418
PSK152.2	Length 2000 mm	0.341	10	6418677163722



PSK20.100

## Other accessories

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
PMR281	Support for 3 x 12 mm busbar	0.004	200	6418677163449
PSK131	Busbar, length 2000 mm, 3x12 mm, copper	0.630	10	6418677163456
PPK225	Earthing bar for connecting pillar terminal to mounting plate, height 24 mm	0.007	100	6418677163036



Support for 3 x 12 mm busbar, PMR281.



Busbar, copper, PSK131.



Earthing bar, PPK225.

## Conductors that can be used with the terminals: number, cross-section and type

See more details, conductor table, page 83.

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.														Nominal current (A)	Nominal insulation voltage (V)	Tightening torque (Nm)																
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150	185				240	300														
Ensto Clampo Tap tapping terminals																																		
Ensto Clampo Ground N and PE terminals																																		
KNA4.xx	Cu	See KJ25 and KJ18														82	500	0,8 (KJ25)/2 (KJ18)																
KN4.102...112	Cu	5	5	4	4	2	1																											
KNA5.xxx	Cu	See KJ25 and KJ18														82	500	0,8 (KJ25)/2 (KJ18)																
KN4.204...212	Cu	5	5	4	4	2	1																											
KN2.2...8	Cu	5	5	4	3	2	1	1																										
PPK28	Cu	5	5	4	3	2	1	1																										
PPK9	Cu	5	5	5	5	4	2	1	1	1																								
PPK2	Cu		5	5	5	5	5	3	2	1	1	1																						
PSS63	Cu							5	5	4	3	2	2	1	1	1	1																	
KJ25	Cu	5	3	2	2																													
KJ18	Cu	5	5	4	4	2	1																											
KJ20	Cu		5	5	5	4	2	1	1																									



# Ensto Clampo conductor table 1/2

## Conductors that can be used with the terminals: number, cross-section and type.

- Nominal cross-sections are in **bold type**.
- Often the requirements of a specific apparatus restrict the number of conductors.
- The nominal current of the terminal must not be exceeded.
- In general, the conductors connected to one conductor space of a connector must be of the same type.
- Table values require careful installation.
- After installation, check that all conductors are pressed into a connection.
- We recommend a ferrule when using a fine stranded conductor.
- Each incoming and outgoing protection conductor in a panel must have its own separate terminal.
- The conductor numbers below refer only to industrially-installed terminals (internal connections in a panel), (SGS Fimko).

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.														Nominal current (A)	Nominal insulation voltage (V)	Tightening torque (Nm)	
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150	185				240
<b>Ensto Clampo Pro universal terminals</b>																			
KE61	Al				1	1	1	1	1	<b>1</b>							145	800	4 (2.5–4 mm <sup>2</sup> )
	Cu		3	3	3	3	2	1	1	<b>1</b>							160		12 (6–50 mm <sup>2</sup> )
KE62	Al						1	1	1	1	1	<b>1</b>					220	800	20
	Cu						3	2	2	1	1	<b>1</b>					245		
KE63	Al								1	1	1	1	1	<b>1</b>			290	800	20 (35–95 mm <sup>2</sup> )
	Cu								3	2	1	1	1	<b>1</b>			320		30 (120–150 mm <sup>2</sup> )
KE64	Al								1	1	1	1	1	1	1	<b>1</b>	380	800	12 (35–70 mm <sup>2</sup> )
	Cu								3	3	2	1	1	1	1	<b>1</b>	425		45 (95–240 mm <sup>2</sup> )
KE66	Al				1	1	1	1	1	<b>1</b>							145	800	4 (2.5–4 mm <sup>2</sup> )
	Cu		3	3	3	3	2	1	1	<b>1</b>							160		12 (6–50 mm <sup>2</sup> )
KE67	Al						1	1	1	1	1	<b>1</b>					220	800	20
	Cu						3	2	2	1	1	<b>1</b>					245		
KE68	Al								1	1	1	1	1	<b>1</b>			290	800	20 (35–95 mm <sup>2</sup> )
	Cu								3	3	2	1	1	<b>1</b>			320		30 (120–150 mm <sup>2</sup> )
KE69	Al								1	1	1	1	1	1	1	<b>1</b>	380	800	12 (35–70 mm <sup>2</sup> )
	Cu								3	3	2	1	1	1	1	<b>1</b>	425		45 (95–240 mm <sup>2</sup> )
<b>Ensto Clampo Pro 1000 V terminals</b>																			
KE161	Al				1	1	1	1	1	<b>1</b>							145	1000	4 Nm (2.5–4 mm <sup>2</sup> )
	Cu		3	3	3	3	2	1	1	<b>1</b>							160		12 Nm (6–50 mm <sup>2</sup> )
KE162	Al						1	1	1	1	1	<b>1</b>					220	1000	20
	Cu						3	2	2	1	1	<b>1</b>					245		
KE163	Al								1	1	1	1	1	<b>1</b>			290	1000	30 Nm (120–150 mm <sup>2</sup> )
	Cu								3	2	1	1	1	<b>1</b>			320		20 Nm (35–95 mm <sup>2</sup> )
KE164	Al								1	1	1	1	1	1	1	<b>1</b>	380	1000	12 (35–70 mm <sup>2</sup> )
	Cu								3	3	2	1	1	1	1	<b>1</b>	425		45 (95–240 mm <sup>2</sup> )
<b>Ensto Clampo Apparatus equipment terminals</b>																			
KE12.12, KE12.20	Al				1	1	1	1	1	<b>1</b>							145		12
	Cu		1	1	1	1	1	1	1	<b>1</b>							160		
KE52.2	Al						1	1	1	1	1	<b>1</b>					270		14
	Cu						3	2	2	1	1	<b>1</b>							
KE53.2	Al								1	1	1	1	1	<b>1</b>			320		14 (35–95 mm <sup>2</sup> )
	Cu								3	2	1	1	1	<b>1</b>					24 (120–150 mm <sup>2</sup> )
KE54.2	Al								1	1	1	1	1	1	1	<b>1</b>	425		12 (35–70 mm <sup>2</sup> )
	Cu								3	3	2	1	1	1	1	<b>1</b>			40 (95–240 mm <sup>2</sup> )

# Ensto Clampo conductor table 2/2

## Conductors that can be used with the terminals: number, cross-section and type.

- › Nominal cross-sections are in **bold type**.
- › Often the requirements of a specific apparatus restrict the number of conductors.
- › The nominal current of the terminal must not be exceeded.
- › In general, the conductors connected to one conductor space of a connector must be of the same type.
- › Table values require careful installation.
- › After installation, check that all conductors are pressed into a connection.
- › We recommend a ferrule when using a fine stranded conductor.
- › Each incoming and outgoing protection conductor in a panel must have its own separate terminal.
- › The conductor numbers below refer only to industrially-installed terminals (internal connections in a panel), (SGS Fimko).

Product code	Wire type	Cross-sections of conductors (mm <sup>2</sup> ) and number of conductors/space. The conductor numbers below refer only to industrially-installed terminals.														Nominal current (A)	Nominal insulation voltage (V)	Tightening torque (Nm)		
		1.5	2.5	4	6	10	16	25	35	50	70	95	120	150	185				240	300
<b>Ensto Clampo Tap tapping terminals</b>																				
KF7.70	Cu					7	7	6	4	4	2	<b>2</b>	1					192	750	4
KF8.70	Cu					7	7	6	4	4	2	<b>2</b>	1					192	750	4
<b>Ensto Clampo Compact terminal blocks</b>																				
KR5031/5121	Cu	<b>1</b>																17.5	450	0.4
KR8031...8121	Cu	3	2	1	<b>1</b>													41	450	0.8
KR10021/10031	Cu				1	1	<b>1</b>											82	500	2.5
<b>Ensto Clampo Eurostrips</b>																				
KA / KB16.12	Cu	<b>1</b>																15	450	0.3 - 0.5
KA / KB17.12	Cu	<b>1</b>																15	450	0.3 - 0.5
KA / KB241.12	Cu	1	1	<b>1</b>														30	450	0.4 - 0.6
KA / KB242.12	Cu	1	1	<b>1</b>														30	450	0.4 - 0.6
KA / KB460.12	Cu		1	1	<b>1</b>													40	450	0.6 - 0.8
KA / KB463.12	Cu		1	1	<b>1</b>													40	450	0.6 - 0.8
KA / KB612.12	Cu				1	1	<b>1</b>											65	750	1.8 - 2.0
<b>Ensto Clampo Wire connectors</b>																				
AL1.12	Cu	4	<b>3</b>															24	450	0.8 - 1.0
AL2.12	Cu		4	3	<b>2</b>													41	450	1.8 - 2.0
AL13	Cu			4	3	2	<b>2</b>											76	450	2.5 - 2.7
KD160.01	Cu	3	<b>2</b>	1														24	450	1.2 - 1.4
KD160.12	Cu	3	<b>2</b>	1														24	450	1.2 - 1.4
<b>Ensto Clampo Ground N and PE terminals</b>																				
KNA4.xx	Cu	See KJ25 and KJ18														82	500	0.8 (KJ25)/2 (KJ18)		
KN4.102...112	Cu	5	5	4	4	2	<b>1</b>											82	500	2
KNA5.xxx	Cu	See KJ25 and KJ18														82	500	0.8 (KJ25)/2 (KJ18)		
KN4.204...212	Cu	5	5	4	4	2	<b>1</b>											76	500	2
KN2.2...8	Cu	5	5	4	3	2	<b>1</b>	1										82		1.2
PPK28	Cu	5	5	4	3	2	<b>1</b>	1										82		
PPK9	Cu	5	5	5	5	4	2	1	<b>1</b>	1								135		
PPK2	Cu		5	5	5	5	5	3	2	1	<b>1</b>	1						270		
PSS63	Cu					5	5	4	3	2	2	1	1	<b>1</b>	1			535		
KJ25	Cu	5	3	2	<b>2</b>													33		0.8
KJ18	Cu	5	5	4	4	2	<b>1</b>											82		2
KJ20	Cu		5	5	5	4	2	1	<b>1</b>									135		4





## Load break switches

Our range of load break switches consists of three-pole switch disconnectors, additional poles and accessories. The switches are certified according to EN 60947-3.

### BENEFITS:

- › Combined switch and disconnector
- › Designed and tested to work as a disconnector
- › Load break switch for demanding use
- › Suitable for overvoltage category IV

# Ensto Compact switch disconnectors

## Rotary switches from 16 A to 125 A



### Ensto Compact switch disconnectors in brief:

- The frame of the 16 – 63 A switches is only two modules wide, 63 A – 125 A with a width of three modules
- The series also includes:
  - Direct door mounted switches
  - Switches with factory-mounted neutral pole
- Wide range of accessories available (including e.g. 4th pole, switched neutral pole, auxiliary contact, handle, changeover mechanism)
- Compact in size
- Advanced design with two frame sizes
- Handle padlockable in 0-position

Conformity	
Standards	
EN 60947-3	
Technical information	
Nominal current range:	16 – 125 A
Cross-section range:	Cu 1.5 – 50 mm <sup>2</sup>
Rated insulation voltage:	800 V
Mechanical features	
Screw head:	+/-
Mounting:	Screws or DIN rail

### Ensto Compact switch disconnectors, three-pole, panel and DIN rail mounted

Product code	Amperage	Conductor cross-section	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
<b>Three-pole with direct handle</b>								
KS3.16	3 x 16 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677171345
KS3.20	3 x 20 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677171352
KS3.25	3 x 25 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677170003
KS3.32	3 x 32 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677171420
KS3.40	3 x 40 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677170010
KS3.63	3 x 63 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677170027
KSM3.63	3 x 63 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 80	0.266	50	6418677169748
KSM3.80	3 x 80 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 80	0.266	50	6418677169755
KSM3.100	3 x 100 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 80	0.266	50	6418677169762
KSM3.125	3 x 125 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 80	0.266	50	6418677169779
<b>Three-pole, yellow with red handle</b>								
KS3.16RY	3 x 16 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677171444
KS3.20RY	3 x 20 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677171451
KS3.25RY	3 x 25 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677171468
KS3.32RY	3 x 32 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677171475
KS3.40RY	3 x 40 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677171482
KS3.63RY	3 x 63 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0.133	50	6418677171499
KSM3.63RY	3 x 63 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 80	0.266	50	6418677169847
KSM3.80RY	3 x 80 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 80	0.266	50	6418677169854
KSM3.100RY	3 x 100 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 80	0.266	50	6418677169861
KSM3.125RY	3 x 125 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 80	0.266	50	6418677169878
<b>Three-pole without handle</b>								
KS31.16	3 x 16 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 70	0.129	50	6418677171284
KS31.20	3 x 20 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 70	0.129	50	6418677171291
KS31.25	3 x 25 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 70	0.129	50	6418677171307
KS31.32	3 x 32 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 70	0.129	50	6418677171314
KS31.40	3 x 40 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 70	0.129	50	6418677171321
KS31.63	3 x 63 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 70	0.129	50	6418677171338
KSM31.63	3 x 63 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 70	0.260	50	6418677169700
KSM31.80	3 x 80 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 70	0.260	50	6418677169717
KSM31.100	3 x 100 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 70	0.260	50	6418677169724
KSM31.125	3 x 125 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	52 x 100 x 70	0.260	50	6418677169731



KSM3.63



KS3.16RY



KSM31.63

### Ensto Compact switch disconnectors, three-pole with factory-mounted switched neutral pole and handle

Product code	Amperage	Conductor cross-section	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
KS3.40N	3 x 40 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	49 x 81 x 76	0.177	50	6438100099343
KS3.63N	3 x 63 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	49 x 81 x 76	0.177	50	6438100099350
KSM3.80N	3 x 80 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	70 x 100 x 80	0.362	50	6438100099381
KSM3.100N	3 x 100 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	70 x 100 x 80	0.362	50	6438100099398



KS3.40N



## Ensto Compact switch disconnectors, three-pole, panel and DIN rail mounted with pre-assembled conductors

Product code	Amperage (A)	Conductor cross-section (mm <sup>2</sup> )	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
KS3.25C	3 x 25 A	Cu 1,5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0,175	50	-
KS3.40C	3 x 40 A	Cu 1,5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	36 x 81 x 76	0,175	50	-

NEW



## Ensto Compact switch disconnectors, fourth pole

Product code	Amperage (A)	Conductor cross-section (mm <sup>2</sup> )	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
KS1.16	16 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.046	50	6418677171253
KS1.20	20 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.046	50	6418677171260
KS1.25	25 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.046	50	6418677170065
KS1.32	32 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.046	50	6418677171277
KS1.40	40 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.046	50	6418677170072
KS1.63	63 A	Cu 1.5–16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.046	50	6418677170089
KSM1.63	63 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	17.5 x 83 x 62	0.095	50	6418677169786
KSM1.80	80 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	17.5 x 83 x 62	0.095	50	6418677169793
KSM1.100	100 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	17.5 x 83 x 62	0.095	50	6418677169809
KSM1.125	125 A	Cu 10–50 mm <sup>2</sup>	4 Nm	Din rail/screw	17.5 x 83 x 62	0.095	50	6418677169816

KS3.40C



KS1.63

## Additional poles

Product code	Description	Amperage (A)	Tightening torque (Nm)	Weight (kg)	Package size (pcs)	GTIN-13
<b>Switched neutral poles</b>						
KS1N	For KS3- and KS31 switches	Max. 63 A	2 Nm	0.046	50	6438100094300
KSM1N	For KSM switch	Max. 125 A	4 Nm	0.095	50	6438100094324
<b>Fixed neutral poles</b>						
KSN1	For KS3- and KS31 switches	Max. 63 A	2 Nm	0.042	50	6418677170126
KSMN1	For KSM switch	Max. 125 A	4 Nm	0.087	50	6418677169823
<b>Fixed PE poles</b>						
KSP1	For KS3- and KS31 switches	Max. 63 A	2 Nm	0.042	50	6418677170140
KSMP1	For KSM switch	Max. 125 A	4 Nm	0.087	50	6418677169830
<b>Standard auxiliary contact</b>						
KSA1	NO+NC auxiliary contact 16 A for 16–125 A switches	16 A	2 Nm	0.051	50	6418677170164



Switched neutral pole, KS1N.



Fixed neutral pole, KSN1.



Fixed PE pole KSP1.



Standard auxiliary contact, KSA1.

## Handles

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
<b>Direct handles</b>				
PMR241B	Direct handle for KS switch	0.005	100	6418677171437
PMR301B	Direct handle for KSM switch	0.006	100	6418677169915
<b>External handles</b>				
KSH48	Padlockable, IP65, yellow with red handle, 0 OFF1 ON	0.043	100	6418677170195
KSH48.01	Padlockable, IP65, black, 0 OFF1 ON	0.043	100	6418677170201



Small direct handle for KS switch, PMR241B.



External handle, padlockable, KSH48.



External handle, padlockable, KSH48.01.

## Extension shafts

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
KS23.055	55 mm for KSH29, KSH48 and KSH75 handles	0.014	100	6418677170232
KS23.070	70 mm for KSH29, KSH48 and KSH75 handles	0.017	100	6418677170249
KS23.090	90 mm for KSH29, KSH48 and KSH75 handles	0.021	100	6418677170256
KS23.150	150 mm for KSH29, KSH48 and KSH75 handles	0.032	100	6418677170263
KS23.200	200 mm for KSH29, KSH48 and KSH75 handles	0.042	100	6418677170270
KS23.300	300 mm for KSH29, KSH48 and KSH75 handles	0.061	100	6418677170287



KS23.055

## Other accessories

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
PMR121	Terminal shroud for KS1 and KS11 poles	0.004	100	6418677171598
PMR123	Terminal shroud for KS3, KS31 and KS13 switch	0.008	100	6418677171604
PMR111	Terminal shroud for KSM1 pole	0.006	100	6418677171611
PMR113	Terminal shroud for KSM3 and KSM31 switch	0.013	100	6418677171628
KK66	Parallel mechanism for mounting two switches to work simultaneously	0.078	1	6418677171642
KK102.712	Changeover kit incl. shafts and black handle	0.234	20	6418677169922
KK102.7RY12	Changeover kit incl. shafts and red/yellow handle	0.234	20	6418677169939



Terminal shroud for KS1 and KS11 poles, PMR121.



Terminal shroud for KS3, KS31 and KS13 switch, PMR123.

Parallel mechanism, KK66.

Changeover kit, KK102.712.

## Ensto Compact switch disconnectors, three-pole, direct door mounted

Product code	Amperage	Conductor cross-section	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
KS13.16	3 x 16 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	39.4 x 80 x 72	0.149	50	6418677171161
KS13.20	3 x 20 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	39.4 x 80 x 72	0.149	50	6418677171178
KS13.25	3 x 25 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	39.4 x 80 x 72	0.149	50	6418677170034
KS13.32	3 x 32 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	39.4 x 80 x 72	0.149	50	6418677171246
KS13.40	3 x 40 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	39.4 x 80 x 72	0.149	50	6418677170041
KS13.63	3 x 63 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.149	50	6418677170058



KS13.16

## Ensto Compact switch disconnectors, fourth pole

Product code	Amperage	Conductor cross-section	Tightening torque	Mounting	Dimensions W x L x H (mm)	Weight (kg)	Package size (pcs)	GTIN-13
KS11.16	16 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.045	50	6418677171130
KS11.20	20 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.045	50	6418677171147
KS11.25	25 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.045	50	6418677170096
KS11.32	32 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.045	50	6418677171154
KS11.40	40 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.045	50	6418677170102
KS11.63	63 A	Cu 1.5-16 mm <sup>2</sup>	2 Nm	Din rail/screw	13 x 71.5 x 55.3	0.045	50	6418677170119



KS11.16

## Accessories

Product code	Description	Amperage	Tightening torque	Weight (kg)	Package size (pcs)	GTIN-13
<b>Additional poles</b>						
KS11N	Switched neutral pole	Max. 63 A	2 Nm	0.046	50	6438100094317
KSN11	Fixed neutral pole	Max. 63 A	2 Nm	0.042	50	6418677170133
KSP11	Fixed PE pole	Max. 63 A	2 Nm	0.042	50	6418677170157
KSA11	NO+NC auxiliary contact	16 A	2 Nm	0.051	50	6418677170171
<b>Handles</b>						
KSH48	Padlockable, IP65, yellow with red handle, 0 OFF/1 ON			0.043	100	6418677170195
KSH48.01	Padlockable, IP65, black, 0 OFF/1 ON			0.043	100	6418677170201
<b>Terminal shrouds</b>						
PMR121	Terminal shroud for KS1 and KS11 poles			0.004	100	6418677171598
PMR123	Terminal shroud for KS3, KS31 and KS13 switch			0.008	100	6418677171604



KSH48.01

# Electrical and mechanical characteristics

According to EN 60947-3

		3-pole		KS3.16	KS3.20	KS3.25	KS3.32	KS3.40	KS3.40N	KS3.63	KS3.63N	
		KS31.16	KS31.20	KS31.25	KS31.32	KS31.40		KS31.63				
		4th pole		KS1.16	KS1.20	KS1.25	KS1.32	KS1.40		KS1.63		KS1N
		KS11.16	KS11.20	KS11.25	KS11.32	KS11.40				KS11.63		KS11N
Conventional free air thermal current $I_{th}$	A	16	20	25	32	40	40	40	63	63	63	
Rated insulation voltage $U_j$	V	800	800	800	800	800	800	800	800	800	800	800
Rated impulse withstand voltage $U_{jimp}$	kV	8	8	8	8	8	6	8	6	6	6	
Rated operational current $I_e$	415V	A	16	20	25	32	40	40	63	63	63	
	AC 21 A	500V	A	16	20	25	32	40	40	63	63	63
	690V	A	16	20	25	32	40	40	63	63	63	
AC 22 A	415V	A	16	20	25	32	40	40	63	63	63	
		500V	A	16	20	25	32	40	40	63	63	63
		690V	A	16	20	25	32	40	40	63	63	63
AC 23 A	415V	A	16	20	25	32	40	40	63	63	63	
		500V	A	16	20	25	32	40	40	40	40	40
		690V	A	16	20	25	25	25	25	25	25	25
Rated operational power $P_e$	415V	kW	7.5	7.5	11	15	18.5	18.5	30	30	30	
	AC 23 A	500V	kW	7.5	11	15	18.5	22	22	22	22	22
	(for standard motor)	690V	kW	11	15	22	22	22	22	22	22	22
Short-circuit characteristics (415 VAC)												
Rated short-time withstand current, $1s, I_{cw}$	Arms	1260	1260	1260	1260	1260	1260	1260	1260	1260	1260	1260
Rated conditional short-circuit current	kArms	50	50	50	50	50	50	50	20/50	20/50	20/50	20/50
Max. fuse (gG)	A	16	20	25	32	40	40	40	63/40	63/40	63/40	63/40
Max. cut-off current	kApeak	6	6	6	6	6	6	6	6/6	6/6	6/6	6/6
Max. Joule integral	kA2s	6.8	6.8	6.8	6.8	6.8	6.8	6.8	15/6.8	15/6.8	15/6.8	15/6.8
Making and breaking characteristics												
Making capacity	415V AC 23 A	A	160	200	250	320	400	400	630	630	630	630
Breaking capacity	415V AC 23 A	A	128	160	200	256	320	320	504	504	504	504
Endurance (number of operations)												
Mechanical			100 000	100 000	100 000	100 000	100 000	100 000	100 000	100 000	100 000	100 000
Electrical			3 000	3 000	3 000	3 000	3 000	3 000	3 000	3 000	3 000	3 000
Terminals (Cu)	mm <sup>2</sup>	1.5-16	1.5-16	1.5-16	1.5-16	1.5-16	1.5-16	1.5-16	1.5-16	1.5-16	1.5-16	1.5-16
Tightening torque	Nm	2	2	2	2	2	2	2	2	2	2	2

		3-pole		KSM3.63	KSM3.80	KSM3.80N	KSM3.100	KSM3.100N		KSM3.125	KSM3.125	
		KSM31.63	KSM31.80		KSM31.100							
		4th pole		KSM1.63	KSM1.80		KSM1.100		KSM1N	KSM1.125		
Conventional free air thermal current $I_{th}$	A	63	80	80	100	100	100	100	100	125		
Rated insulation voltage $U_j$	V	800	800	800	800	800	800	800	800	800	800	
Rated impulse withstand voltage $U_{jimp}$	kV	8	8	6	8	6	8	6	6	8		
Rated operational current $I_e$	415V	A	63	80	80	100	100	100	100	125		
	AC 21 A	500V	A	63	80	80	100	100	100	125		
	690V	A	63	80	80	100	100	100	100	125		
AC 22 A	415V	A	63	80	80	100	100	100	100	125		
		500V	A	63	80	80	100	100	100	125		
		690V	A	63	80	80	100	100	100	100	125	
AC 23 A	415V	A	63	80	80	80	80	80	80	80	80	
		500V	A	63	63	63	63	63	63	63	63	
		690V	A	50	50	50	50	50	50	50	50	
Rated operational power $P_e$	415V	kW	30	45	45	45	45	45	45	45	45	
	AC 23 A	500V	kW	37	37	37	37	37	37	37	37	
	(for standard motor)	690V	kW	45	45	45	45	45	45	45	45	
Short-circuit characteristics (415 VAC)												
Rated short-time withstand current, $1s, I_{cw}$	Arms	1500	1500	1500	1500	1500	1500	1500	1500	1500	1500	
Rated conditional short-circuit current	kArms	25	25	25	25	25	25	25	25	11	11	
Max. fuse (gG)	A	63	80	80	100	100	100	100	100	125	125	
Max. cut-off current	kApeak	9	9	9	9	9	9	9	9	9	9	
Max. Joule integral	kA2s	49.8	49.8	49.8	49.8	49.8	49.8	49.8	49.8	49.8	83	
Making and breaking characteristics												
Making capacity	415V AC 23 A	A	630	800	800	800	800	800	800	800	800	
Breaking capacity	415V AC 23 A	A	504	640	640	640	640	640	640	640	640	
Endurance (number of operations)												
Mechanical			30 000	30 000	30 000	30 000	30 000	30 000	30 000	30 000	30 000	
Electrical			1 500	1 500	1 500	1 500	1 500	1 500	1 500	1 500	1 500	
Terminals (Cu)	mm <sup>2</sup>	10-50	10-50	10-50	10-50	10-50	10-50	10-50	10-50	10-50	10-50	
Tightening torque	Nm	4	4	4	4	4	4	4	4	4	4	



# Fuse bases

Our range of fuse bases covers ceramic single fuse bases and fuse blocks suitable for D-type (Diazed) fuses of sizes DII and DIII. The fuse bases are certified according to standards EN 60269-1 and HD 60269-3.

## **BENEFITS:**

- › High breaking capacity
- › Reliable isolation
- › Flexibility
- › Good selectivity



# Fuse bases

## 25 A and 63 A



### Fuse bases in brief:

- Particularly used in industrial panel building
- The range includes:
  - Traditional ceramic single fuse bases with a 50 kA short-circuit rating
  - Fuse blocks of up to eight fuse bases
- For Diazed fuses of sizes DII (max. 25 A) and DIII (max. 63 A)
- The series includes a range of accessories, such as covers and DIN rail clips

### Technical features:

- High quality materials with a long lifetime
- Reliable structure with simplistic design
- Many versions with different positions for connection points
- Versions suitable for aluminium conductors

### Conformity



### Standards

All fuse bases:	EN 60269-1 HD 60269-3
-----------------	--------------------------

### Technical information

Nominal current range:	25 A and 63 A
Nominal insulation voltage:	500 V

### Material

Housing:	Porcelain
Body:	Ni-coated brass

### Mechanical features

Screw head:	+/-
Mounting:	Screws or DIN rail

### Single fuse bases

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
<b>Single fuse bases, 25 A</b>				
KVC1.1	1 x 25 A	0.092	140	6418677160776
KVC1.2	1 x 25 A	0.092	140	6418677160783
KVC30	1 x 25 A fuse base with cover	0.126	50	6418677160790
KV25.1	1 x 25 A	0.101	140	6418677160875
KV25.2	1 x 25 A	0.096	140	6418677160882
KV25.211	1 x 25 A	0.102	100	6418677160905
KV25.291	1 x 25 A	0.100	100	6418677160899
<b>Single fuse bases, 63 A</b>				
KV63.1	1 x 63 A	0.160	100	6418677160912
KV63.2	1 x 63 A	0.160	100	6418677160929
KV63.211	1 x 63 A	0.156	75	6418677160936
KV63.291	1 x 63 A	0.158	75	6418677160943
<b>Single fuse bases with DIN rail fixing</b>				
KVC1.7	1 x 25 A, with DIN rail fixing	0.100	100	6418677160950
KV63.7	1 x 63 A, with DIN rail fixing	0.168	100	6418677160967
<b>Single fuse bases with Al/Cu terminal</b>				
KVC1.5	1 x 25 A, with Al/Cu terminal, max. Al 50 mm <sup>2</sup> , Cu 35 mm <sup>2</sup>	0.102	50	6418677160974
KVC1.57	1 x 25 A, with DIN rail fixing and Al/Cu terminal, max. Al 50 mm <sup>2</sup> , Cu 35 mm <sup>2</sup>	0.114	50	6418677160981
KV63.5	1 x 63 A, with Al/Cu terminal, max. Al 50 mm <sup>2</sup> , Cu 35 mm <sup>2</sup>	0.172	100	6418677160998
KV63.57	1 x 63 A, with DIN rail fixing and Al/Cu terminal, max. Al 50 mm <sup>2</sup> , Cu 35 mm <sup>2</sup>	0.172	100	6418677161001



KV63.2



KV63.57



KVC1.1



KVC1.2



KV25.1



KV25.2



KV25.291



KV25.211



KV63.1



KV63.2



KV63.211



KV63.291

## Fuse blocks

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
<b>Fuse blocks, 25 A</b>				
KVC421	2 x 25 A	0.185	70	6418677160806
KVC431	3 x 25 A	0.280	50	6418677160813
KVC441	4 x 25 A	0.360	35	6418677160820
KVC451	5 x 25 A	0.456	25	6418677160837
KVC461	6 x 25 A	0.544	25	6418677160844
KVC471	7 x 25 A	0.648	20	6418677160851
KVC481	8 x 25 A	0.726	20	6418677160868
<b>Fuse blocks, 63 A</b>				
KV63.421	2 x 63 A	0.306	50	6418677161018
KV63.431	3 x 63 A	0.480	35	6418677161025
KV63.441	4 x 63 A	0.645	24	6418677161032
KV63.451	5 x 63 A	0.796	24	6418677161049
KV63.461	6 x 63 A	0.950	15	6418677161056
<b>Fuse blocks with DIN rail fixing</b>				
KV63.721	2 x 63 A, with DIN rail fixing	0.320	50	6418677181016
KV63.731	3 x 63 A, with DIN rail fixing	0.481	35	6418677181023
KV63.741	4 x 63 A, with DIN rail fixing	0.655	24	6418677181030
KV63.751	5 x 63 A, with DIN rail fixing	0.809	24	6418677181047
KV63.761	6 x 63 A, with DIN rail fixing	0.970	15	6418677181054



KVC461

## Porcelain rings

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
<b>Porcelain rings</b>				
PR2.25	For 25 A fuse base with slot	0.024	480	6418677161223
PR4.63	For 63 A fuse base with slot	0.038	280	6418677161247
<b>Fixing springs</b>				
PJ3.25	For ring PR2.25	0.002	500	6418677161254
PJ4.63	For ring PR4.63	0.002	500	6418677161261



Porcelain ring with slot, PR4.63.

## Protective covers

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
PMR450	50 x 45 mm, for KVC fuse blocks	0.012	500	6418677161285
PMR450.1	52.5 x 45 mm, for KVC single fuse bases	0.013	500	6418677161292
PMR450.3	150 x 45 mm, for KVC fuse blocks	0.034	100	6418677161308
PMR595	52.5 x 45 mm, for 63 A single fuse bases	0.011	500	6418677161315
PMR595.1	60 x 45 mm, for 63 A fuse blocks	0.011	500	6418677161322
PMR597	For 25 A, KVC1.x single fuse bases	0.024	100	6418677161339
PMR77	For 63 A, KV single fuse bases	0.042	50	6418677161346
PMR2	Cover for the Al/Cu terminal	0.005	10	6418677170386



Protective cover for fuse blocks, PMR450.3.

## Other accessories

Product code	Description	Weight (kg)	Package size (pcs)	GTIN-13
<b>DIN rail fixings</b>				
KW2	Metallic spring	0.006	100	6418677161360
PMR447	Plastic snap-on device, for KVC fuse bases and blocks	0.004	500	6418677161377
PMR824	Plastic snap-on device, KW21 without screw	0.004	500	6418677161391
<b>Sealing covers</b>				
KW20	Sealing cover, for sealing 25 A bases	0.025	50	6418677161469
PMR11	Sealing cover for MCB, 1-pole	0.006	200	6418677161278



DIN rail fixing, metallic spring, KW2.



Sealing cover, KW20.



# Circuit breakers and residual current circuit breakers

Circuit protection and fault circuit breakers, as well as fault power cable protectors, are easy to identify owing to their colored levers.



## Circuit breakers with screw terminals

Product code	Description	Dimensions W x L x H	GTIN
EEB61.06	Circuit breaker, 1-pole, 6kA, B6	18x85x75	6418677658600
EEB61.10	Circuit breaker, 1-pole, 6kA, B10	18x85x75	6418677658617
EEB61.16	Circuit breaker, 1-pole, 6kA, B16	18x85x75	6418677658624
EEB61.20	Circuit breaker, 1-pole, 6kA, B20	18x85x75	6418677658631
EEB61.25	Circuit breaker, 1-pole, 6kA, B25	18x85x75	6418677658648
EEC61.10	Circuit breaker, 1-pole, 6kA, C10	18x85x75	6418677658655
EEC61.16	Circuit breaker, 1-pole, C16	18x85x75	6418677658679
EEC61.20	Circuit breaker, 1-pole, 6kA, C20	18x85x75	6418677658686
EEC61.25	Circuit breaker, 1-pole, 6kA, C25	18x85x75	6418677658693



EEB61.06



EEC61.10



EEB61.16



EEB61.25



EEC61.20



EEC61.25

## Circuit breakers with spring connectors

Product code	Description	Dimensions W x L x H	GTIN
EEC101.10j	Circuit breaker, 1-pole 10kA, C10, with spring connectors	18x89x75	6418677658730
EEC101.16j	Circuit breaker, 1-pole 10kA, C16, with spring connectors	18x89x75	6418677658747
EEB101.10j	Circuit breaker, 1-pole 10kA, B10, with spring connectors	18x89x75	6418677658716
EEB101.16j	Circuit breaker, 1-pole 10kA, B16, with spring connectors	18x89x75	6418677658723



EEC101.16j

## Residual current circuit breakers with screw connectors, type A

Product code	Description	Dimensions W x L x H	GTIN
EEV240.30-A	Residual current circuit breaker, 2-pole 40A, 30mA	36x85x75	6418677658976
EEV440.30-A	Residual current circuit breaker, 4-pole 40A, 30mA	70x85x75	6418677658983
ESL7.01	N-connector for residual current circuit breaker, 4 x 6 mm <sup>2</sup>	-	6418677660801



EEV440.30-A

## Fault current cable protectors with screw connectors, Type A

Product code	Description	Dimensions W x L x H	GTIN
EEC210.30-A	Circuit breaker with residual current circuit breaker, 2-pole, C10, 30mA	36x85x75	6418677658952
EEC216.30-A	Circuit breaker with residual current circuit breaker, 2-pole, C16 30mA	36x85x75	6418677658969



EEC210.30-A

## Connecting rails for circuit breakers

Product code	Description	Dimensions W x L x H	GTIN
PPK150.08	1-phase connector for 8 circuit breakers	140x19x16	6418677663031
PPK363.06	3-phase connector for 6 circuit breakers	105x28x10	6418677663154
PPK363.09	3-phase connector for 9 circuit breakers	159x28x10	6418677668289



PPK150.08

## Accessories

Product code	Description	Dimensions W x L x H	GTIN
ESL4.05	Locking cover for 24 circuit breakers for Walteri distribution boards	57x460x15	6418677675850
ST1	Locking device for circuit breakers, 1 pc	25x7x18	6418677167546
ST1T	Locking device for circuit breakers, 10 pcs	25x7x18	6418677167799

## Surge protector

Product code	Description	Dimensions W x L x H	GTIN
EVL2.23	Surge protector T2 class, socket + plugs + conductors	54x90x66	6418677628801



EVL2.23

## Installations pipe accessories for flush-mounted boxes

Product code	Hole ø	Description	GTIN
PMR20	20.5	M20 pipe with AJ20 extension and M16 tube pipe the gland	6418677163654
PMR900.1	20.5	M20 for pipe AJ 20 with extension	6418677163593
PMR901.1	25.5	M25 for pipe AJ 25 with extension	6418677163609
PMR902.1	32.5	M32 for pipe AJ 32 with extension	6418677163616



PMR901.1, PMR902.1

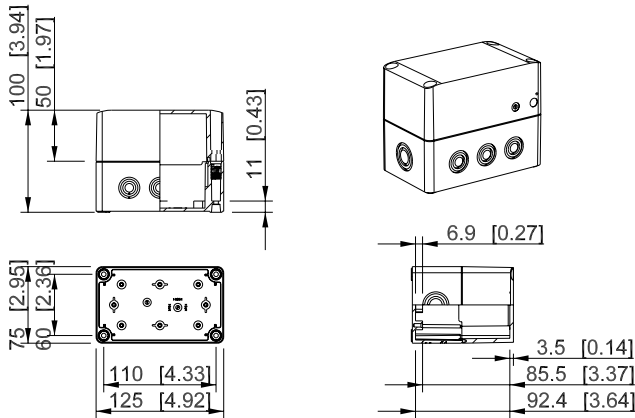
# Dimensional drawings



# Dimensional drawings, Ensto Cubo S

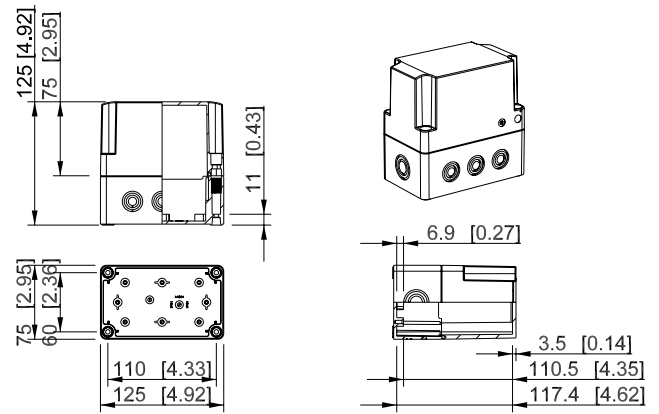
Dimensions in mm [inches]

## Ensto Cubo S 75 x 125 x 100 mm



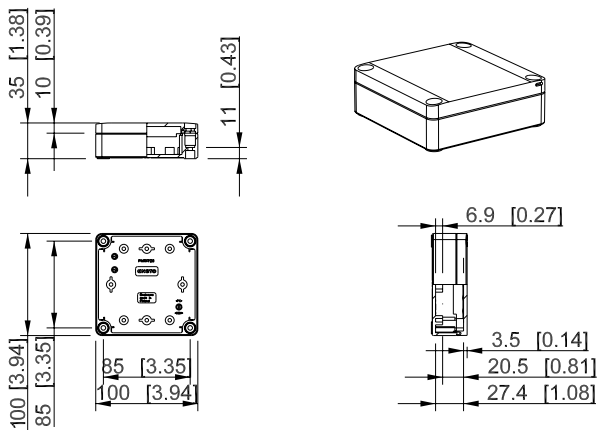
Grey cover	Transparent cover	Description
SPCP081310G	SPCP081310T	Plain sides, polycarbonate
SABP081310G	SABP081310T	Plain sides, ABS
SPCM081310G	SPCM081310T	2 x M16/25 + 6 x M12/20, PC
SPCK081310G	SPCK081310T	2 x Pk9/13,5 + 6 x Pk9/13,5, PC

## Ensto Cubo S 75 x 125 x 125 mm



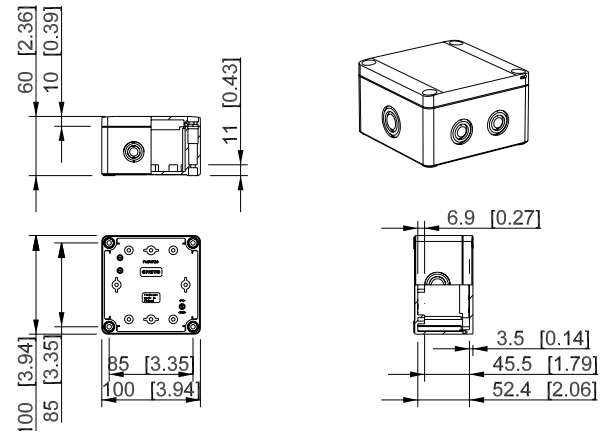
Grey cover	Transparent cover	Description
SPCP081313G	SPCP081313T	Plain sides, polycarbonate
SABP081313G	SABP081313T	Plain sides, ABS
SPCM081313G	SPCM081313T	2 x M16/25 + 6 x M12/20, PC
SPCK081313G	SPCK081313T	2 x Pk9/13,5 + 6 x Pk9/13,5, PC

## Ensto Cubo S 100 x 100 x 35 mm



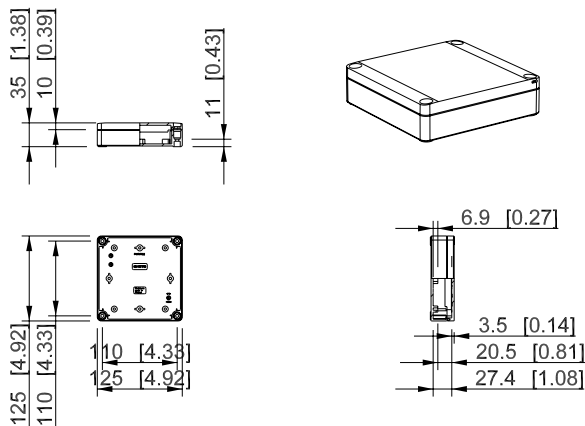
Grey cover	Transparent cover	Description
SPCP101004LG	SPCP101004LT	Plain sides, polycarbonate
SABP101004LG	SABP101004LT	Plain sides, ABS

## Ensto Cubo S 100 x 100 x 60 mm



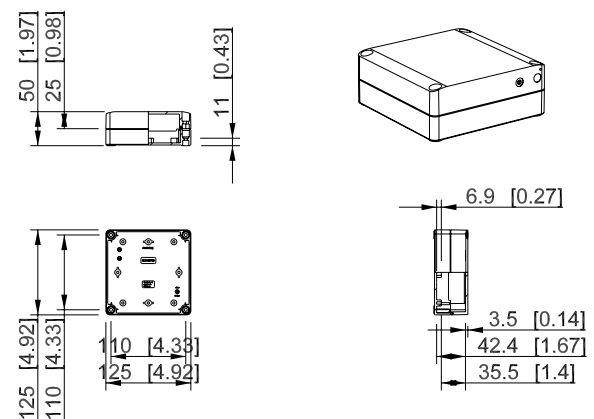
Grey cover	Transparent cover	Description
SPCP101006G	SPCP101006T	Plain sides, polycarbonate
SABP101006G	SABP101006T	Plain sides, ABS
SPCM101006G	SPCM101006T	2 x M16/25 + 4 x M12/20, PC

## Ensto Cubo S 125 x 125 x 35 mm



Grey cover	Transparent cover	Description
SPCP131304LG	SPCP131304LT	Plain sides, polycarbonate
SABP131304LG	SABP131304LT	Plain sides, ABS

## Ensto Cubo S 125 x 125 x 50 mm

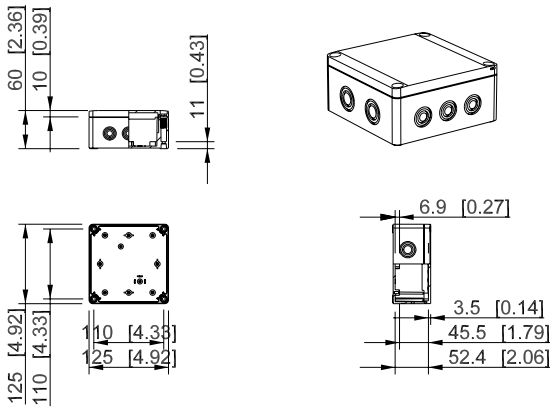


Grey cover	Transparent cover	Description
SPCP131305LG	SPCP131305LT	Plain sides, polycarbonate
SABP131305LG	SABP131305LT	Plain sides, ABS

# Dimensional drawings, Ensto Cubo S

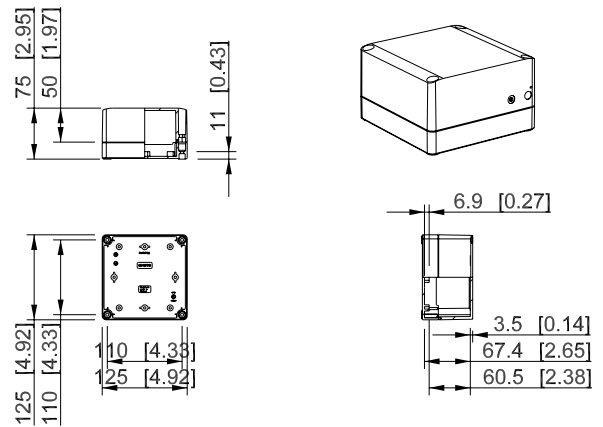
Dimensions in mm [inches]

## Ensto Cubo S 125 x 125 x 60 mm



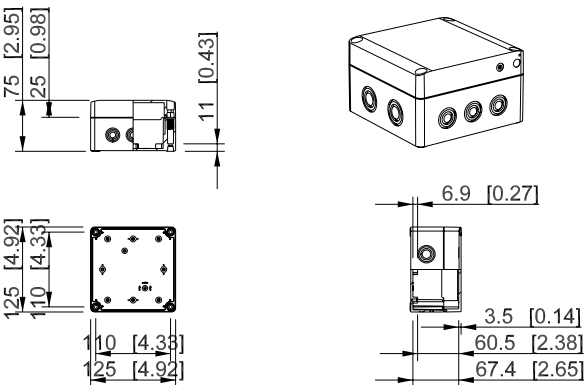
Grey cover	Transparent cover	Description
SPCP131306G	SPCP131306T	Plain sides, polycarbonate
SABP131306G	SABP131306T	Plain sides, ABS
SPCM131306G	SPCM131306T	4 x M16/25 + 6 x M12/20, PC
SPCK131306G	SPCK131306T	4 x Pk16/21 + 6 x Pk9/13,5, PC

## Ensto Cubo S 125 x 125 x 75 mm



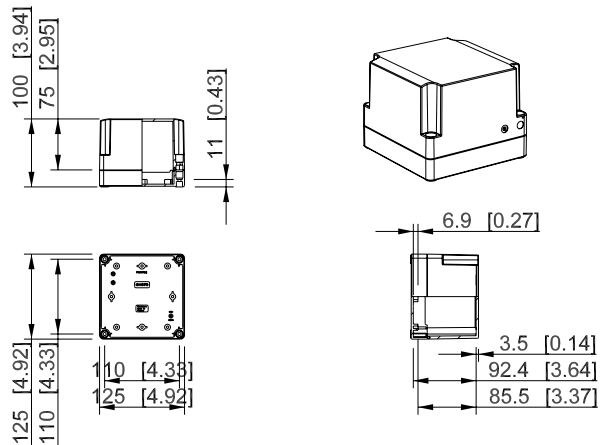
Grey cover	Transparent cover	Description
SPCP131308LG	SPCP131308LT	Plain sides, polycarbonate
SABP131308LG	SABP131308LT	Plain sides, ABS

## Ensto Cubo S 125 x 125 x 75 mm



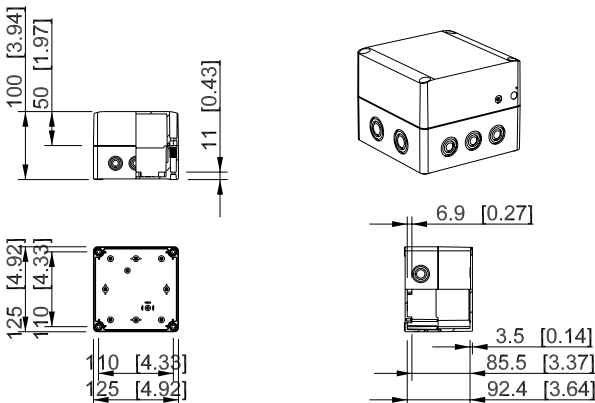
Grey cover	Transparent cover	Description
SPCP131308G	SPCP131308T	Plain sides, polycarbonate
SABP131308G	SABP131308T	Plain sides, ABS
SPCM131308G	SPCM131308T	4 x M16/25 + 6 x M12/20, PC
SPCK131308G	SPCK131308T	4 x Pk16/21 + 6 x Pk9/13,5, PC

## Ensto Cubo S 125 x 125 x 100 mm



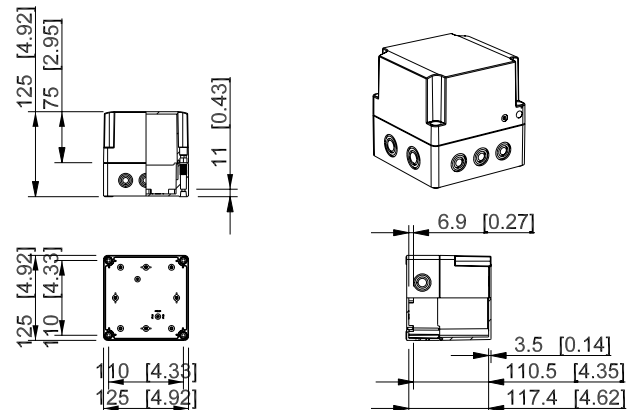
Grey cover	Transparent cover	Description
SPCP131310LG	SPCP131310LT	Plain sides, polycarbonate
SABP131310LG	SABP131310LT	Plain sides, ABS

## Ensto Cubo S 125 x 125 x 100 mm



Grey cover	Transparent cover	Description
SPCP131310G	SPCP131310T	Plain sides, polycarbonate
SABP131310G	SABP131310T	Plain sides, ABS
SPCM131310G	SPCM131310T	4 x M16/25 + 6 x M12/20, PC
SPCK131310G	SPCK131310T	4 x Pk16/21 + 6 x Pk9/13,5, PC

## Ensto Cubo S 125 x 125 x 125 mm



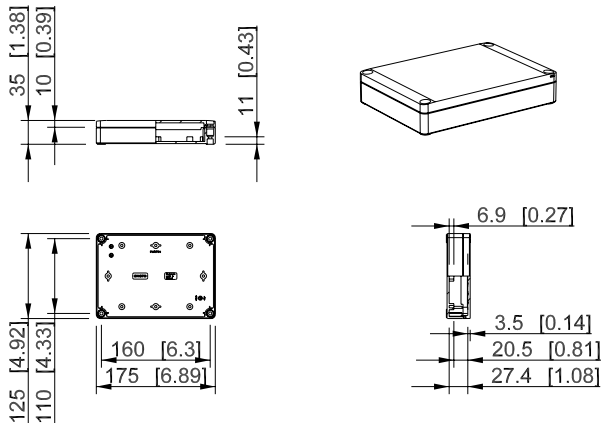
Grey cover	Transparent cover	Description
SPCP131313G	SPCP131313T	Plain sides, polycarbonate
SABP131313G	SABP131313T	Plain sides, ABS
SPCM131313G	SPCM131313T	4 x M16/25 + 6 x M12/20, PC
SPCK131313G	SPCK131313T	4 x Pk16/21 + 6 x Pk9/13,5, PC



# Dimensional drawings, Ensto Cubo S

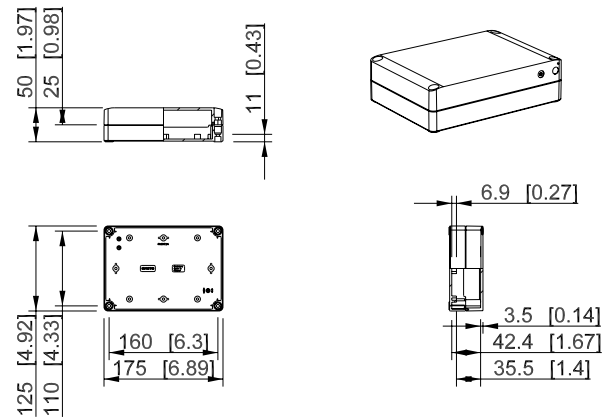
Dimensions in mm [inches]

## Ensto Cubo S 125 x 175 x 35 mm



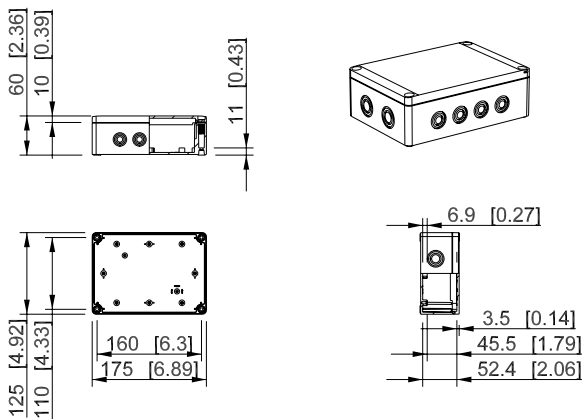
Grey cover	Transparent cover	Description
SPCP131804LG	SPCP131804LT	Plain sides, polycarbonate
SABP131804LG	SABP131804LT	Plain sides, ABS

## Ensto Cubo S 125 x 175 x 50 mm



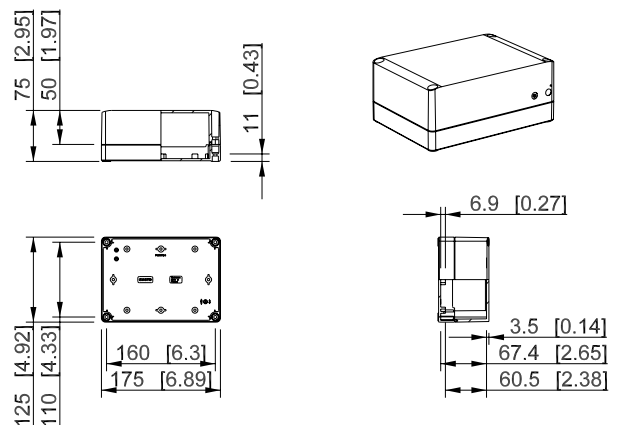
Grey cover	Transparent cover	Description
SPCP131805LG	SPCP131805LT	Plain sides, polycarbonate
SABP131805LG	SABP131805LT	Plain sides, ABS

## Ensto Cubo S 125 x 175 x 60 mm



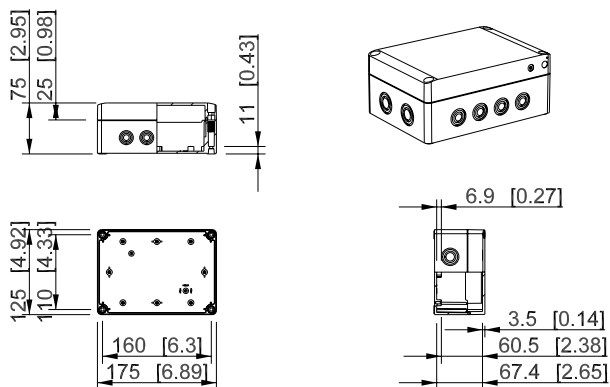
Grey cover	Transparent cover	Description
SPCP131806G	SPCP131806T	Plain sides, polycarbonate
SABP131806G	SABP131806T	Plain sides, ABS
SPCM131806G	SPCM131806T	4 x M16/25 + 8 x M12/20, PC
SPCK131806G	SPCK131806T	4 x Pk16/21 + 8 x Pk9/13,5, PC

## Ensto Cubo S 125 x 175 x 75 mm



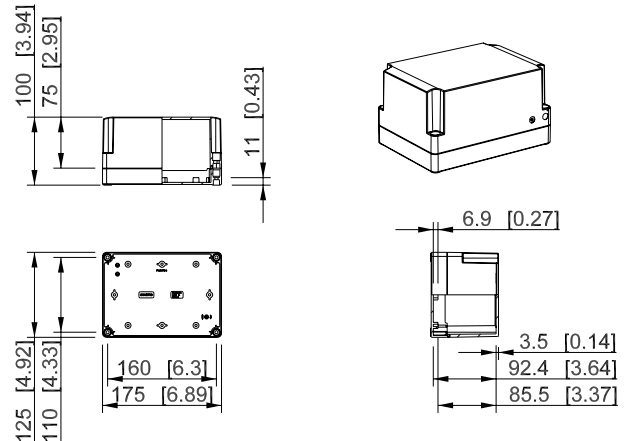
Grey cover	Transparent cover	Description
SPCP131808LG	SPCP131808LT	Plain sides, polycarbonate
SABP131808LG	SABP131808LT	Plain sides, ABS

## Ensto Cubo S 125 x 175 x 75 mm



Grey cover	Transparent cover	Description
SPCP131808G	SPCP131808T	Plain sides, polycarbonate
SABP131808G	SABP131808T	Plain sides, ABS
SPCM131808G	SPCM131808T	4 x M16/25 + 8 x M12/20, PC
SPCK131808G	SPCK131808T	4 x Pk16/21 + 8 x Pk9/13,5, PC

## Ensto Cubo S 125 x 175 x 100 mm

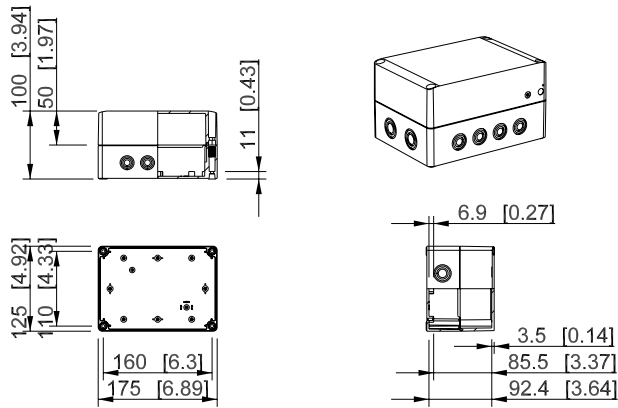


Grey cover	Transparent cover	Description
SPCP131810LG	SPCP131810LT	Plain sides, polycarbonate
SABP131810LG	SABP131810LT	Plain sides, ABS

# Dimensional drawings, Ensto Cubo S

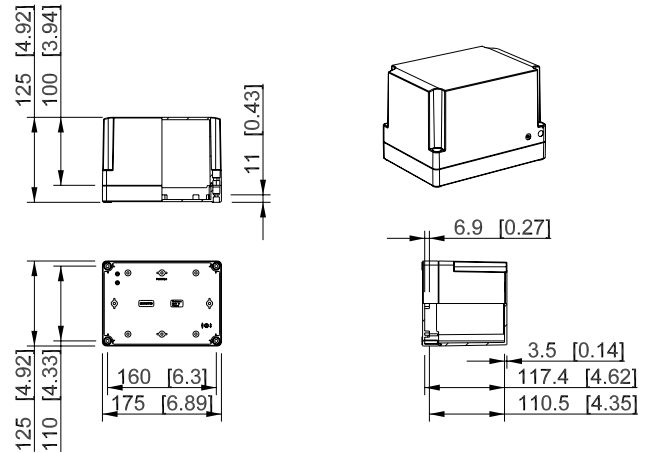
Dimensions in mm [inches]

## Ensto Cubo S 125 x 175 x 100 mm



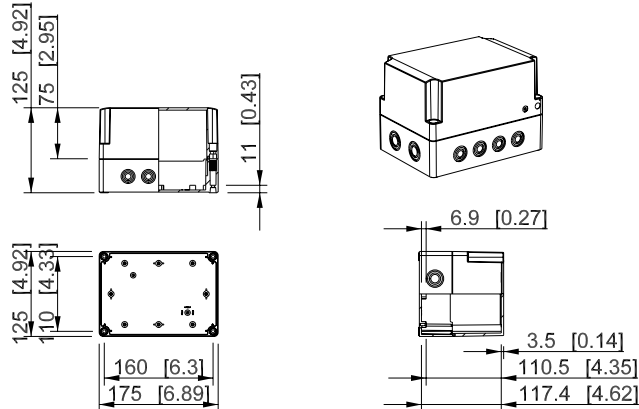
Grey cover	Transparent cover	Description
SPCP131810G	SPCP131810T	Plain sides, polycarbonate
SABP131810G	SABP131810T	Plain sides, ABS
SPCM131810G	SPCM131810T	4 x M16/25 + 8 x M12/20, PC
SPCK131810G	SPCK131810T	4 x Pk16/21 + 8 x Pk9/13,5, PC

## Ensto Cubo S 125 x 175 x 125 mm



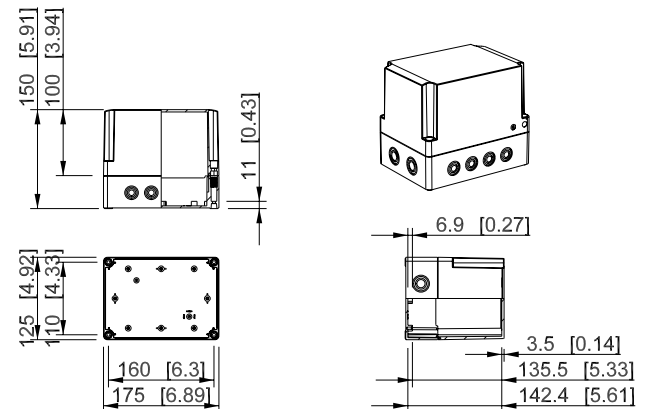
Grey cover	Transparent cover	Description
SPCP131813LG	SPCP131813LT	Plain sides, polycarbonate
SABP131813LG	SABP131813LT	Plain sides, ABS

## Ensto Cubo S 125 x 175 x 125 mm



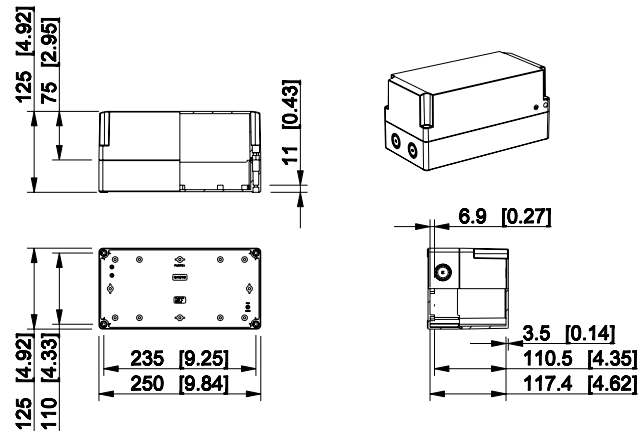
Grey cover	Transparent cover	Description
SPCP131813G	SPCP131813T	Plain sides, polycarbonate
SABP131813G	SABP131813T	Plain sides, ABS
SPCM131813G	SPCM131813T	4 x M16/25 + 8 x M12/20, PC
SPCK131813G	SPCK131813T	4 x Pk16/21 + 8 x Pk9/13,5, PC

## Ensto Cubo S 125 x 175 x 150 mm



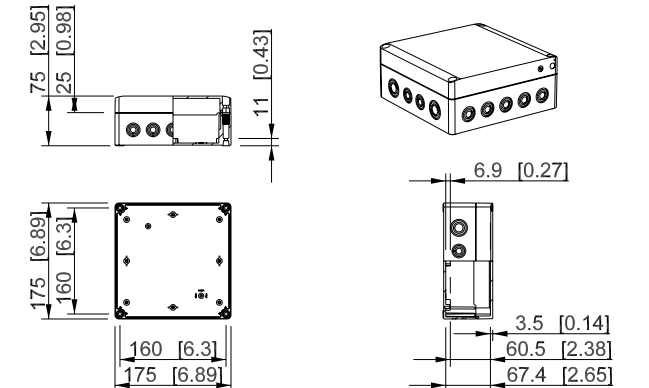
Grey cover	Transparent cover	Description
SPCP131815G	SPCP131815T	Plain sides, polycarbonate
SABP131815G	SABP131815T	Plain sides, ABS
SPCM131815G	SPCM131815T	4 x M16/25 + 8 x M12/20, PC
SPCK131815G	SPCK131815T	4 x Pk16/21 + 8 x Pk9/13,5, PC

## Ensto Cubo S 125 x 250 x 125 mm



Grey cover	Transparent cover	Description
SPCP132513G	SPCP132513T	Plain sides, polycarbonate
SABP132513G	SABP132513T	Plain sides, ABS
SPCM132513G	SPCM132513T	4 x M20/25, PC

## Ensto Cubo S 175 x 175 x 75 mm

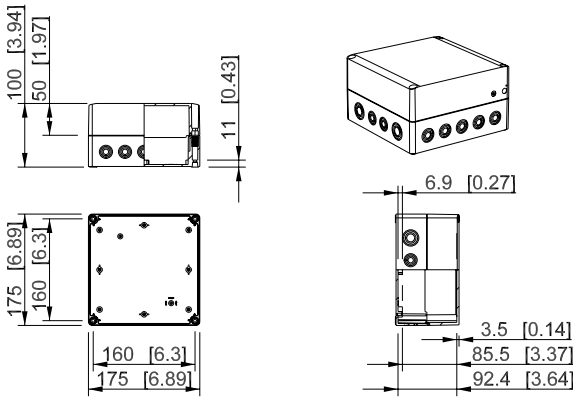


Grey cover	Transparent cover	Description
SPCP181808G	SPCP181808T	Plain sides, polycarbonate
SABP181808G	SABP181808T	Plain sides, ABS
SPCM181808G	SPCM181808T	4 x M12/20 + 4 x M16/25 + 10 x M12/20, PC
SPCK181808G	SPCK181808T	4 x Pk16/21 + 4 x Pk9/16 + 10 x Pk9/13,5, PC

# Dimensional drawings, Ensto Cubo S

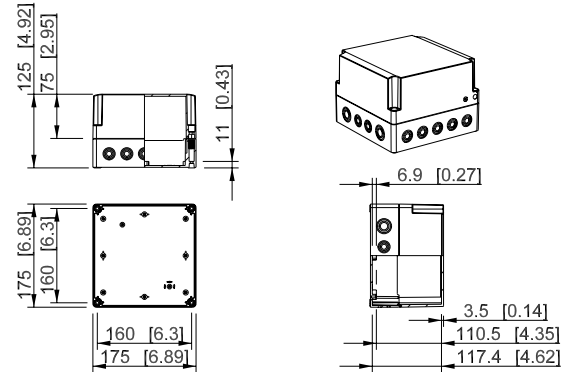
Dimensions in mm [inches]

## Ensto Cubo S 175 x 175 x 100 mm



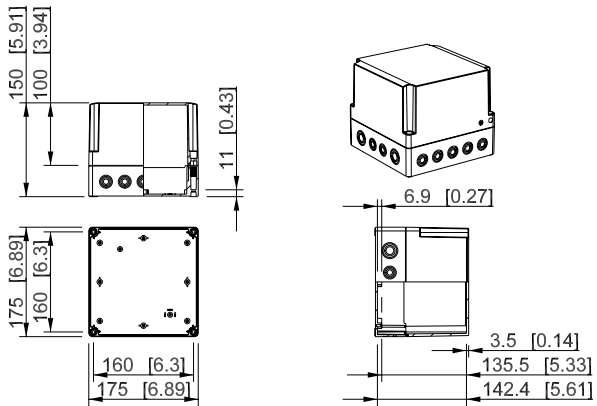
Grey cover	Transparent cover	Description
SPCP181810G	SPCP181810T	Plain sides, polycarbonate
SABP181810G	SABP181810T	Plain sides, ABS
SPCM181810G	SPCM181810T	4 x M12/20 + 4 x M16/25 + 10 x M12/20, PC
SPCK181810G	SPCK181810T	4 x Pk16/21 + 4 x Pk9/16 + 10 x Pk9/13,5, PC

## Ensto Cubo S 175 x 175 x 125 mm



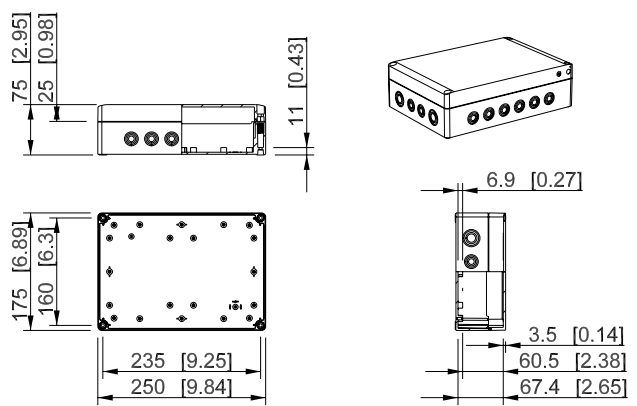
Grey cover	Transparent cover	Description
SPCP181813G	SPCP181813T	Plain sides, polycarbonate
SABP181813G	SABP181813T	Plain sides, ABS
SPCM181813G	SPCM181813T	4 x M12/20 + 4 x M16/25 + 10 x M12/20, PC
SPCK181813G	SPCK181813T	4 x Pk16/21 + 4 x Pk9/16 + 10 x Pk9/13,5, PC

## Ensto Cubo S 175 x 175 x 150 mm



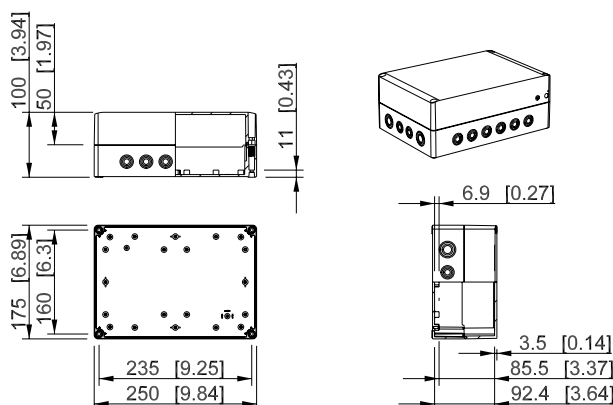
Grey cover	Transparent cover	Description
SPCP181815G	SPCP181815T	Plain sides, polycarbonate
SABP181815G	SABP181815T	Plain sides, ABS
SPCM181815G	SPCM181815T	4 x M12/20 + 4 x M16/25 + 10 x M12/20, PC
SPCK181815G	SPCK181815T	4 x Pk16/21 + 4 x Pk9/16 + 10 x Pk9/13,5, PC

## Ensto Cubo S 175 x 250 x 75 mm



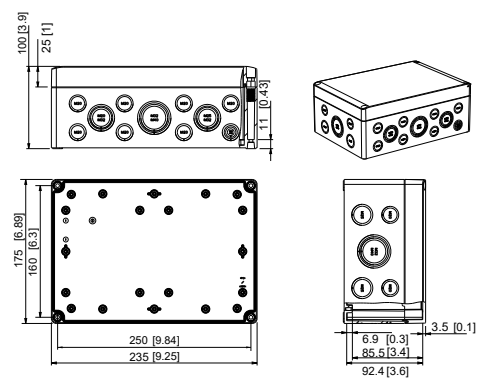
Grey cover	Transparent cover	Description
SPCP182508G	SPCP182508T	Plain sides, polycarbonate
SABP182508G	SABP182508T	Plain sides, ABS
SPCM182508G	SPCM182508T	4 x M12/20 + 4 x M16/25 + 12 x M12/20, PC
SPCK182508G	SPCK182508T	4 x Pk16/21 + 4 x Pk9/16 + 12 x Pk9/13,5, PC

## Ensto Cubo S 175 x 250 x 100 mm



Grey cover	Transparent cover	Description
SPCP182510G	SPCP182510T	Plain sides, polycarbonate
SABP182510G	SABP182510T	Plain sides, ABS
SPCM182510G	SPCM182510T	4 x M12/20 + 4 x M16/25 + 12 x M12/20, PC
SPCK182510G	SPCK182510T	4 x Pk16/21 + 4 x Pk9/16 + 12 x Pk9/13,5, PC

## Ensto Cubo S 175 x 250 x 100 mm

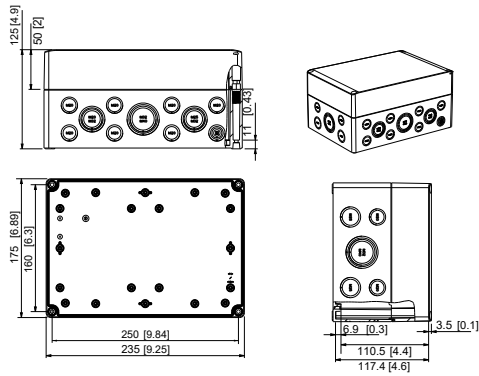


Grey cover	Transparent cover	Description
SPCP182510HG	SPCP182510HT	Plain sides, polycarbonate
SABP182510HG	SABP182510HT	Plain sides, ABS
SPCM182510HG	SPCM182510HT	2 x M12/M20 + 18 x M20 + 4 x M25 + 4 x M20/M32 + 4 x M32/M40
SPCK182510HG	SPCK182510HT	2 x M12/M20 + 18 x M20 + 4 x M25 + 4 x M20/M32 + 4 x M32/M40

# Dimensional drawings, Ensto Cubo S

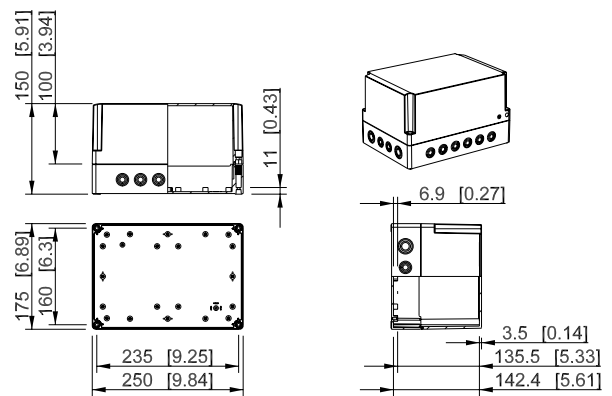
Dimensions in mm [inches]

## Ensto Cubo S 175 x 250 x 125 mm



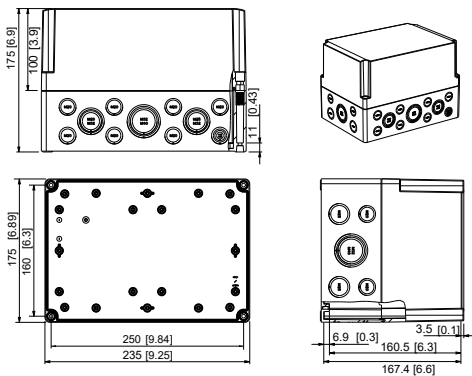
Grey cover	Transparent cover	Description
SPCP182513HG	SPCP182513HT	Plain sides, polycarbonate
SABP182513HG	SABP182513HT	Plain sides, ABS
SPCM182513HG	SPCM182513HT	2 x M12/M20 + 18 x M20 + 4 x M25 + 4 x M20/M32 + 4 x M32/M40
SPCK182513HG	SPCK182513HT	2 x M12/M20 + 18 x M20 + 4 x M25 + 4 x M20/M32 + 4 x M32/M40

## Ensto Cubo S 175 x 250 x 150 mm



Grey cover	Transparent cover	Description
SPCP182515G	SPCP182515T	Plain sides, polycarbonate
SABP182515G	SABP182515T	Plain sides, ABS
SPCM182515G	SPCM182515T	4 x M12/20 + 4 x M16/25 + 12 x M12/20, PC
SPCK182515G	SPCK182515T	4 x Pk16/21 + 4 x Pk9/16 + 12 x Pk9/13,5, PC

## Ensto Cubo S 175 x 250 x 175 mm

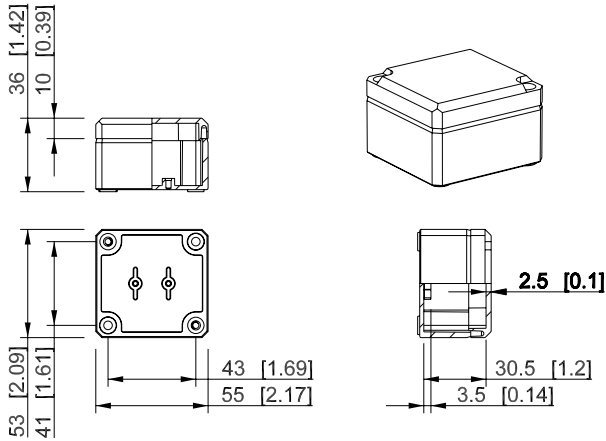


Grey cover	Transparent cover	Description
SPCP182518HG	SPCP182518HT	Plain sides, polycarbonate
SABP182518HG	SABP182518HT	Plain sides, ABS
SPCM182518HG	SPCM182518HT	2 x M12/M20 + 18 x M20 + 4 x M25 + 4 x M20/M32 + 4 x M32/M40
SPCK182518HG	SPCK182518HT	2 x M12/M20 + 18 x M20 + 4 x M25 + 4 x M20/M32 + 4 x M32/M40

# Dimensional drawings, Ensto Cubo D

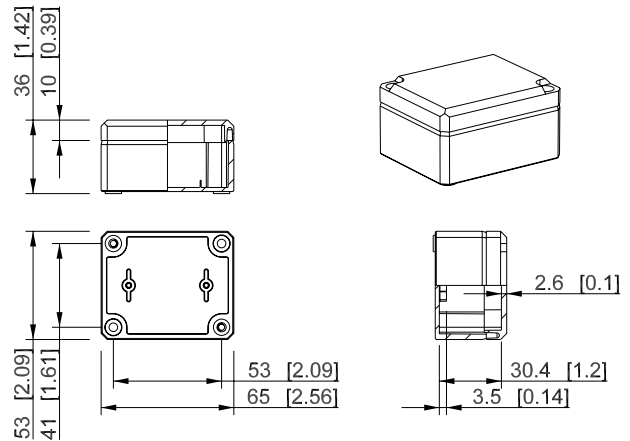
Dimensions in mm [inches]

## Ensto Cubo D 53 x 55 x 36 mm



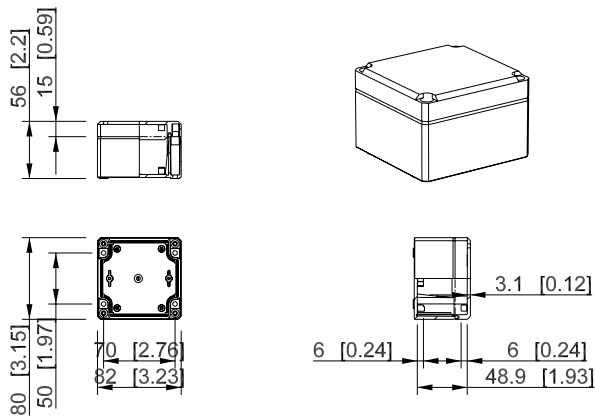
Grey cover	Transparent cover	Description
DPCP050504G	DPCP050504T	Plain sides, polycarbonate
DABP050504G	DABP050504T	Plain sides, ABS

## Ensto Cubo D 53 x 65 x 36 mm



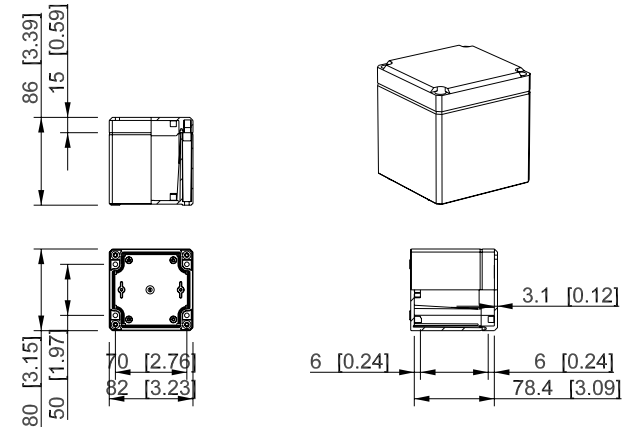
Grey cover	Transparent cover	Description
DPCP050704G	DPCP050704T	Plain sides, polycarbonate
DABP050704G	DABP050704T	Plain sides, ABS

## Ensto Cubo D 80 x 82 x 56 mm



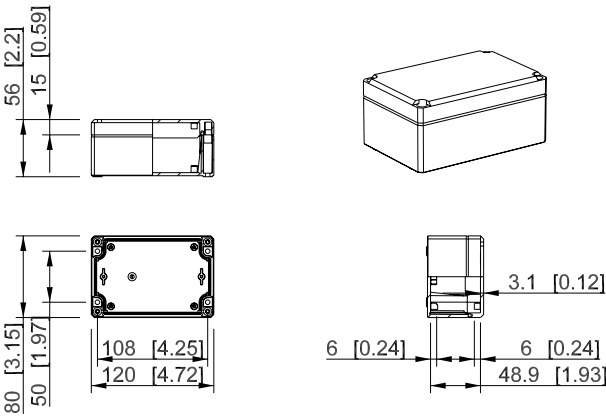
Grey cover	Transparent cover	Description
DPCP080806G	DPCP080806T	Plain sides, polycarbonate
DABP080806G	DABP080806T	Plain sides, ABS

## Ensto Cubo D 80 x 82 x 86 mm



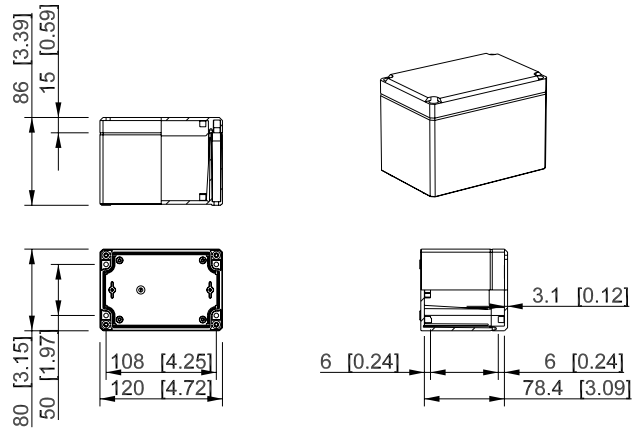
Grey cover	Transparent cover	Description
DPCP080809G	DPCP080809T	Plain sides, polycarbonate
DABP080809G	DABP080809T	Plain sides, ABS

## Ensto Cubo D 80 x 120 x 56 mm



Grey cover	Transparent cover	Description
DPCP081206G	DPCP081206T	Plain sides, polycarbonate
DABP081206G	DABP081206T	Plain sides, ABS

## Ensto Cubo D 80 x 120 x 86 mm



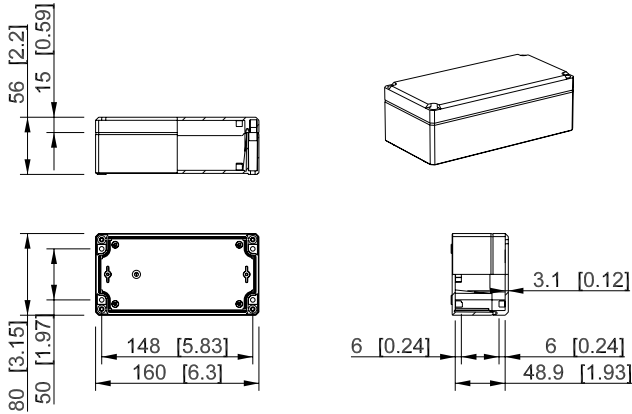
Grey cover	Transparent cover	Description
DPCP081209G	DPCP081209T	Plain sides, polycarbonate
DABP081209G	DABP081209T	Plain sides, ABS



# Dimensional drawings, Ensto Cubo D

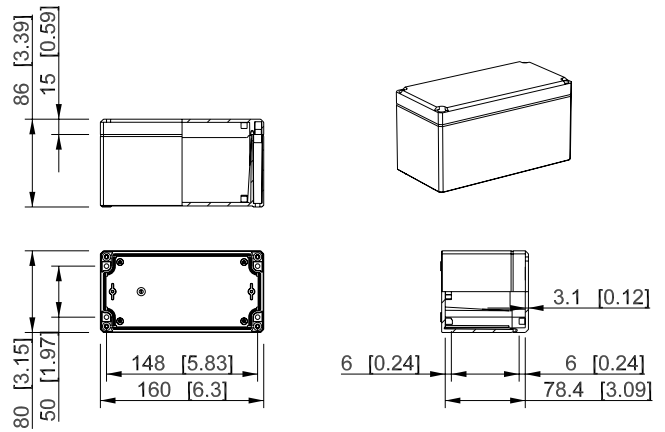
Dimensions in mm [inches]

## Ensto Cubo D 80 x 160 x 56 mm



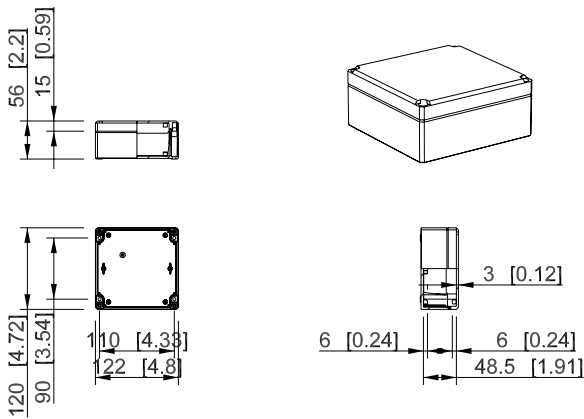
Grey cover	Transparent cover	Description
DPCP081606G	DPCP081606T	Plain sides, polycarbonate
DABP081606G	DABP081606T	Plain sides, ABS

## Ensto Cubo D 80 x 160 x 86 mm



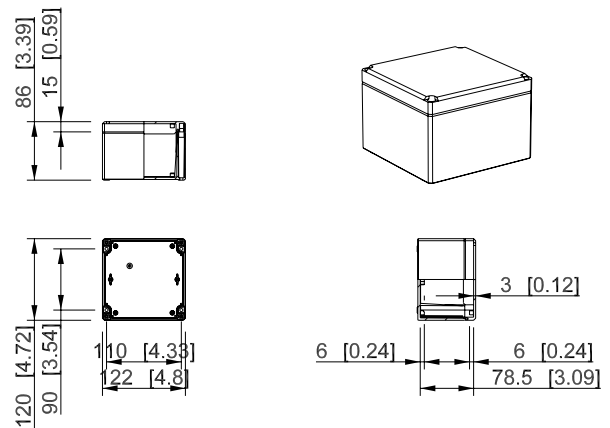
Grey cover	Transparent cover	Description
DPCP081609G	DPCP081609T	Plain sides, polycarbonate
DABP081609G	DABP081609T	Plain sides, ABS

## Ensto Cubo D 120 x 122 x 56 mm



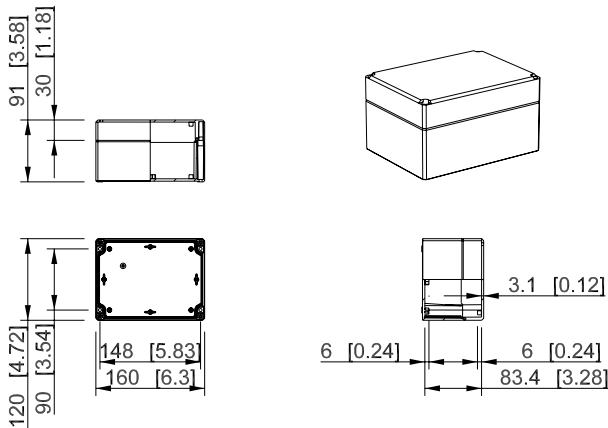
Grey cover	Transparent cover	Description
DPCP121206G	DPCP121206T	Plain sides, polycarbonate
DABP121206G	DABP121206T	Plain sides, ABS

## Ensto Cubo D 120 x 122 x 86 mm



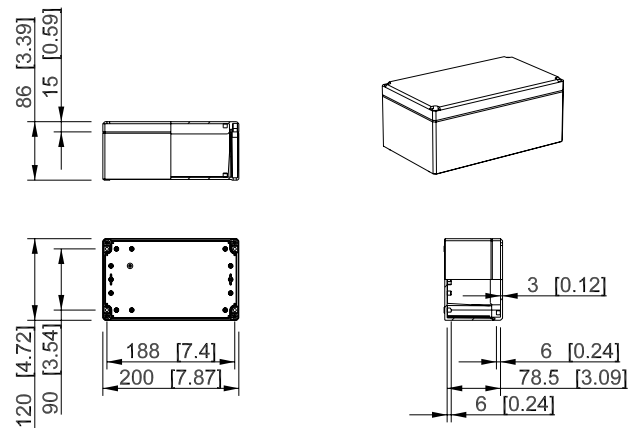
Grey cover	Transparent cover	Description
DPCP121209G	DPCP121209T	Plain sides, polycarbonate
DABP121209G	DABP121209T	Plain sides, ABS

## Ensto Cubo D 120 x 160 x 91 mm



Grey cover	Transparent cover	Description
DPCP121609G	DPCP121609T	Plain sides, polycarbonate
DABP121609G	DABP121609T	Plain sides, ABS

## Ensto Cubo D 120 x 200 x 86 mm

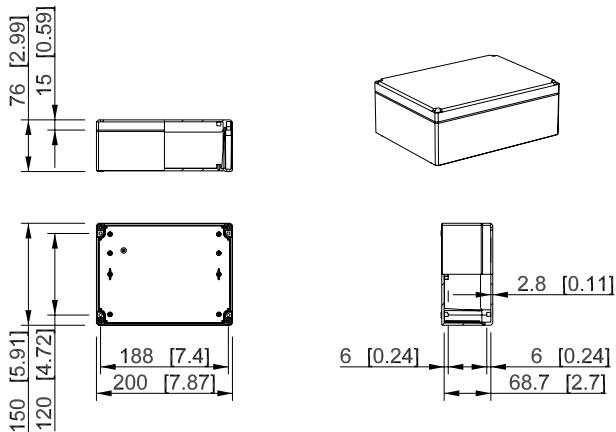


Grey cover	Transparent cover	Description
DPCP122009G	DPCP122009T	Plain sides, polycarbonate
DABP122009G	DABP122009T	Plain sides, ABS

# Dimensional drawings, Ensto Cubo D

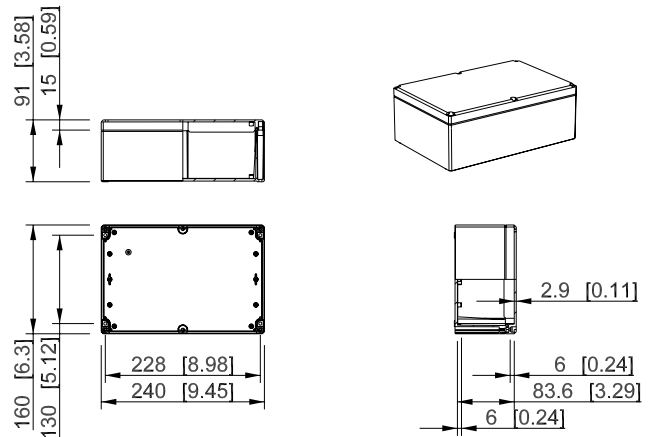
Dimensions in mm [inches]

## Ensto Cubo D 150 x 200 x 76 mm



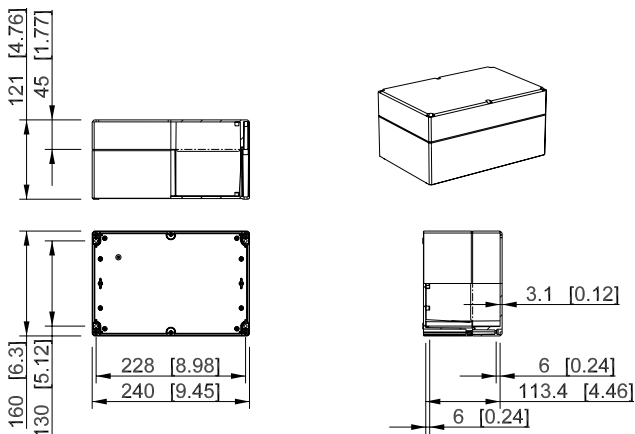
Grey cover	Transparent cover	Description
DPCP152008G	DPCP152008T	Plain sides, polycarbonate
DABP152008G	DABP152008T	Plain sides, ABS

## Ensto Cubo D 160 x 240 x 91 mm



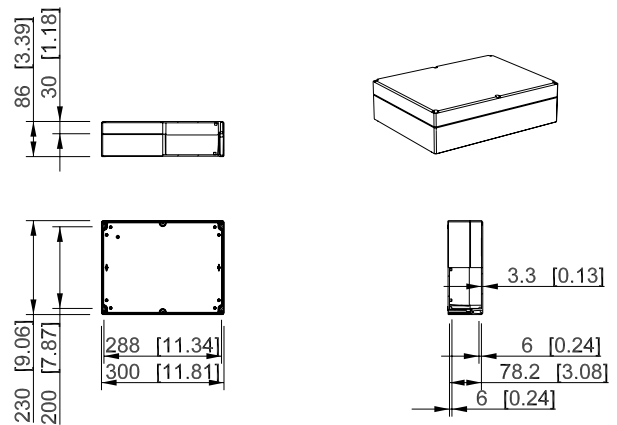
Grey cover	Transparent cover	Description
DPCP162409G	DPCP162409T	Plain sides, polycarbonate
DABP162409G	DABP162409T	Plain sides, ABS

## Ensto Cubo D 160 x 240 x 121 mm



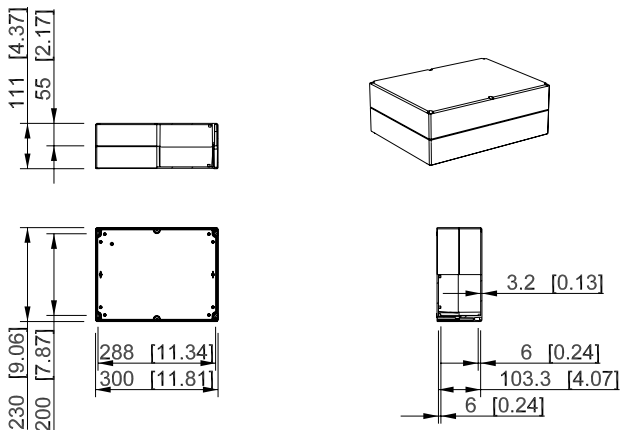
Grey cover	Transparent cover	Description
DPCP162412G	DPCP162412T	Plain sides, polycarbonate
DABP162412G	DABP162412T	Plain sides, ABS

## Ensto Cubo D 230 x 300 x 86 mm



Grey cover	Transparent cover	Description
DPCP233009G	DPCP233009T	Plain sides, polycarbonate
DABP233009G	DABP233009T	Plain sides, ABS

## Ensto Cubo D 230 x 300 x 111 mm

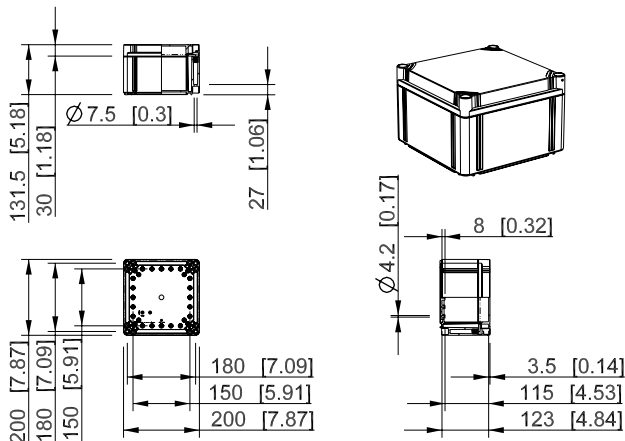


Grey cover	Transparent cover	Description
DPCP233011G	DPCP233011T	Plain sides, polycarbonate
DABP233011G	DABP233011T	Plain sides, ABS

# Dimensional drawings, Ensto Cubo O

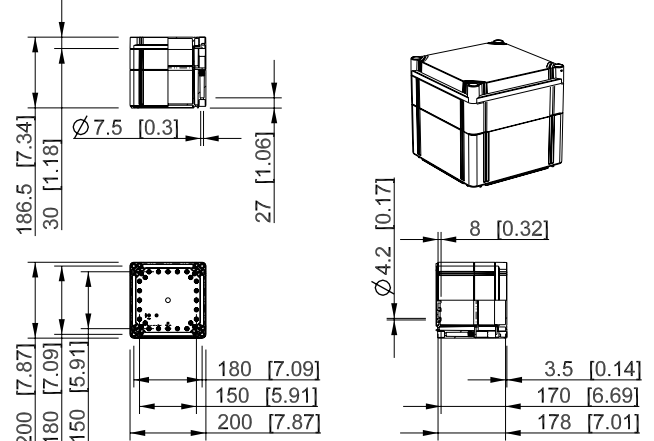
Dimensions in mm [inches]

## Ensto Cubo O 200 x 200 x 132 mm



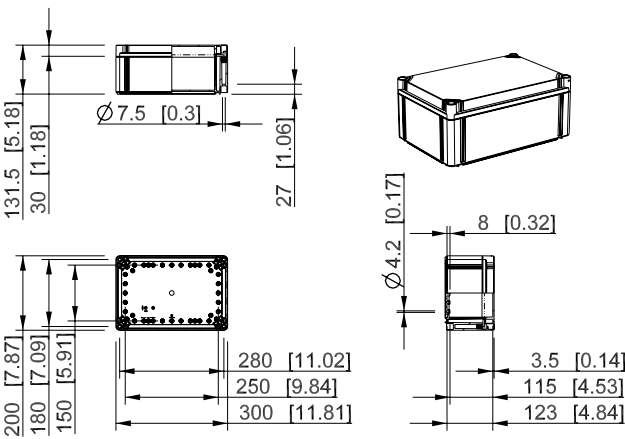
Grey cover	Transparent cover	Description
OPCP202013G	OPCP202013T	Plain sides, polycarbonate
OABP202013G	OABP202013T	Plain sides, ABS

## Ensto Cubo O 200 x 200 x 187 mm



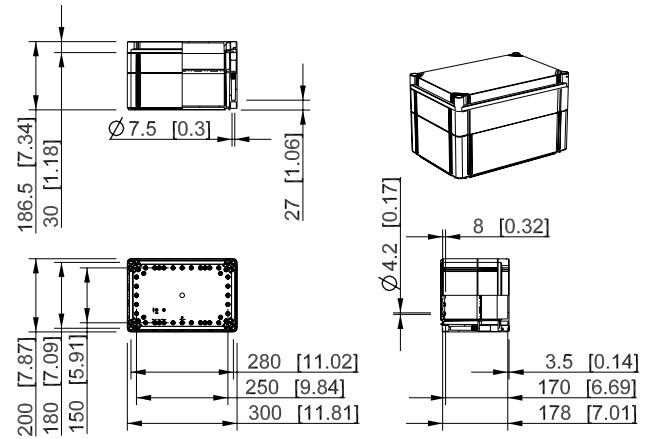
Grey cover	Transparent cover	Description
OPCP202018G	OPCP202018T	Plain sides, polycarbonate
OABP202018G	OABP202018T	Plain sides, ABS

## Ensto Cubo O 200 x 300 x 132 mm



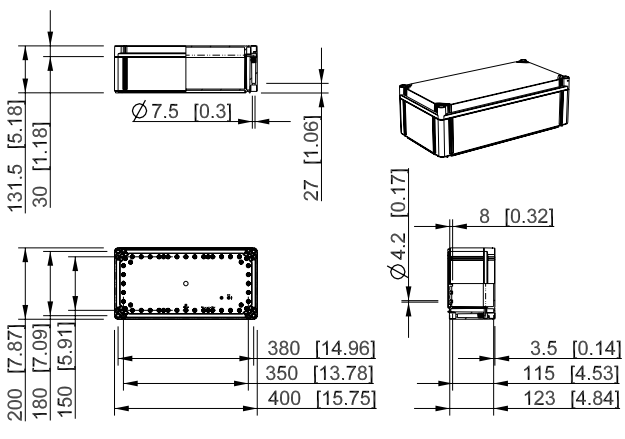
Grey cover	Transparent cover	Description
OPCP203013G	OPCP203013T	Plain sides, polycarbonate
OABP203013G	OABP203013T	Plain sides, ABS

## Ensto Cubo O 200 x 300 x 187 mm



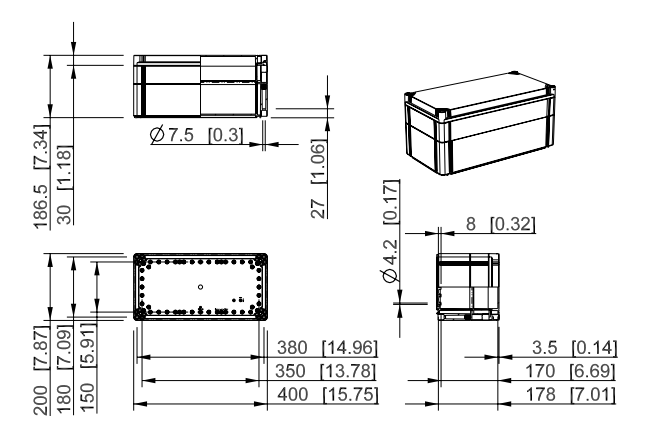
Grey cover	Transparent cover	Description
OPCP203018G	OPCP203018T	Plain sides, polycarbonate
OABP203018G	OABP203018T	Plain sides, ABS

## Ensto Cubo O 200 x 400 x 132 mm



Grey cover	Transparent cover	Description
OPCP204013G	OPCP204013T	Plain sides, polycarbonate
OABP204013G	OABP204013T	Plain sides, ABS

## Ensto Cubo O 200 x 400 x 187 mm



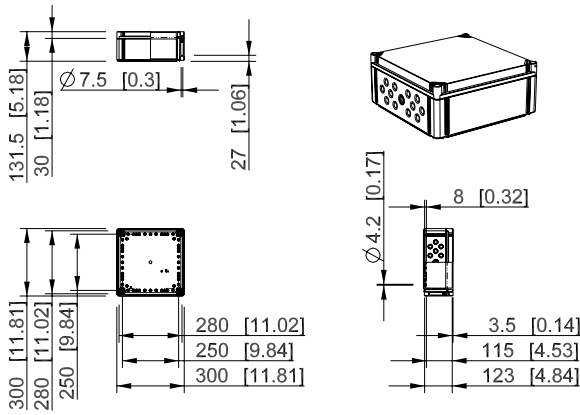
Grey cover	Transparent cover	Description
OPCP204018G	OPCP204018T	Plain sides, polycarbonate
OABP204018G	OABP204018T	Plain sides, ABS



# Dimensional drawings, Ensto Cubo O

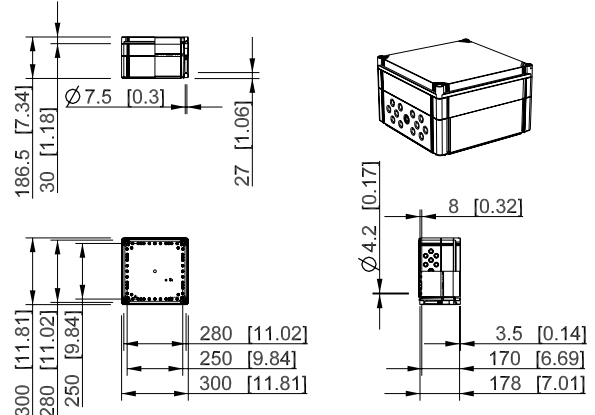
Dimensions in mm [inches]

## Ensto Cubo O 300 x 300 x 132 mm



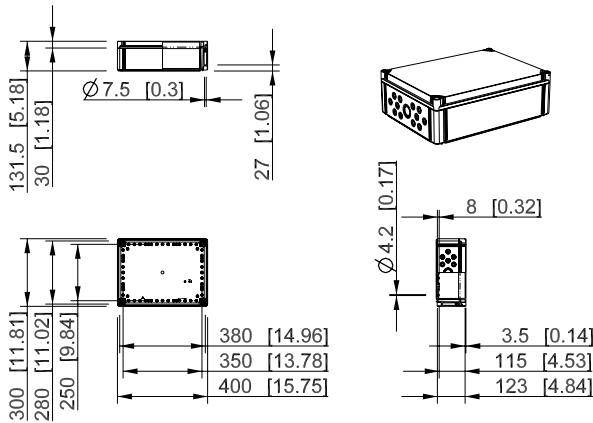
Grey cover	Transparent cover	Description
OPCP303013G	OPCP303013T	Plain sides, polycarbonate
OABP303013G	OABP303013T	Plain sides, ABS
OPCM303013G	OPCM303013T	12 x M20 + 1 x M16/25 + 8 x M20 + 4 x M25/40, PC

## Ensto Cubo O 300 x 300 x 187 mm



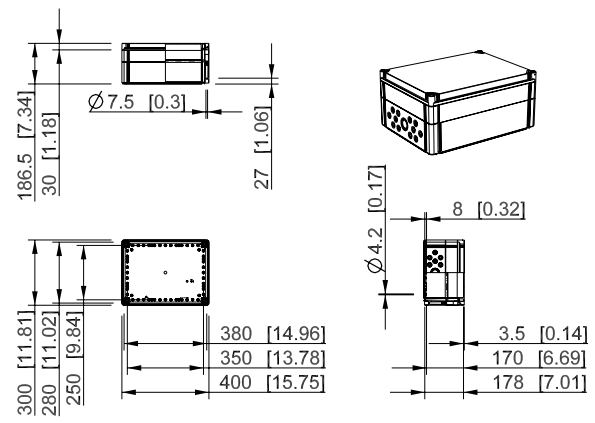
Grey cover	Transparent cover	Description
OPCP303018G	OPCP303018T	Plain sides, polycarbonate
OABP303018G	OABP303018T	Plain sides, ABS
OPCM303018G	OPCM303018T	12 x M20 + 1 x M16/25 + 8 x M20 + 4 x M25/40, PC

## Ensto Cubo O 300 x 400 x 132 mm



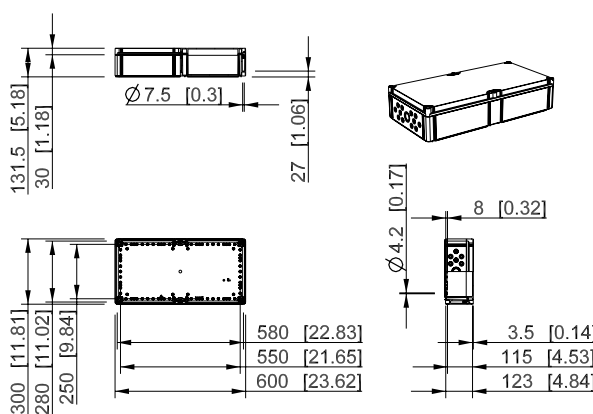
Grey cover	Transparent cover	Description
OPCP304013G	OPCP304013T	Plain sides, polycarbonate
OABP304013G	OABP304013T	Plain sides, ABS
OPCM304013G	OPCM304013T	8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40, PC

## Ensto Cubo O 300 x 400 x 187 mm



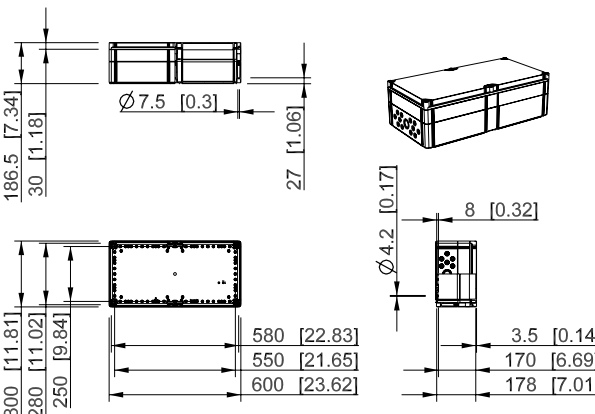
Grey cover	Transparent cover	Description
OPCP304018G	OPCP304018T	Plain sides, polycarbonate
OABP304018G	OABP304018T	Plain sides, ABS
OPCM304018G	OPCM304018T	8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40, PC

## Ensto Cubo O 300 x 600 x 132 mm



Grey cover	Transparent cover	Description
OPCP306013G	OPCP306013T	Plain sides, polycarbonate
OABP306013G	OABP306013T	Plain sides, ABS
OPCM306013G	OPCM306013T	8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40, PC

## Ensto Cubo O 300 x 600 x 187 mm



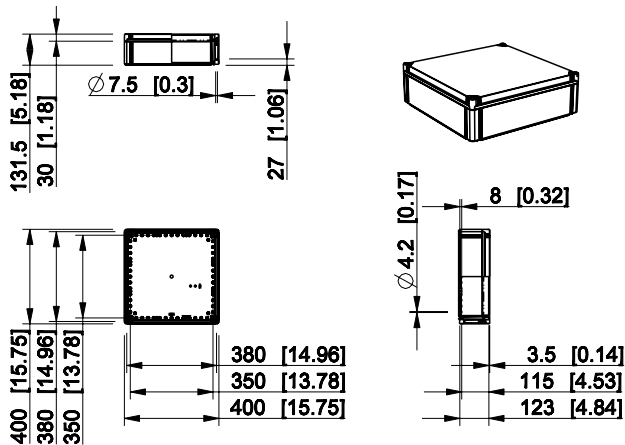
Grey cover	Transparent cover	Description
OPCP306018G	OPCP306018T	Plain sides, polycarbonate
OABP306018G	OABP306018T	Plain sides, ABS
OPCM306018G	OPCM306018T	8 x M12/20 + 5 x M16/25 + 12 x M12/20 + 1 x M32/40, PC



# Dimensional drawings, Ensto Cubo O and C

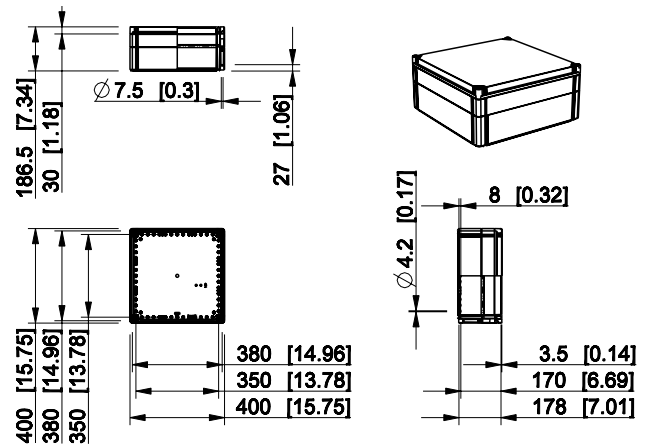
Dimensions in mm [inches]

## Ensto Cubo O 400 x 400 x 132 mm



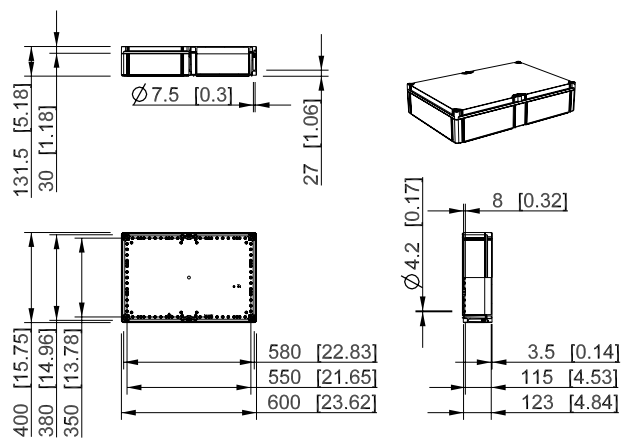
Grey cover	Transparent cover	Description
OPCP404013G	OPCP404013T	Plain sides, polycarbonate
OABP404013G	OABP404013T	Plain sides, ABS

## Ensto Cubo O 400 x 400 x 187 mm



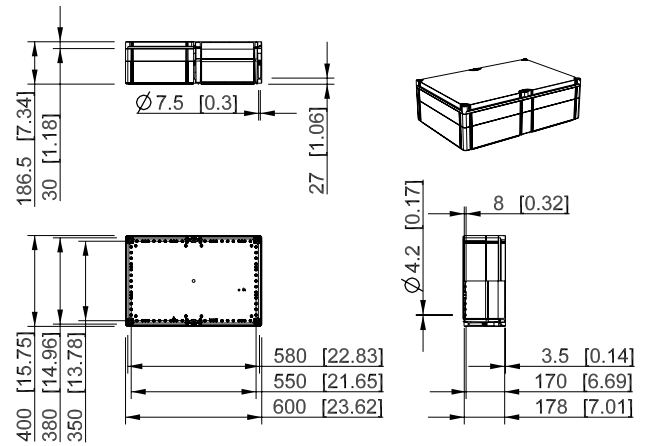
Grey cover	Transparent cover	Description
OPCP404018G	OPCP404018T	Plain sides, polycarbonate
OABP404018G	OABP404018T	Plain sides, ABS

## Ensto Cubo O 400 x 600 x 132 mm



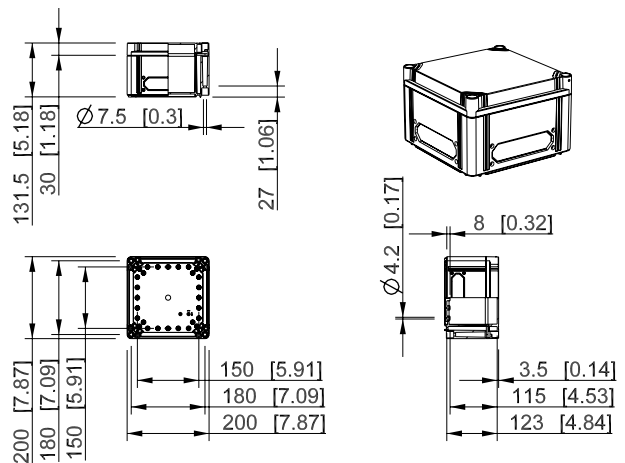
Grey cover	Transparent cover	Description
OPCP406013G	OPCP406013T	Plain sides, polycarbonate
OABP406013G	OABP406013T	Plain sides, ABS

## Ensto Cubo O 400 x 600 x 187 mm



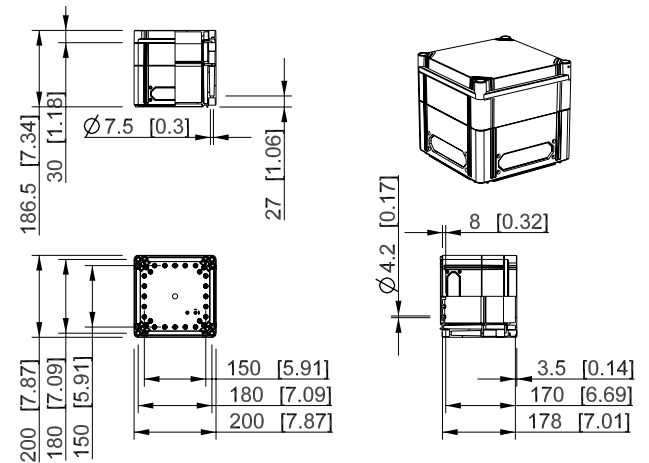
Grey cover	Transparent cover	Description
OPCP406018G	OPCP406018T	Plain sides, polycarbonate
OABP406018G	OABP406018T	Plain sides, ABS

## Ensto Cubo C 200 x 200 x 132 mm



Grey cover	Transparent cover	Description
CPCF202013G	CPCF202013T	4 x F1 knockout, PC

## Ensto Cubo C 200 x 200 x 187 mm

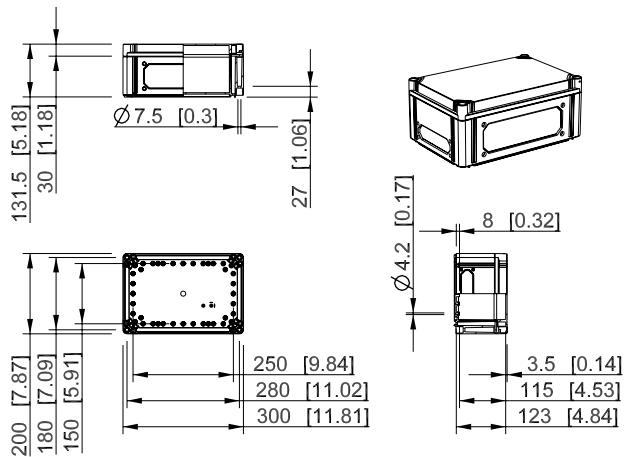


Grey cover	Transparent cover	Description
CPCF202018G	CPCF202018T	4 x F1 knockout, PC

# Dimensional drawings, Ensto Cubo C

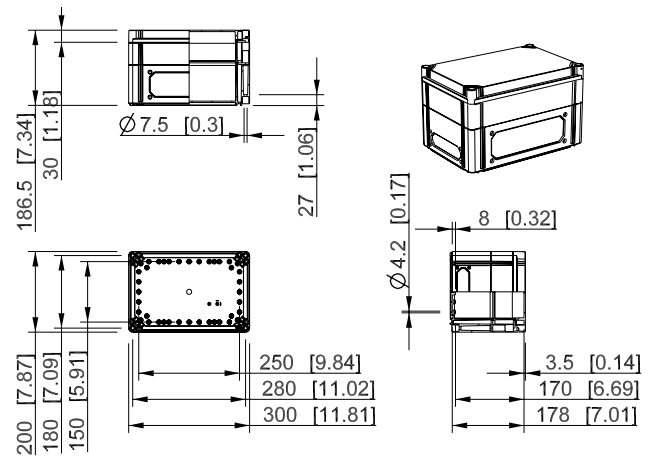
Dimensions in mm [inches]

## Ensto Cubo C 200 x 300 x 132 mm



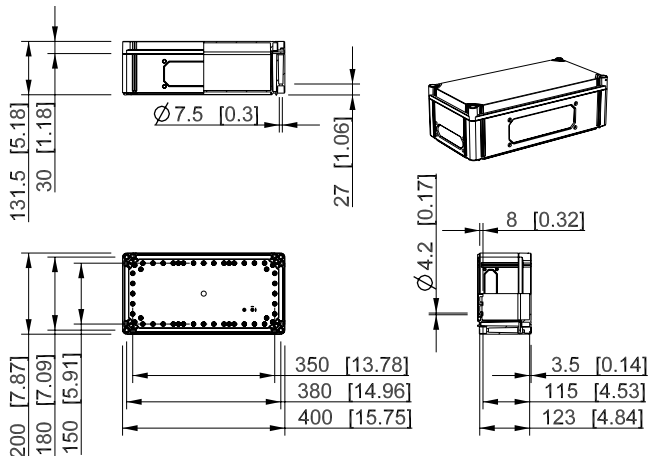
Grey cover	Transparent cover	Description
CPCF203013G	CPCF203013T	2 x F1 knockout + 2 x F2 knockout, PC

## Ensto Cubo C 200 x 300 x 187 mm



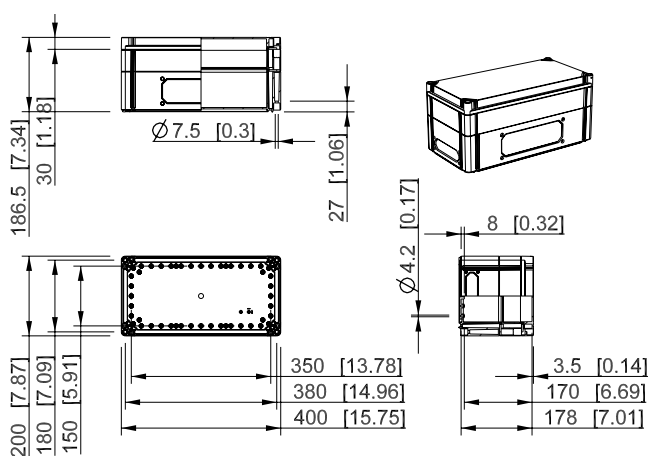
Grey cover	Transparent cover	Description
CPCF203018G	CPCF203018T	2 x F1 knockout + 2 x F2 knockout, PC

## Ensto Cubo C 200 x 400 x 132 mm



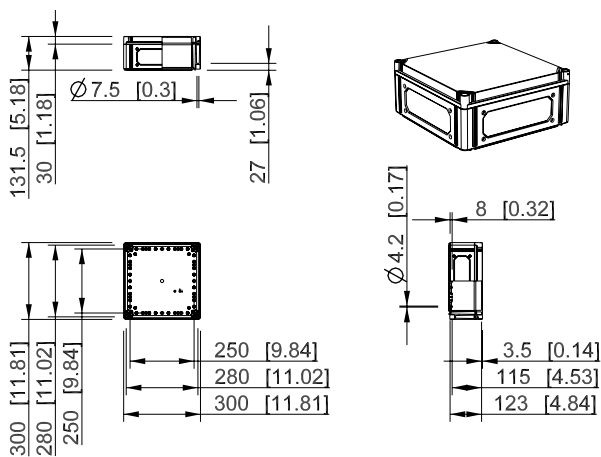
Grey cover	Transparent cover	Description
CPCF204013G	CPCF204013T	2 x F1 knockout + 2 x F2 knockout, PC

## Ensto Cubo C 200 x 400 x 187 mm



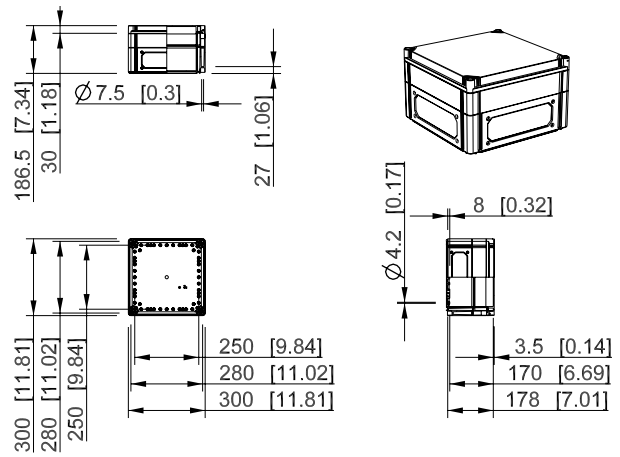
Grey cover	Transparent cover	Description
CPCF204018G	CPCF204018T	2 x F1 knockout + 2 x F2 knockout, PC

## Ensto Cubo C 300 x 300 x 132 mm



Grey cover	Transparent cover	Description
CPCF303013G	CPCF303013T	4 x F2 knockout, PC

## Ensto Cubo C 300 x 300 x 187 mm

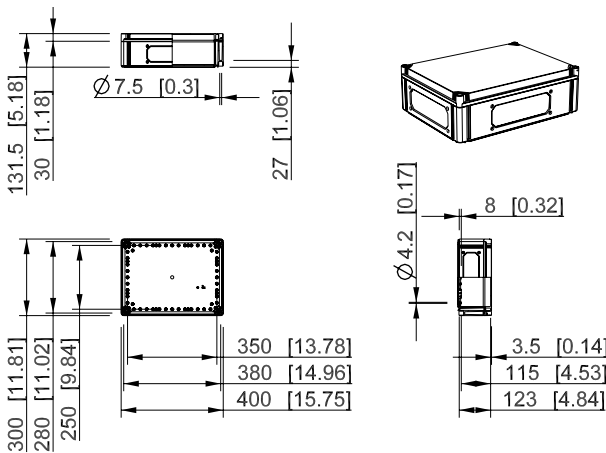


Grey cover	Transparent cover	Description
CPCF303018G	CPCF303018T	4 x F2 knockout, PC

# Dimensional drawings, Ensto Cubo C

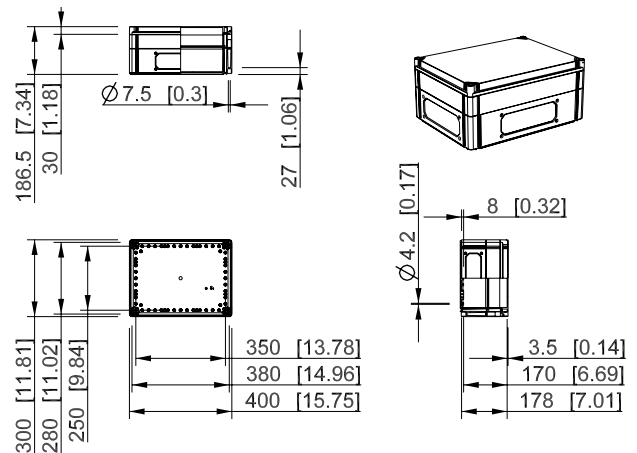
Dimensions in mm [inches]

## Ensto Cubo C 300 x 400 x 132 mm



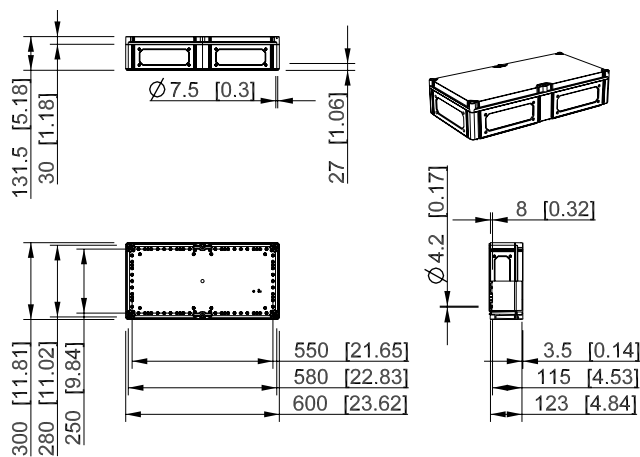
Grey cover	Transparent cover	Description
CPCF304013G	CPCF304013T	4 x F2 knockout, PC

## Ensto Cubo C 300 x 400 x 187 mm



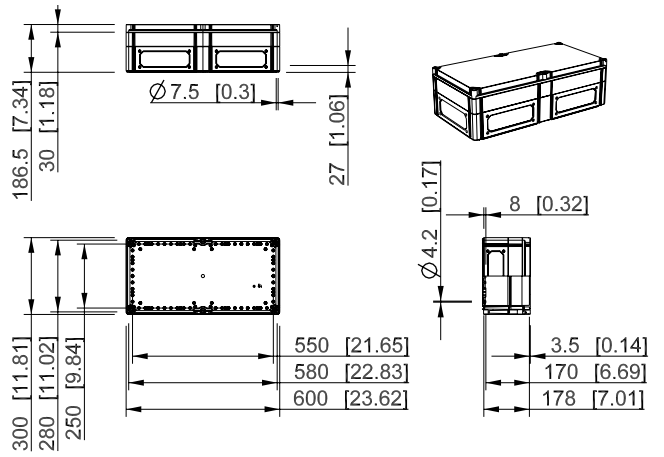
Grey cover	Transparent cover	Description
CPCF304018G	CPCF304018T	4 x F2 knockout, PC

## Ensto Cubo C 300 x 600 x 132 mm



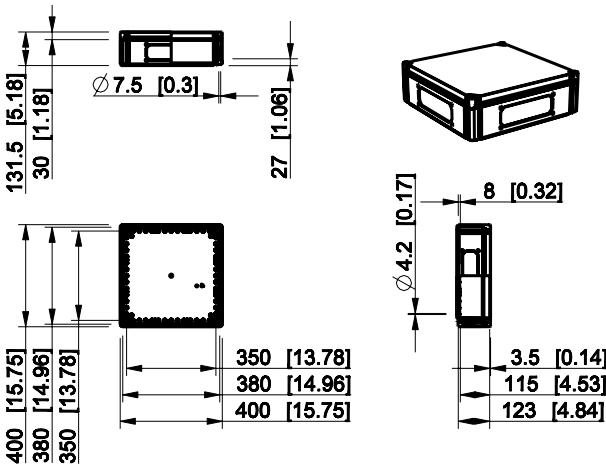
Grey cover	Transparent cover	Description
CPCF306013G	CPCF306013T	6 x F2 knockout, PC

## Ensto Cubo C 300 x 600 x 187 mm



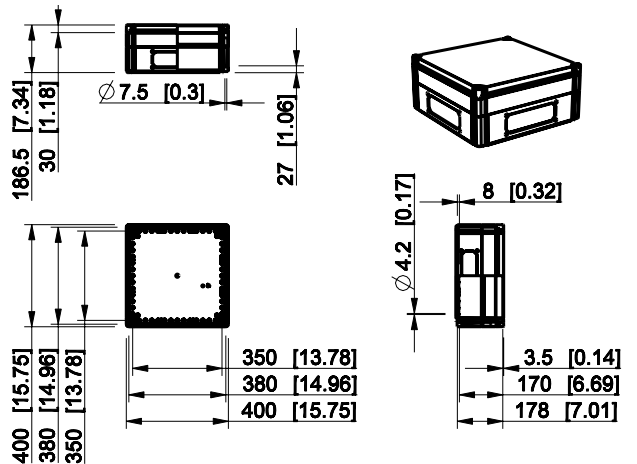
Grey cover	Transparent cover	Description
CPCF306018G	CPCF306018T	6 x F2 knockout, PC

## Ensto Cubo C 400 x 400 x 132 mm



Grey cover	Transparent cover	Description
CPCF404013G	CPCF404013T	6 x F2 knockout, PC

## Ensto Cubo C 400 x 400 x 187 mm

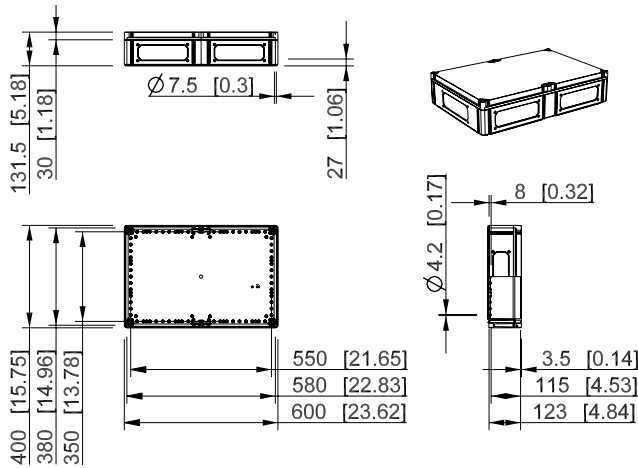


Grey cover	Transparent cover	Description
CPCF404018G	CPCF404018T	6 x F2 knockout, PC

# Dimensional drawings, Ensto Cubo C and W

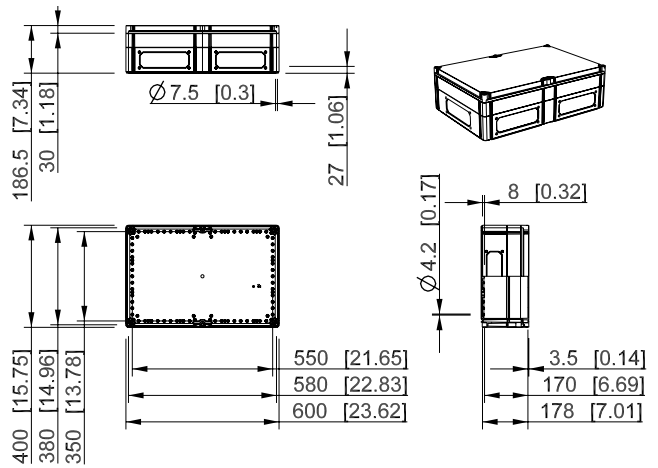
Dimensions in mm [inches]

## Ensto Cubo C 400 x 600 x 132 mm



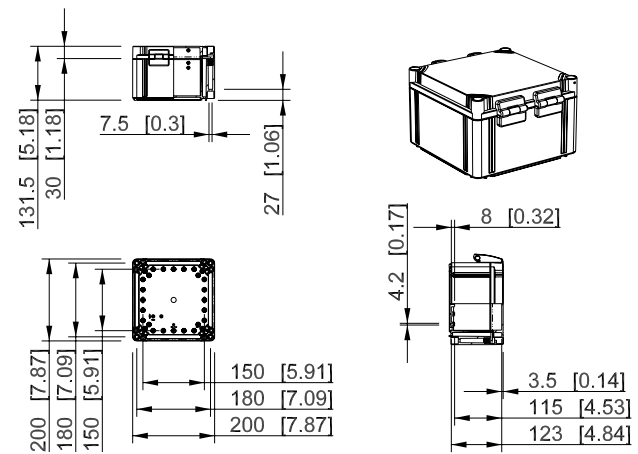
Grey cover	Transparent cover	Description
CPCF406013G	CPCF406013T	6 x F2 knockout, PC

## Ensto Cubo C 400 x 600 x 187 mm



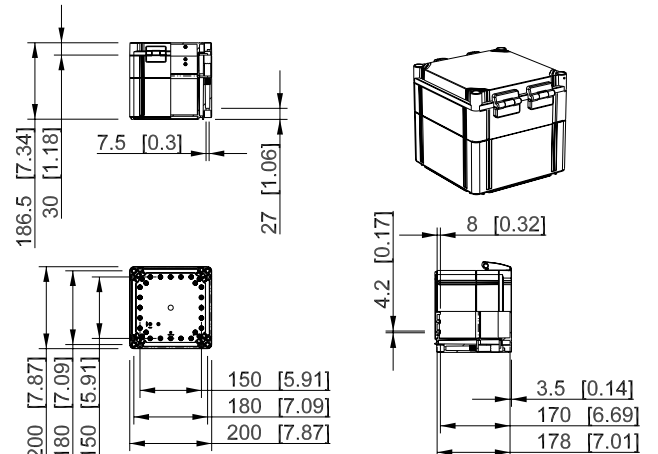
Grey cover	Transparent cover	Description
CPCF406018G	CPCF406018T	6 x F2 knockout, PC

## Ensto Cubo W 200 x 200 x 132 mm



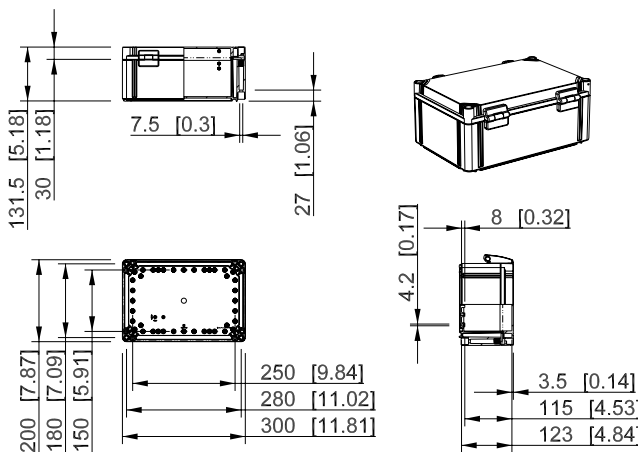
Grey cover	Transparent cover	Description
WPCP202013G	WPCP202013T	Plain sides, polycarbonate

## Ensto Cubo W 200 x 200 x 187 mm



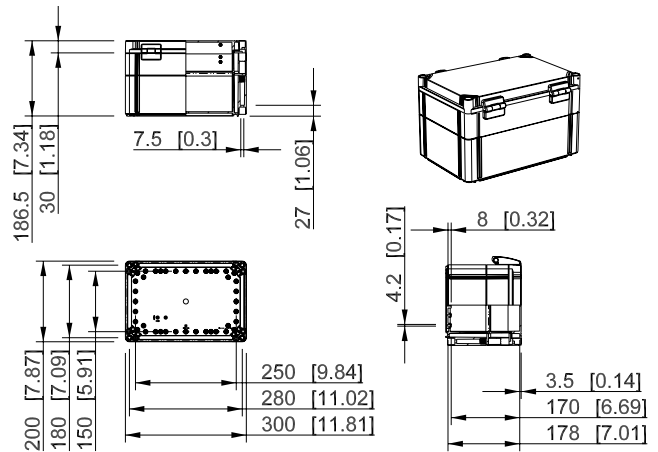
Grey cover	Transparent cover	Description
WPCP202018G	WPCP202018T	Plain sides, polycarbonate

## Ensto Cubo W 200 x 300 x 132 mm



Grey cover	Transparent cover	Description
WPCP203013G	WPCP203013T	Plain sides, polycarbonate

## Ensto Cubo W 200 x 300 x 187 mm



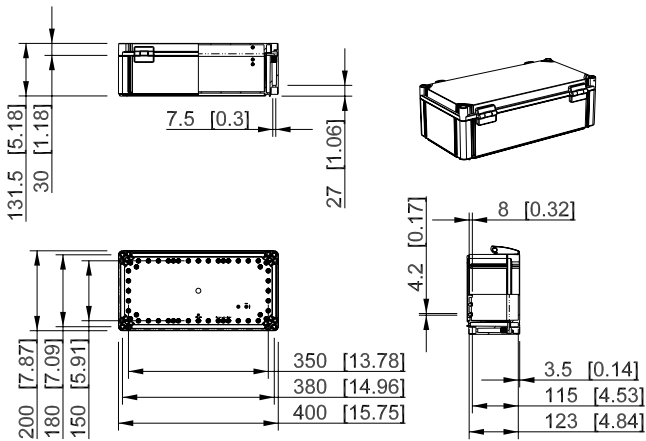
Grey cover	Transparent cover	Description
WPCP203018G	WPCP203018T	Plain sides, polycarbonate



# Dimensional drawings, Ensto Cubo W

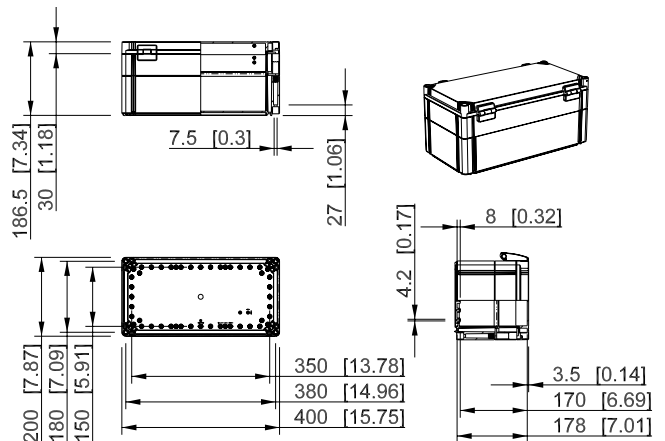
Dimensions in mm [inches]

## Ensto Cubo W 200 x 400 x 132 mm



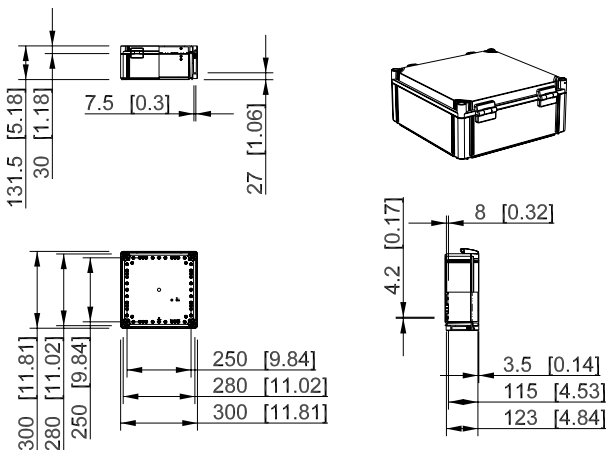
Grey cover	Transparent cover	Description
WPCP204013G	WPCP204013T	Plain sides, polycarbonate

## Ensto Cubo W 200 x 400 x 187 mm



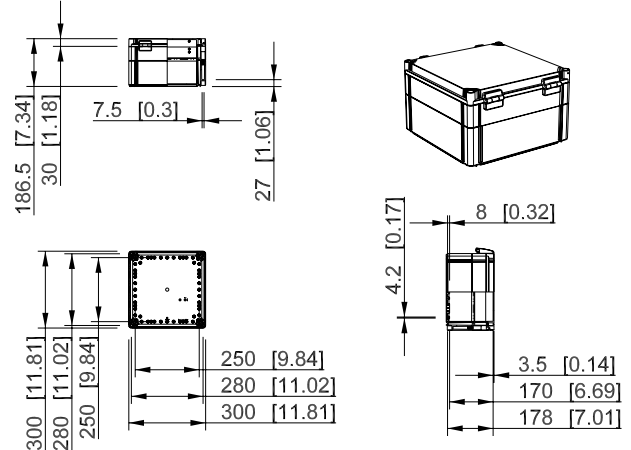
Grey cover	Transparent cover	Description
WPCP204018G	WPCP204018T	Plain sides, polycarbonate

## Ensto Cubo W 300 x 300 x 132 mm



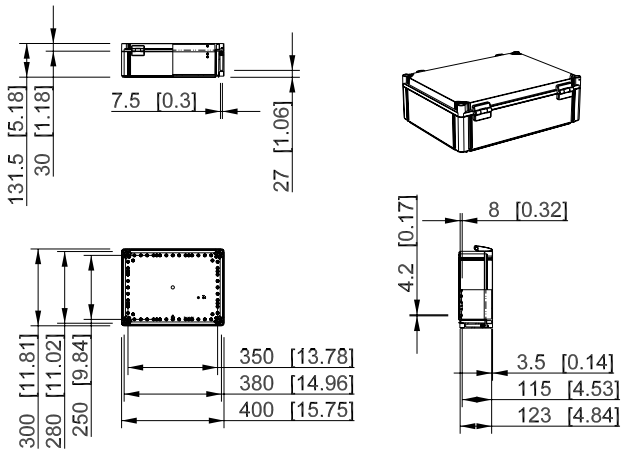
Grey cover	Transparent cover	Description
WPCP303013G	WPCP303013T	Plain sides, polycarbonate

## Ensto Cubo W 300 x 300 x 187 mm



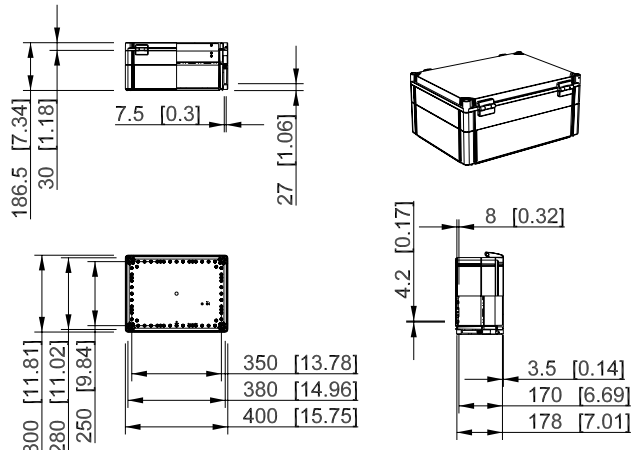
Grey cover	Transparent cover	Description
WPCP303018G	WPCP303018T	Plain sides, polycarbonate

## Ensto Cubo W 300 x 400 x 132 mm



Grey cover	Transparent cover	Description
WPCP304013G	WPCP304013T	Plain sides, polycarbonate

## Ensto Cubo W 300 x 400 x 187 mm

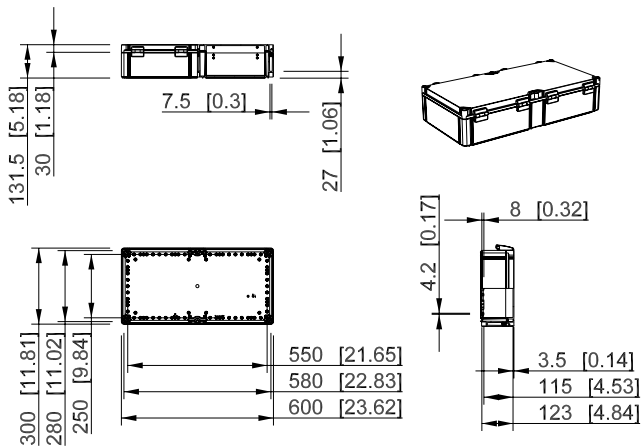


Grey cover	Transparent cover	Description
WPCP304018G	WPCP304018T	Plain sides, polycarbonate

# Dimensional drawings, Ensto Cubo W

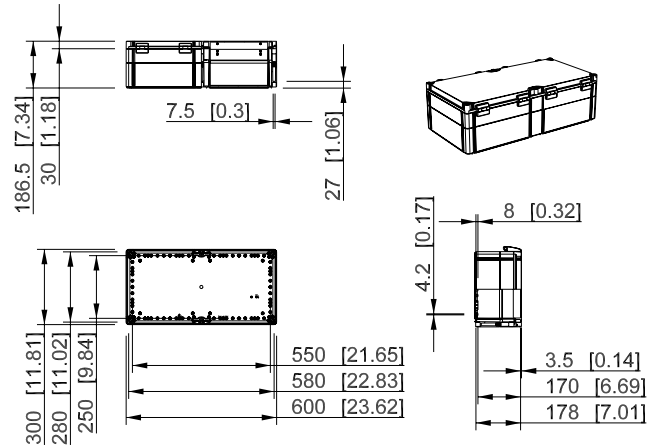
Dimensions in mm [inches]

## Ensto Cubo W 300 x 600 x 132 mm



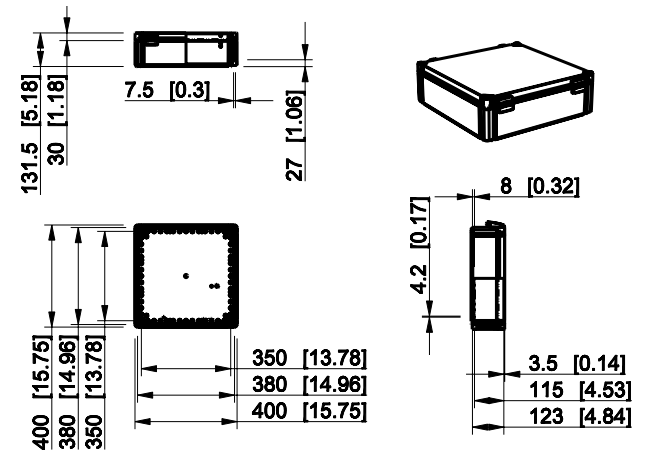
Grey cover	Transparent cover	Description
WPCP306013G	WPCP306013T	Plain sides, polycarbonate

## Ensto Cubo W 300 x 600 x 187 mm



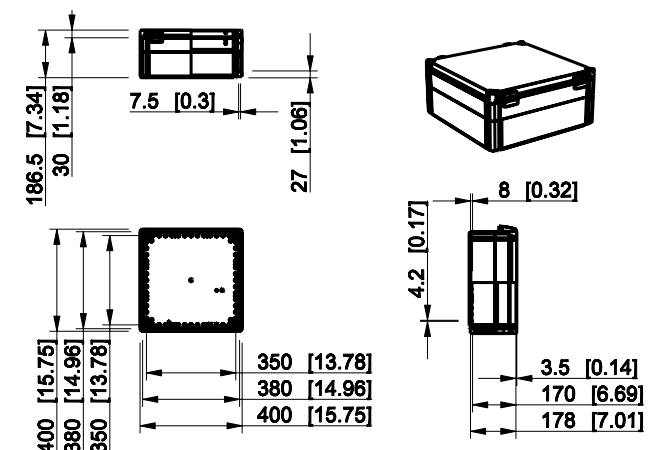
Grey cover	Transparent cover	Description
WPCP306018G	WPCP306018T	Plain sides, polycarbonate

## Ensto Cubo W 400 x 400 x 132 mm



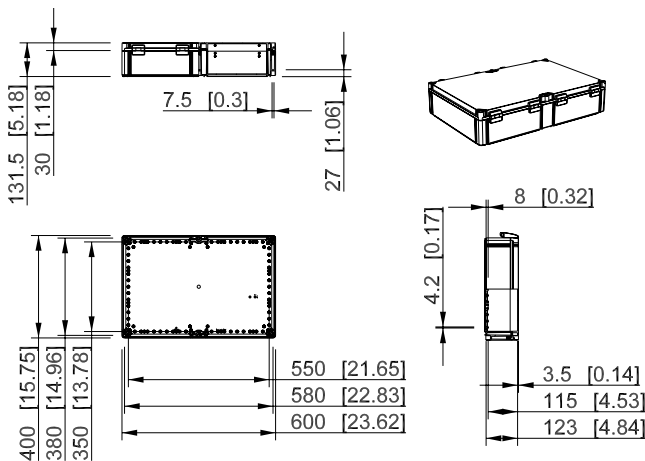
Grey cover	Transparent cover	Description
WPCP404013G	WPCP404013T	Plain sides, polycarbonate

## Ensto Cubo W 400 x 400 x 187 mm



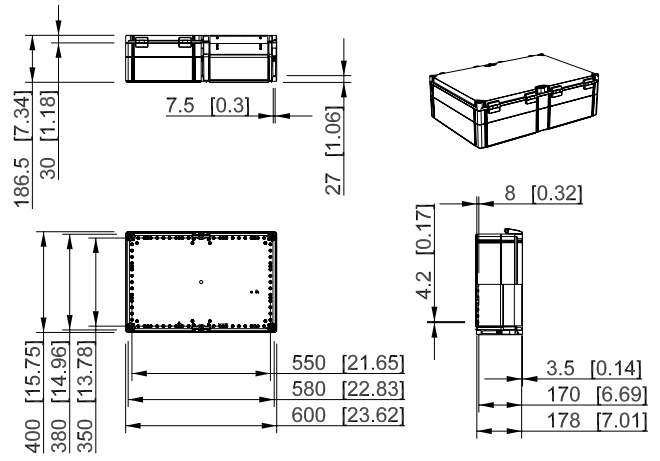
Grey cover	Transparent cover	Description
WPCP404018G	WPCP404018T	Plain sides, polycarbonate

## Ensto Cubo W 400 x 600 x 132 mm



Grey cover	Transparent cover	Description
WPCP406013G	WPCP406013T	Plain sides, polycarbonate

## Ensto Cubo W 400 x 600 x 187 mm

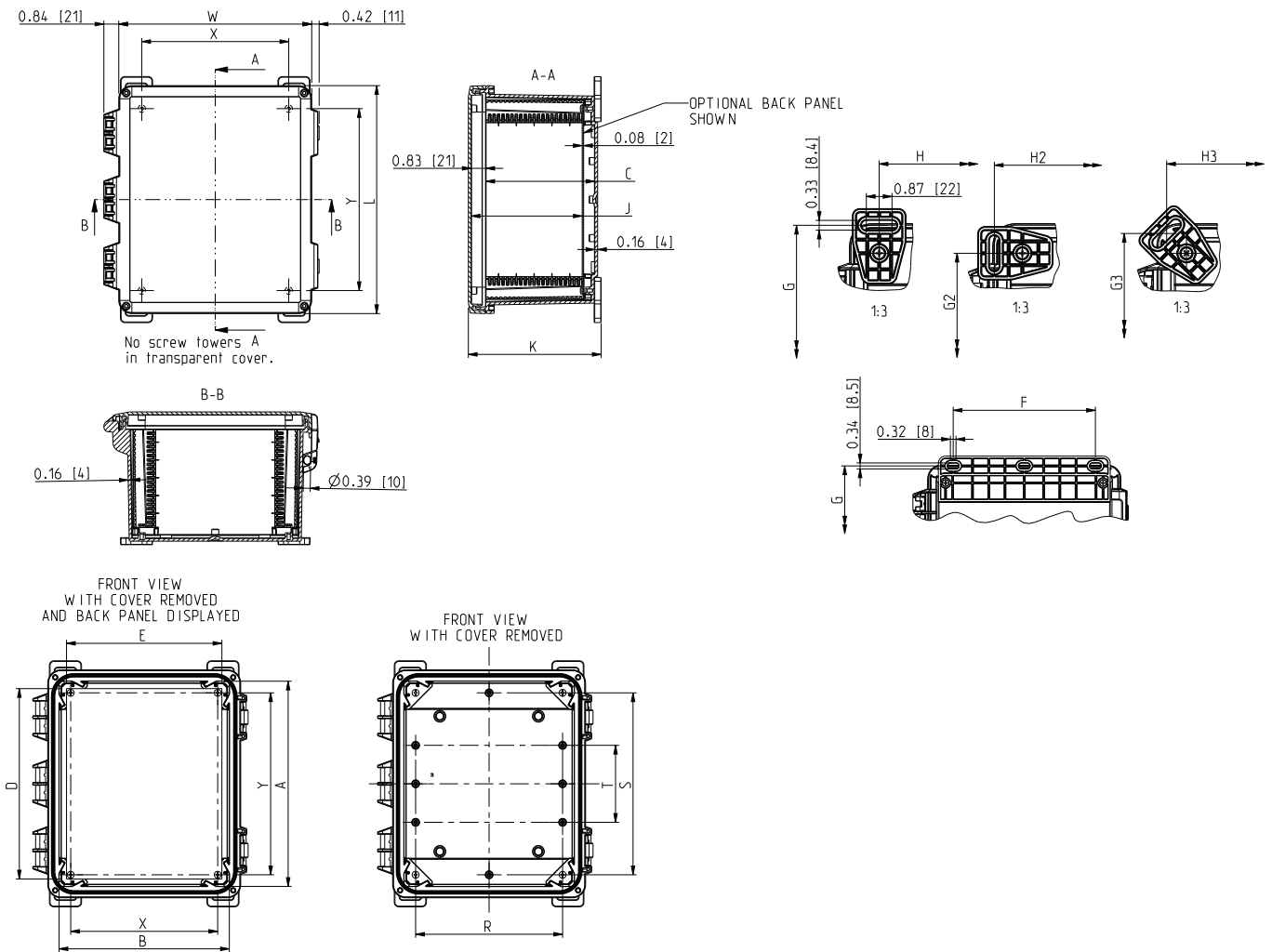


Grey cover	Transparent cover	Description
WPCP406018G	WPCP406018T	Plain sides, polycarbonate



# Dimensional drawings, Ensto PolyBox

Dimensions in mm [inches]



## Dimensional Chart

Product code	Internal dimensions				External dimensions			Panel size		Mounting dimensions					Panel mounting holes		Bottom screw tower dimensions		
	A	B	C	J	L	W	K	D	E	G	H	H2	H3	F	Y	X	S	T	R
UPC#080604****	190	139	105	108	223	172	139	171	120	222	123	171	157	102	159	108	163	-	108
UPC#100806****	243	192	156	159	276	225	190	222	171	273	174	222	208	152.4	210	159	210	65	159
UPC#121006****	293	243	156	159	326	276	190	272	222	323	225	273	259	203	260	210	260	110	210
UPC#181610****	450	399	257	260	482	431	291	425	374	476	377	425	411	356	413	362	413	138	362

Dimensions in mm

# = G = Grey (Opaque)  
T = Transparent

\*\*\*\* = HNL = Hinged, Nonmetal Snap Latch  
HML = Hinged, Metal Snap Latch

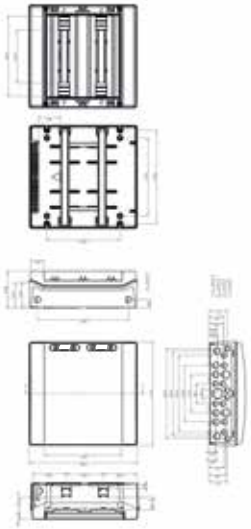
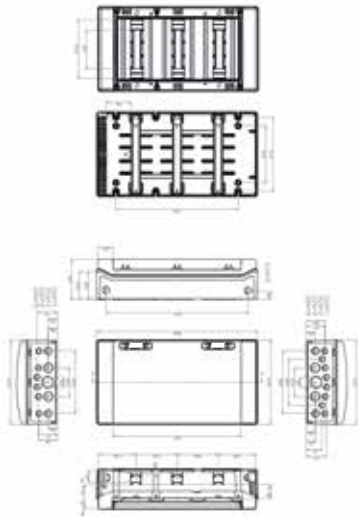
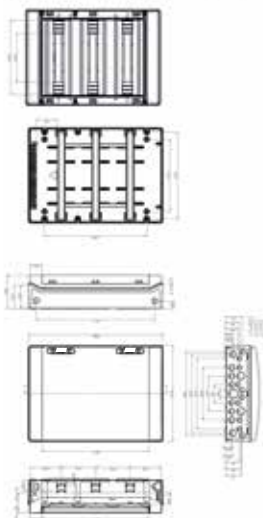
HS = Hinged 2-Screws, Padlock Clamp  
No Suffix = Lift-Off 4-Screws





# Dimensional drawings, Ensto Modulo

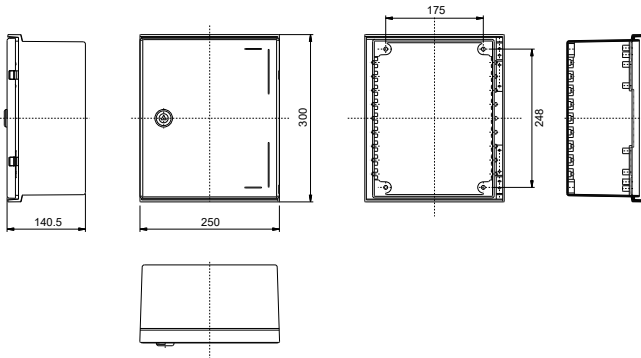
Dimensions in mm [inches]

<p><b>MODAB362PN</b></p>  <p>Technical drawings for MODAB362PN showing front, top, side, and rear views with dimensions.</p>	<p><b>MODAB363PN</b></p>  <p>Technical drawings for MODAB363PN showing front, top, side, and rear views with dimensions.</p>
<p><b>MODAB543PN</b></p>  <p>Technical drawings for MODAB543PN showing front, top, side, and rear views with dimensions.</p>	<p>Blank area for additional drawings or information.</p>

# Dimensional drawings, Ensto Cubo N

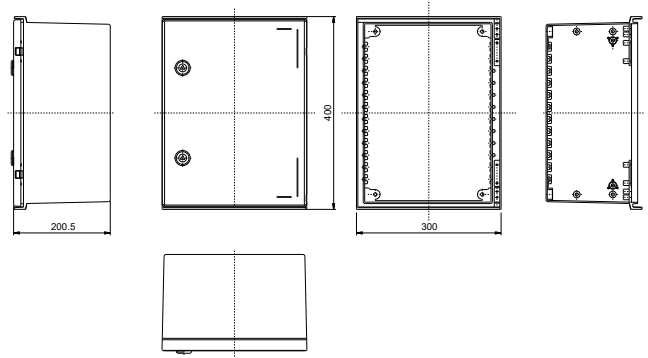
Dimensions in mm [inches]

## Ensto Cubo N 250 x 300 x 140 mm



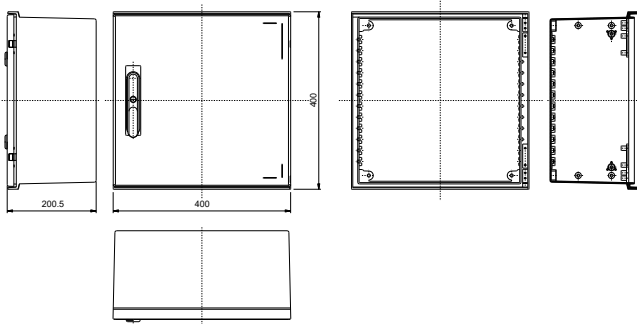
Product code	Description
NGRP253014	Plain sides, GRP
NGRP253014P3SH	Plain sides, swinghandle, GRP
NGRW253014	Plain sides, PC window: 115 x 220 mm, GRP

## Ensto Cubo N 300 x 400 x 200 mm



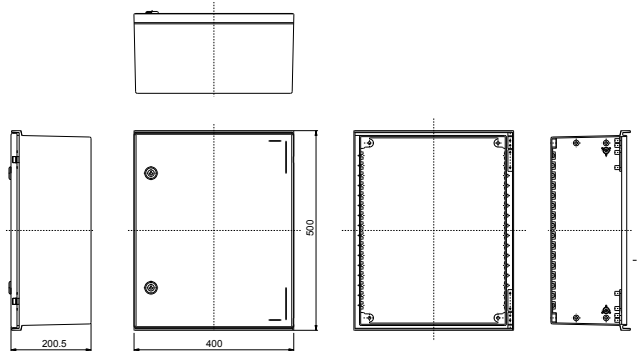
Product code	Description
NGRP304020	Plain sides, GRP
NGRP304020P3SH	Plain sides, swinghandle, GRP
NGRW304020	Plain sides, PC window: 141 x 281 mm, GRP

## Ensto Cubo N 400 x 400 x 200 mm



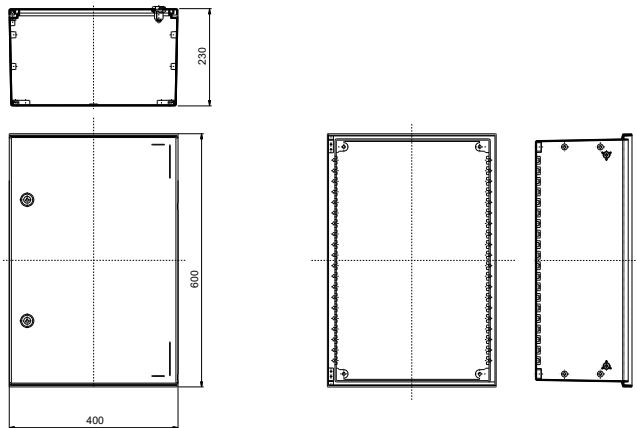
Product code	Description
NGRP404020	Plain sides, GRP
NGRP404020P3SH	Plain sides, swinghandle, GRP
NGRW404020	Plain sides, PC window: 221 x 281 mm, GRP

## Ensto Cubo N 400 x 500 x 200 mm



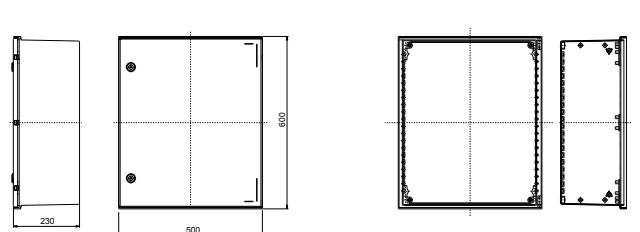
Product code	Description
NGRP405020	Plain sides, GRP
NGRP405020P3SH	Plain sides, swinghandle, GRP
NGRW405020	Plain sides, PC window: 221 x 381 mm, GRP

## Ensto Cubo N 400 x 600 x 230 mm



Product code	Description
NGRP406023	Plain sides, GRP
NGRP406023P3SH	Plain sides, swinghandle, GRP
NGRW406023	Plain sides, PC window: 221 x 481 mm, GRP

## Ensto Cubo N 500 x 600 x 230 mm



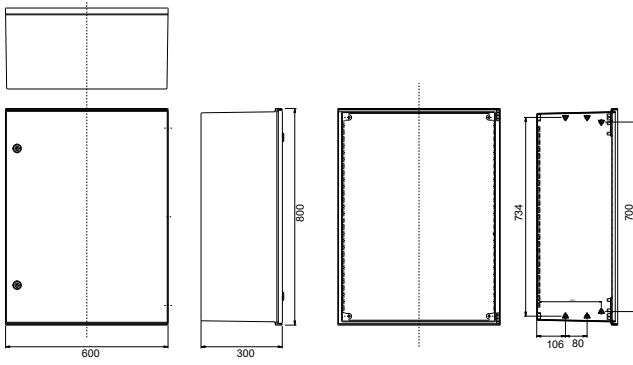
Product code	Description
NGRP506023	Plain sides, GRP
NGRP506023P3SH	Plain sides, swinghandle, GRP
NGRW506023	Plain sides, PC window: 321 x 481 mm, GRP



# Dimensional drawings, Ensto Cubo N

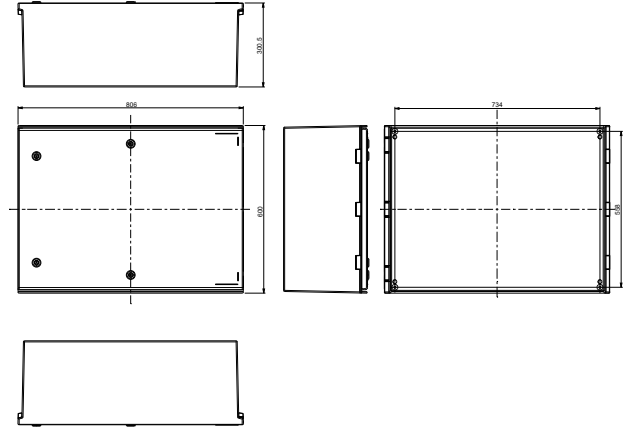
Dimensions in mm [inches]

## Ensto Cubo N 600 x 800 x 300 mm



Product code	Description
NGRP608030	Plain sides, GRP
NGRP608030P3SH	Plain sides, swinghandle, GRP
NGRW608030	Plain sides, PC window: 421 x 681 mm, GRP

## Ensto Cubo N 800 x 600 x 300 mm

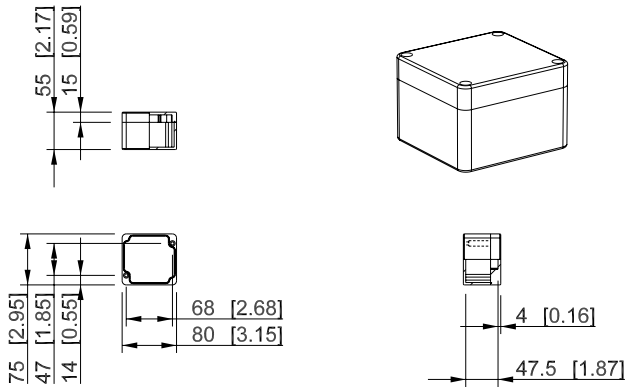


Product code	Description
NGRP806030	Plain sides, GRP
NGRP806030P3SH	Plain sides, swinghandle, GRP

# Dimensional drawings, Ensto Cubo M

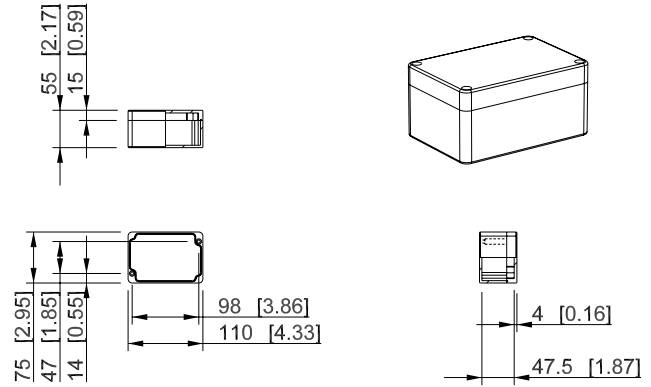
Dimensions in mm [inches]

## Ensto Cubo M 75 x 80 x 55 mm



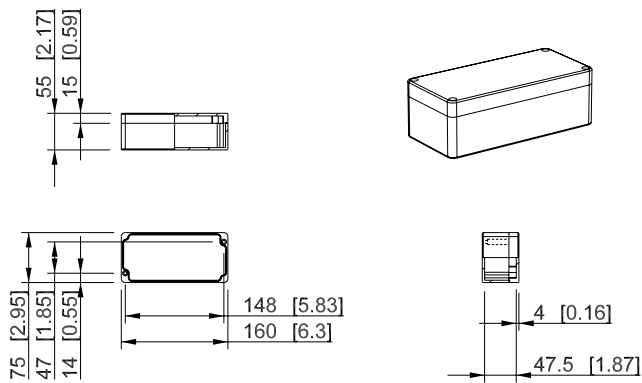
Product code	Description
MGRP080806	Plain sides, GRP

## Ensto Cubo M 75 x 110 x 55 mm



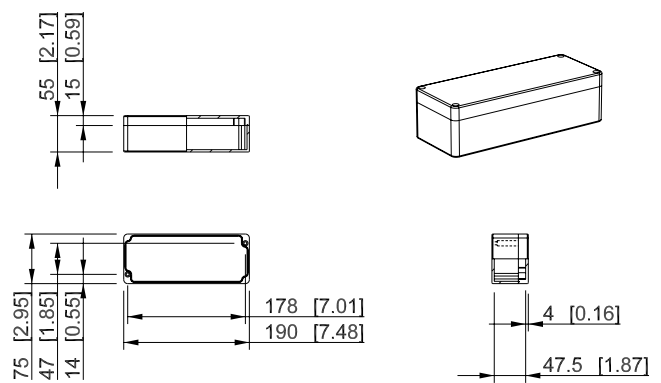
Product code	Description
MGRP081106	Plain sides, GRP

## Ensto Cubo M 75 x 160 x 55 mm



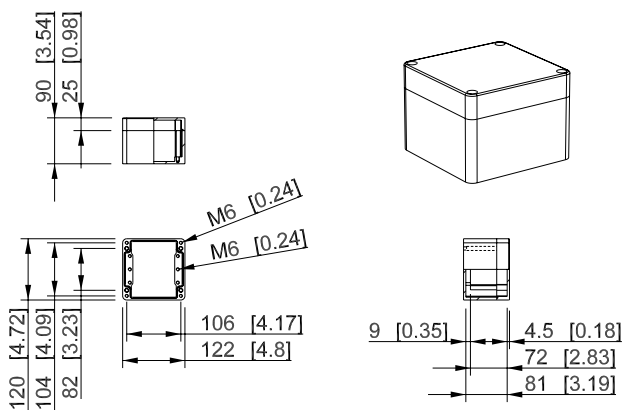
Product code	Description
MGRP081606	Plain sides, GRP

## Ensto Cubo M 75 x 190 x 55 mm



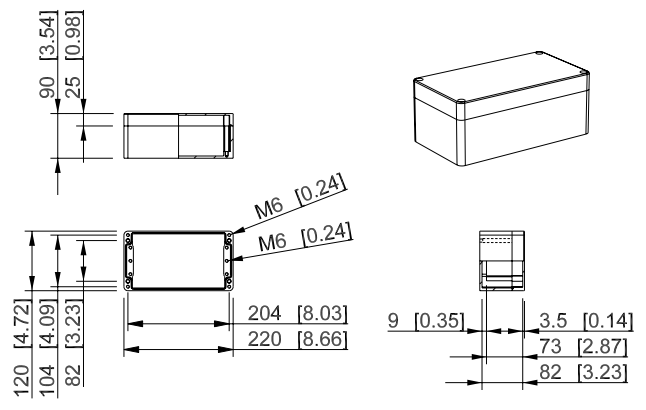
Product code	Description
MGRP081906	Plain sides, GRP

## Ensto Cubo M 120 x 122 x 90 mm



Product code	Description
MGRP121209	Plain sides, GRP

## Ensto Cubo M 120 x 220 x 90 mm



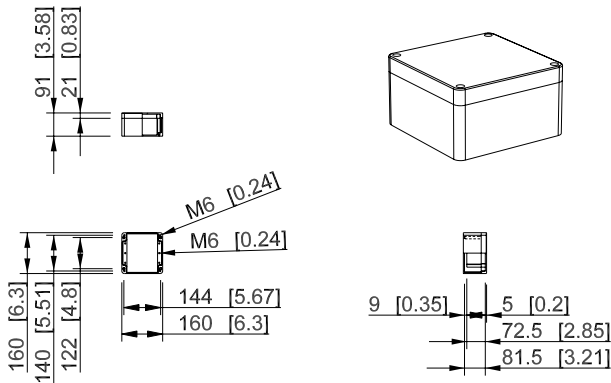
Product code	Description
MGRP122209	Plain sides, GRP



# Dimensional drawings, Ensto Cubo M

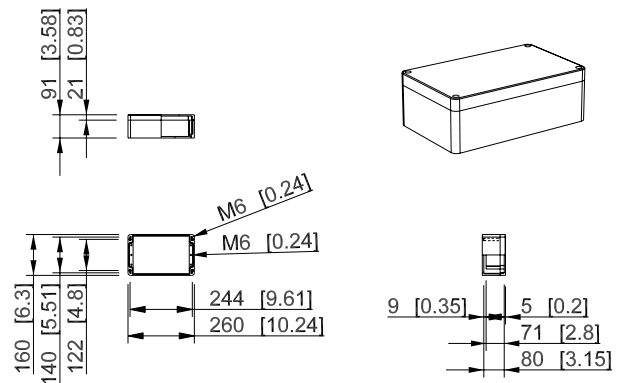
Dimensions in mm [inches]

## Ensto Cubo M 160 x 160 x 91 mm



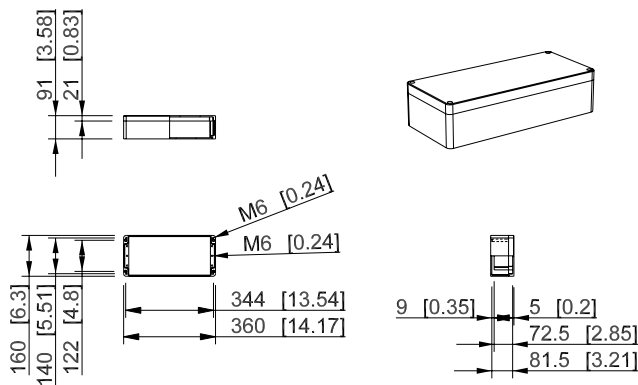
Product code	Description
MGRP161609	Plain sides, GRP

## Ensto Cubo M 160 x 260 x 91 mm



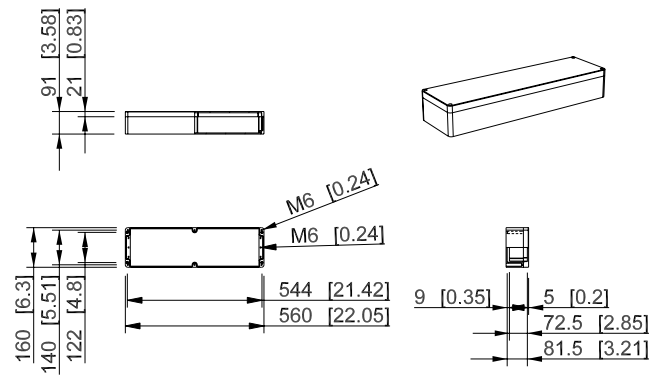
Product code	Description
MGRP162609	Plain sides, GRP

## Ensto Cubo M 160 x 360 x 91 mm



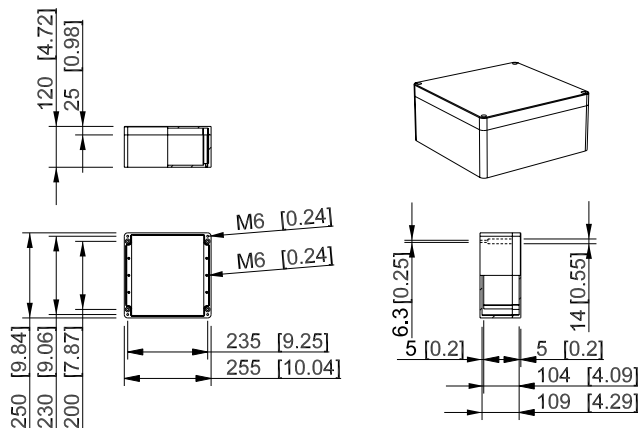
Product code	Description
MGRP163609	Plain sides, GRP

## Ensto Cubo M 160 x 560 x 91 mm



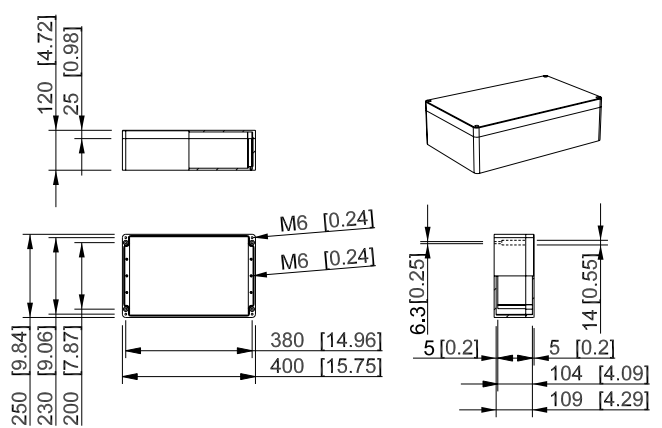
Product code	Description
MGRP165609	Plain sides, GRP

## Ensto Cubo M 250 x 255 x 120 mm



Product code	Description
MGRP252612	Plain sides, GRP

## Ensto Cubo M 250 x 400 x 120 mm

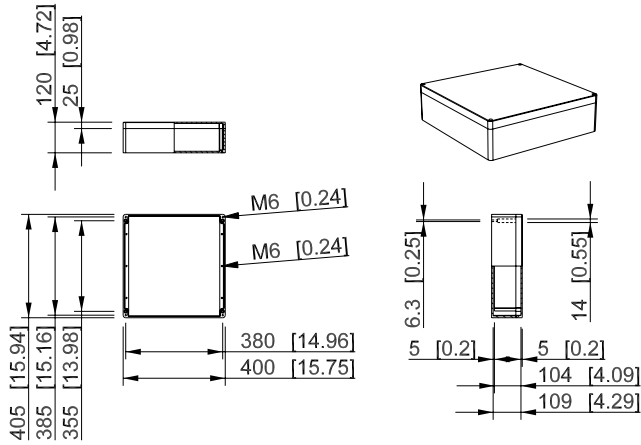


Product code	Description
MGRP254012	Plain sides, GRP

# Dimensional drawings, Ensto Cubo M

Dimensions in mm [inches]

## Ensto Cubo M 400 x 405 x 120 mm

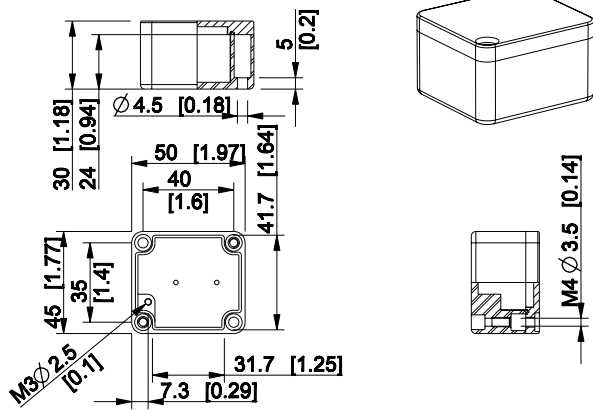


Product code	Description
MGRP404112	Plain sides, GRP

# Dimensional drawings, Ensto Cubo H

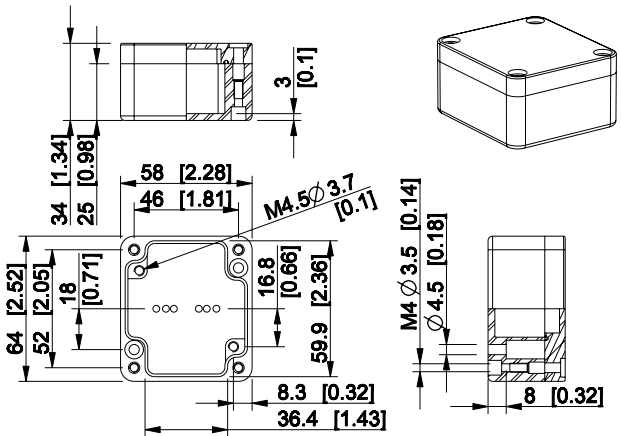
Dimensions in mm [inches]

**Ensto Cubo H 50 x 45 x 30 mm**



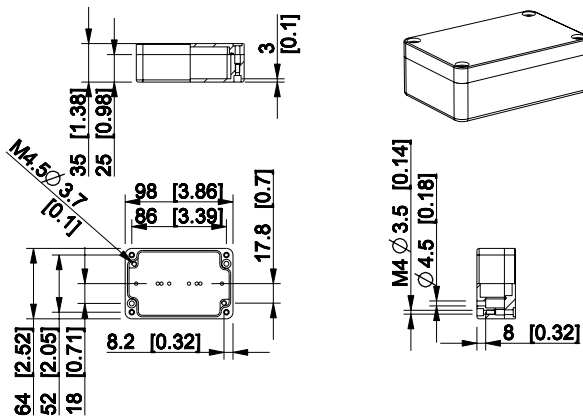
Product code	Description
HALP050503	Plain sides, aluminium

**Ensto Cubo H 64 x 58 x 34 mm**



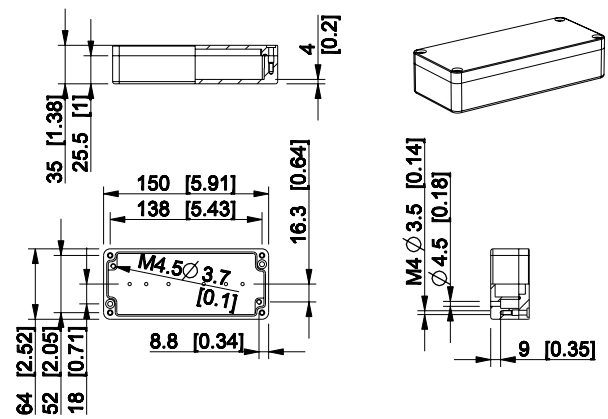
Product code	Description
HALP060604	Plain sides, aluminium

**Ensto Cubo H 64 x 98 x 35 mm**



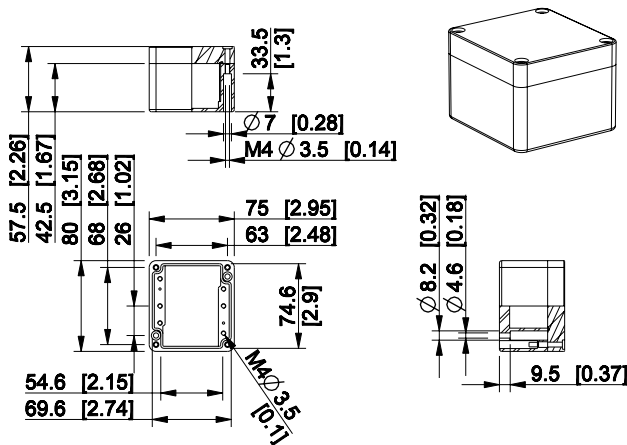
Product code	Description
HALP061004	Plain sides, aluminium

**Ensto Cubo H 64 x 150 x 35 mm**



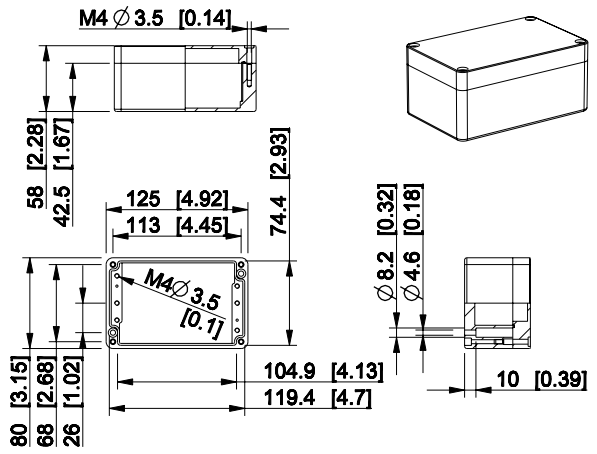
Product code	Description
HALP061504	Plain sides, aluminium

**Ensto Cubo H 80 x 75 x 57,5 mm**



Product code	Description
HALP080806	Plain sides, aluminium

**Ensto Cubo H 80 x 125 x 58 mm**



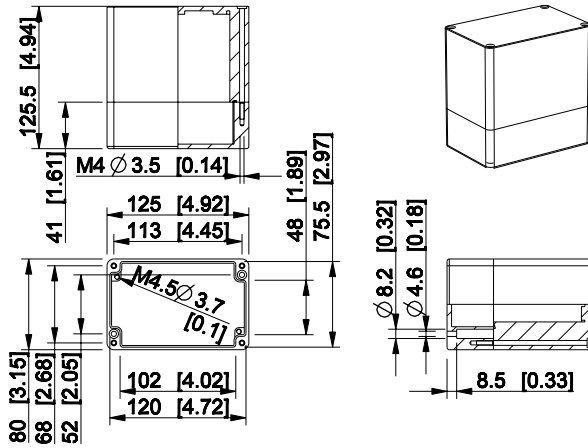
Product code	Description
HALP081306	Plain sides, aluminium



# Dimensional drawings, Ensto Cubo H

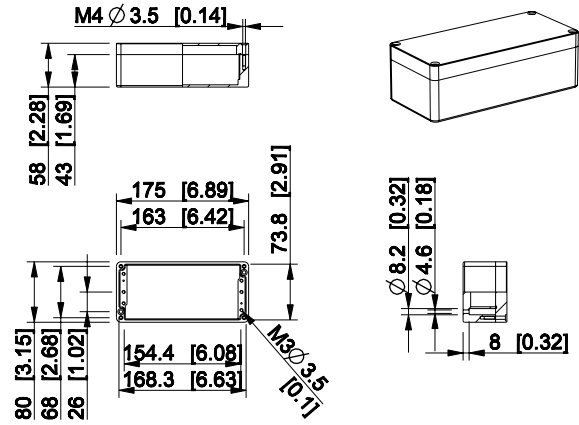
Dimensions in mm [inches]

## Ensto Cubo H 80 x 125 x 125,5 mm



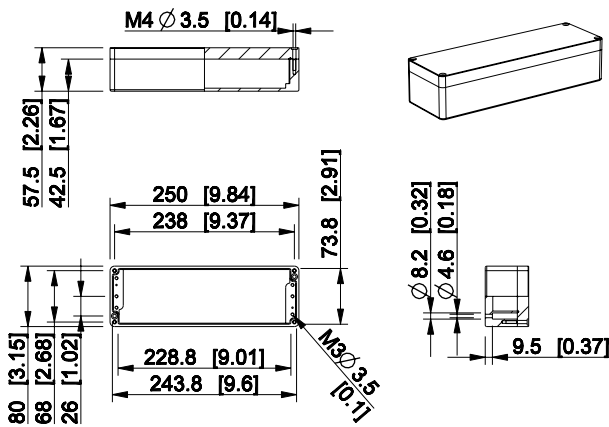
Product code	Description
HALP081313	Plain sides, aluminium

## Ensto Cubo H 80 x 175 x 58 mm



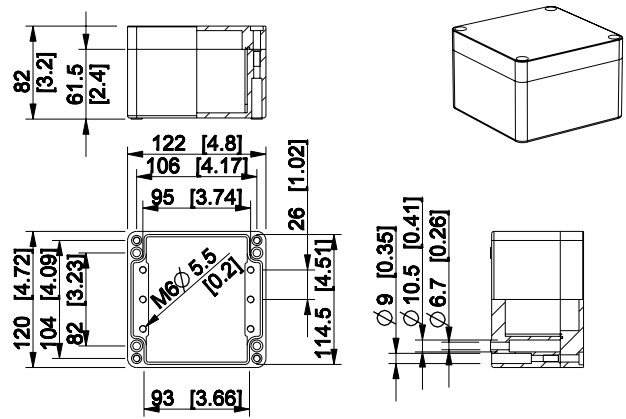
Product code	Description
HALP081806	Plain sides, aluminium

## Ensto Cubo H 80 x 250 x 57,5 mm



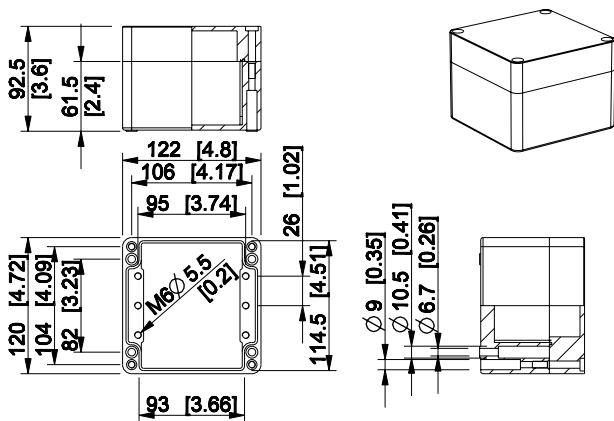
Product code	Description
HALP082506	Plain sides, aluminium

## Ensto Cubo H 120 x 122 x 82 mm



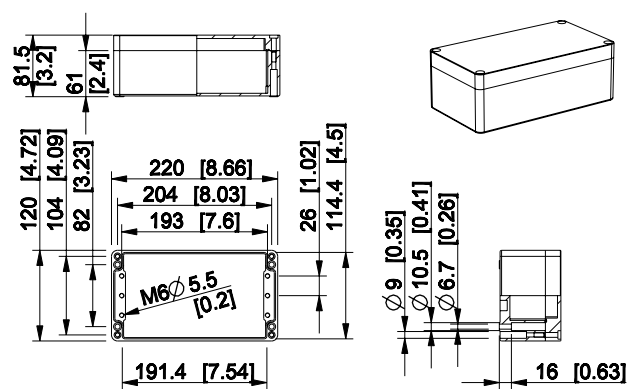
Product code	Description
HALP121208	Plain sides, aluminium

## Ensto Cubo H 120 x 122 x 92,5 mm



Product code	Description
HALP121209	Plain sides, aluminium

## Ensto Cubo H 120 x 220 x 81,5 mm



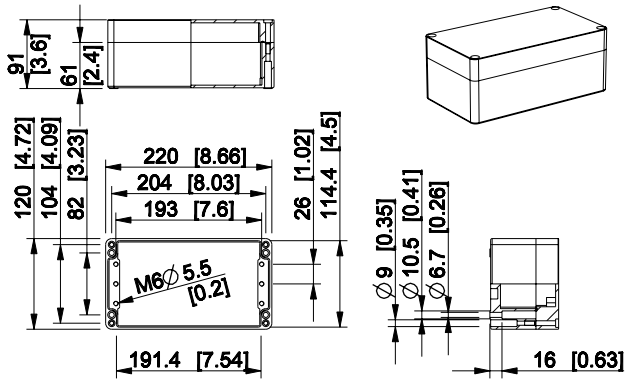
Product code	Description
HALP122208	Plain sides, aluminium



# Dimensional drawings, Ensto Cubo H

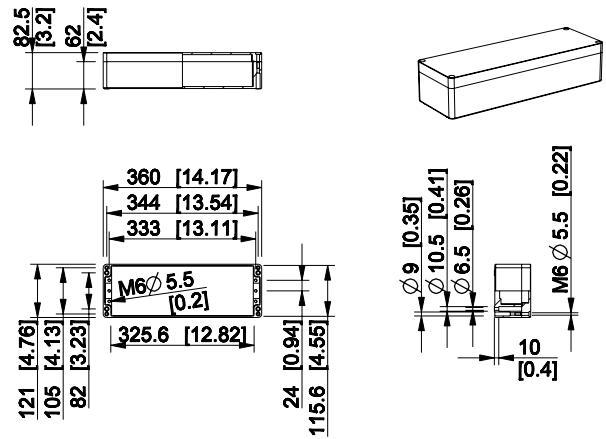
Dimensions in mm [inches]

Ensto Cubo H 120 x 220 x 91 mm



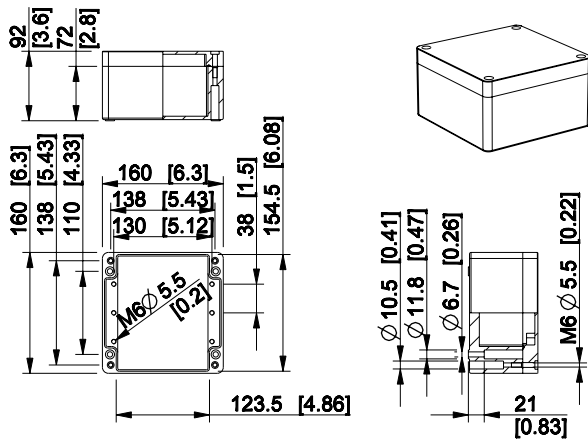
Product code	Description
HALP122009	Plain sides, aluminium

Ensto Cubo H 121 x 360 x 82,5 mm



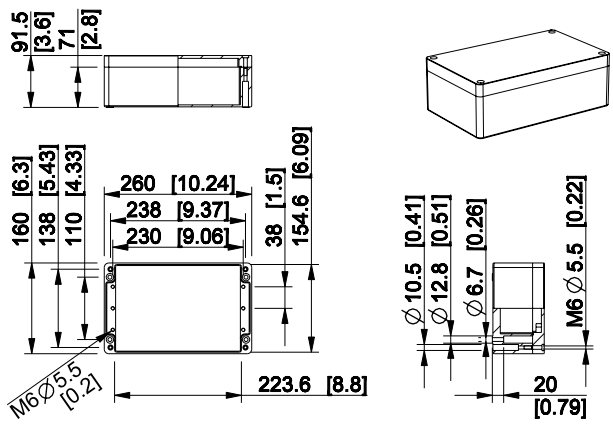
Product code	Description
HALP123608	Plain sides, aluminium

Ensto Cubo H 160 x 160 x 92 mm



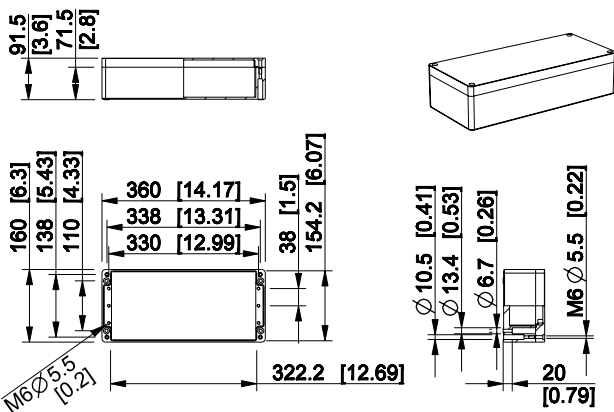
Product code	Description
HALP161609	Plain sides, aluminium

Ensto Cubo H 160 x 260 x 91,5 mm



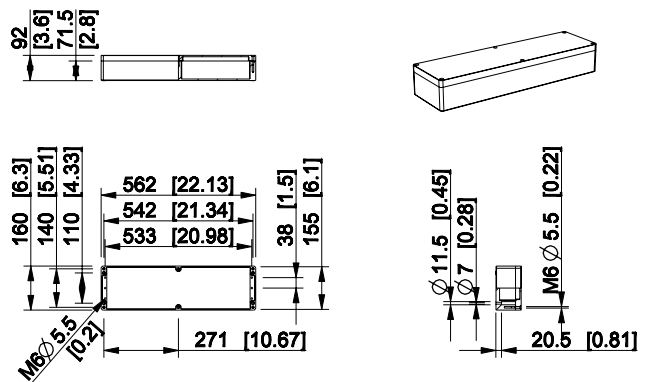
Product code	Description
HALP162609	Plain sides, aluminium

Ensto Cubo H 160 x 360 x 91,5 mm



Product code	Description
HALP163609	Plain sides, aluminium

Ensto Cubo H 160 x 562 x 92 mm

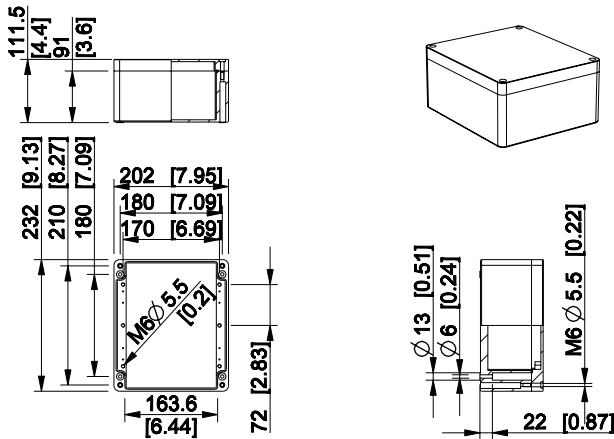


Product code	Description
HALP165609	Plain sides, aluminium

# Dimensional drawings, Ensto Cubo H

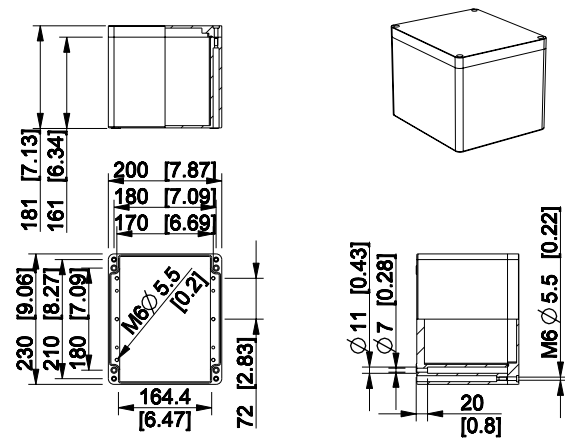
Dimensions in mm [inches]

## Ensto Cubo H 202 x 232 x 111,5 mm



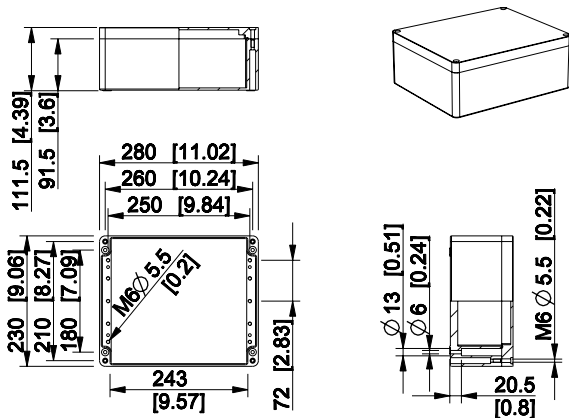
Product code	Description
HALP202311	Plain sides, aluminium

## Ensto Cubo H 200 x 230 x 181 mm



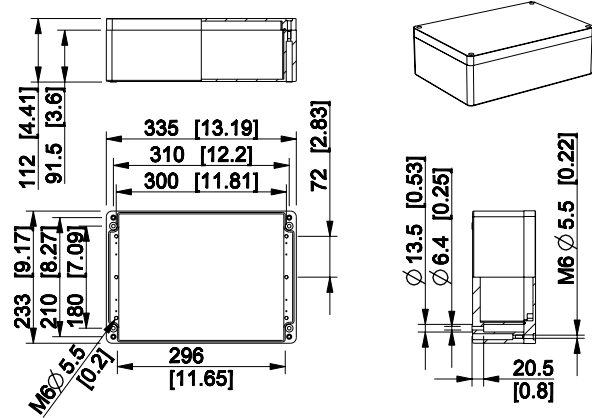
Product code	Description
HALP202318	Plain sides, aluminium

## Ensto Cubo H 230 x 280 x 111,5 mm



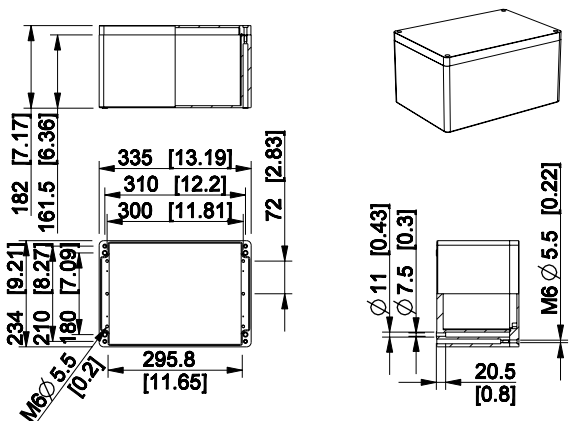
Product code	Description
HALP232811	Plain sides, aluminium

## Ensto Cubo H 233 x 335 x 112 mm



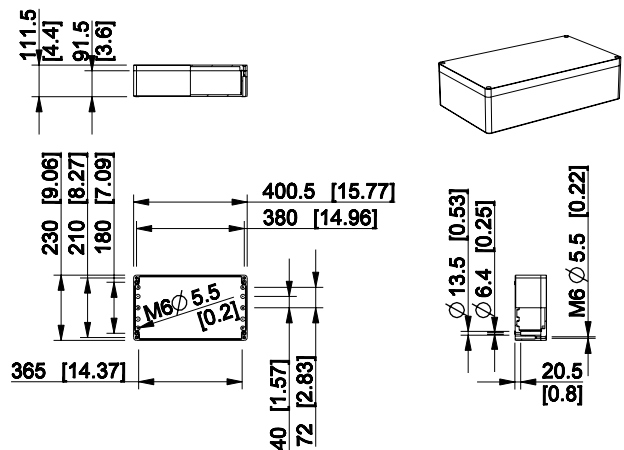
Product code	Description
HALP233311	Plain sides, aluminium

## Ensto Cubo H 234 x 335 x 182 mm



Product code	Description
HALP233318	Plain sides, aluminium

## Ensto Cubo H 230 x 400,5 x 111,5 mm



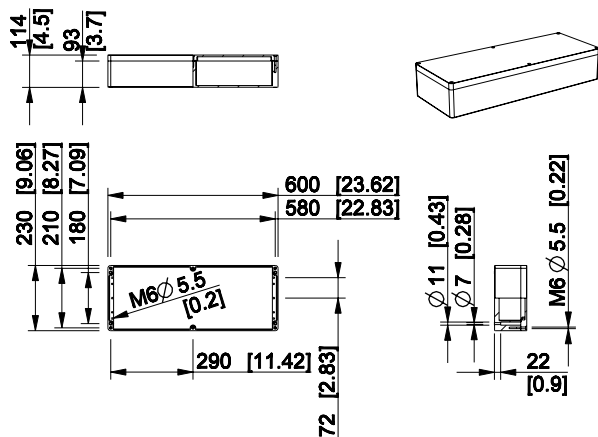
Product code	Description
HALP234011	Plain sides, aluminium



# Dimensional drawings, Ensto Cubo H

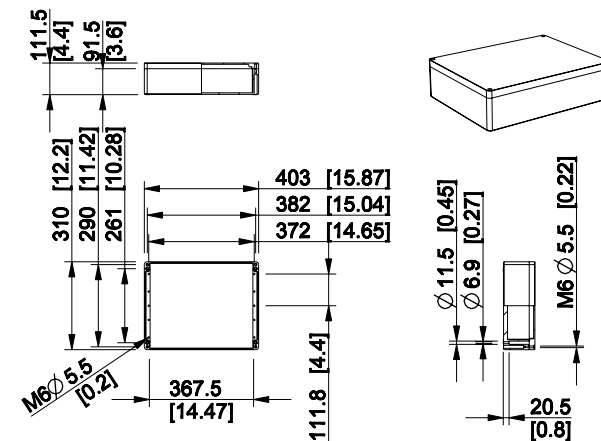
Dimensions in mm [inches]

**Ensto Cubo H 230 x 600 x 114 mm**



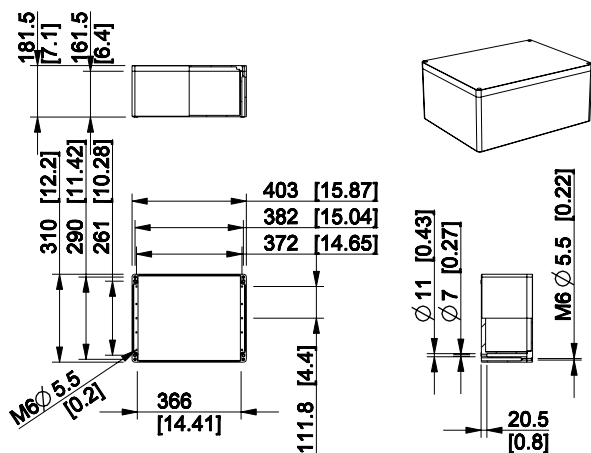
Product code	Description
HALP236011	Plain sides, aluminium

**Ensto Cubo H 310 x 403 x 111,5 mm**



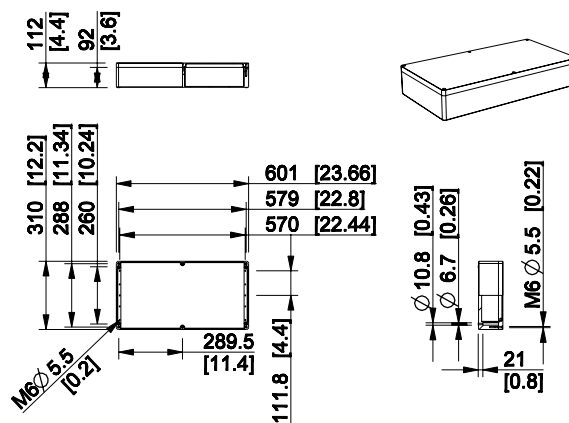
Product code	Description
HALP314011	Plain sides, aluminium

**Ensto Cubo H 310 x 403 x 181,5 mm**



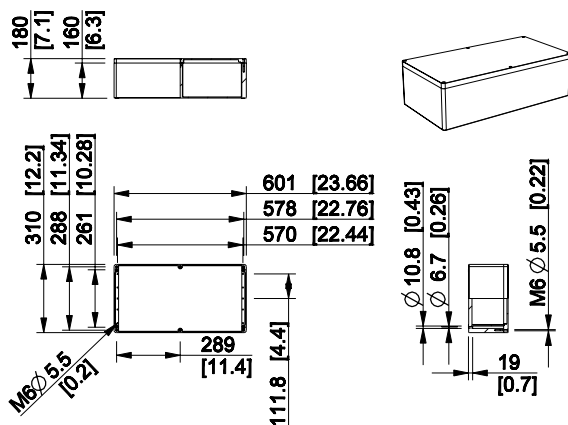
Product code	Description
HALP314018	Plain sides, aluminium

**Ensto Cubo H 310 x 601 x 112 mm**



Product code	Description
HALP316011	Plain sides, aluminium

**Ensto Cubo H 310 x 601 x 180 mm**

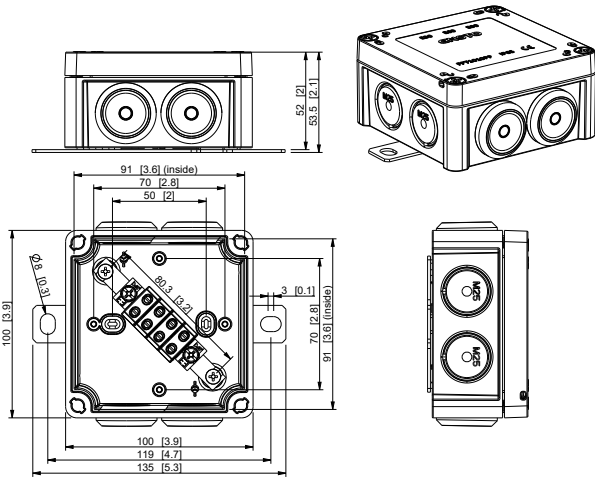


Product code	Description
HALP316018	Plain sides, aluminium

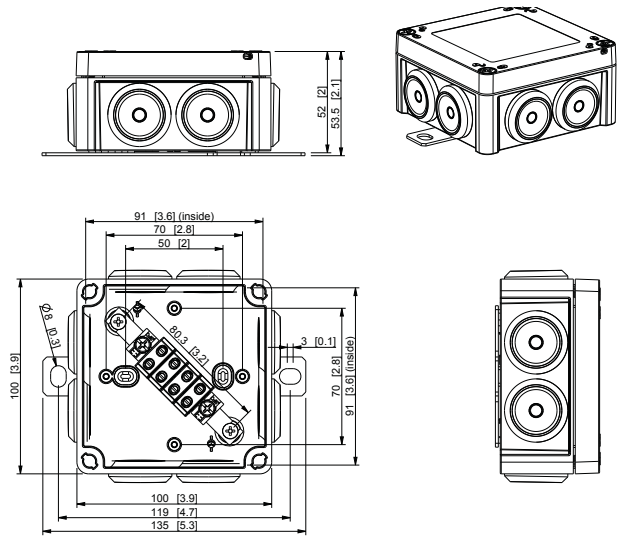
# Dimensional drawings, Ensto Vulcano

Dimensions in mm [inches]

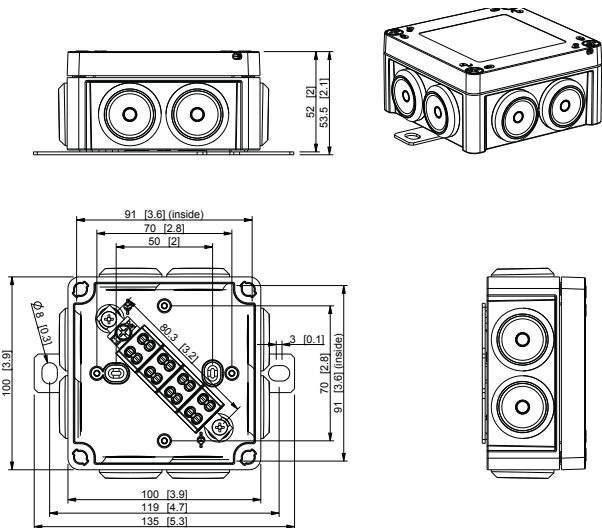
### FPT1010PP46.LITE



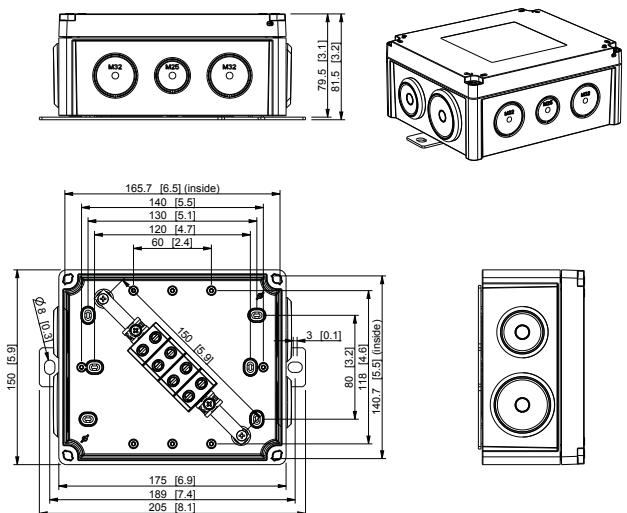
### FPT1010PP46



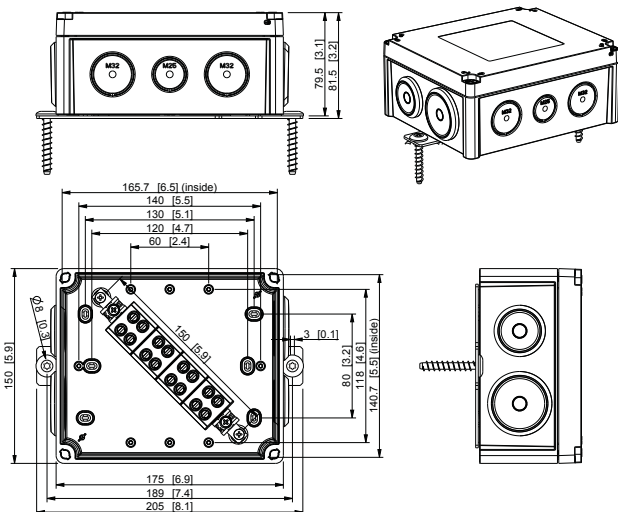
### FPT1010PP46.4



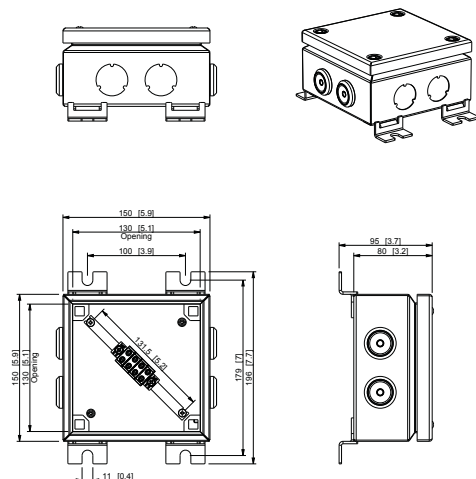
### FPT1815PP416



### FPT1815PP416.4



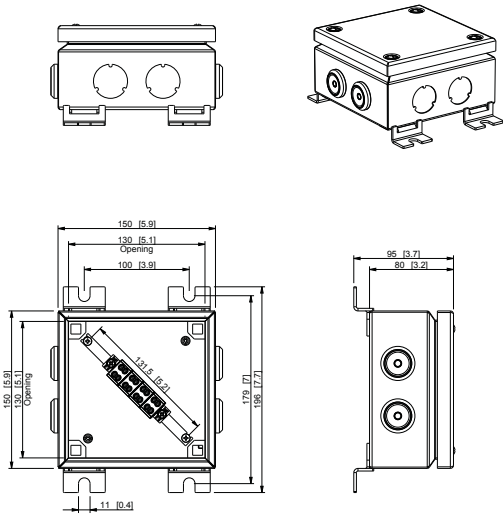
### FPT1515FE46



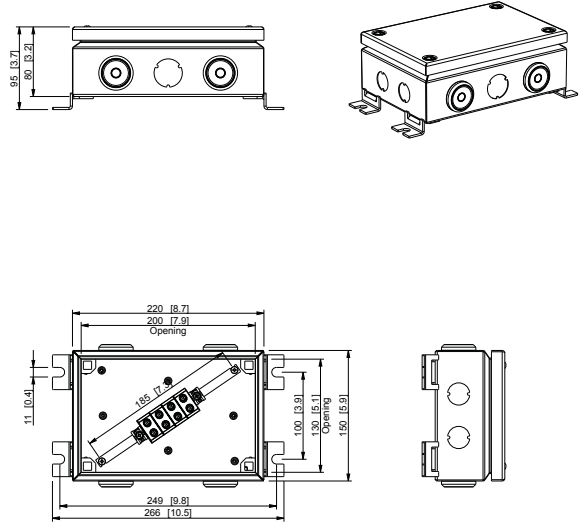
# Dimensional drawings, Ensto Vulcano

Dimensions in mm [inches]

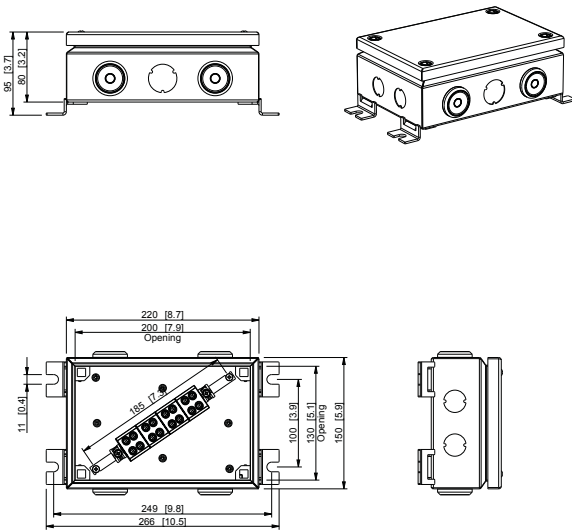
**FPT1515FE46.4**



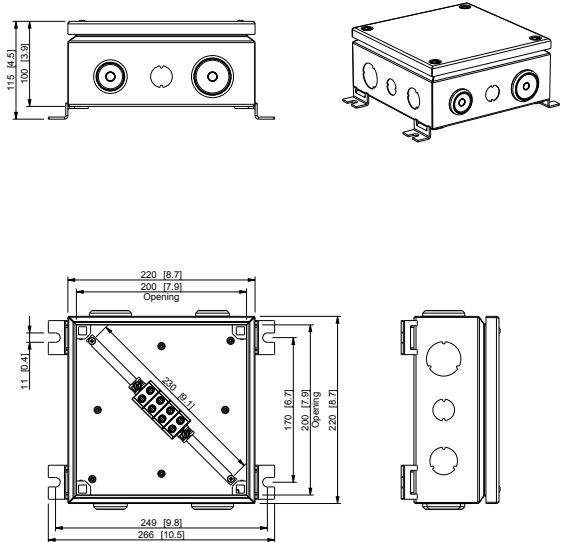
**FPT2215FE416**



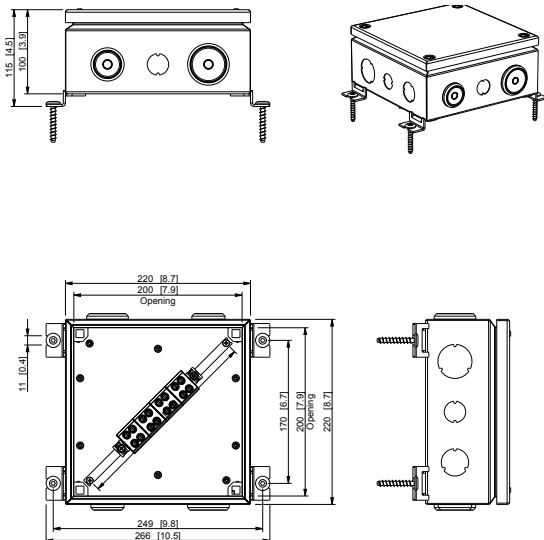
**FPT2215FE416.4**



**FTP2222FE416**



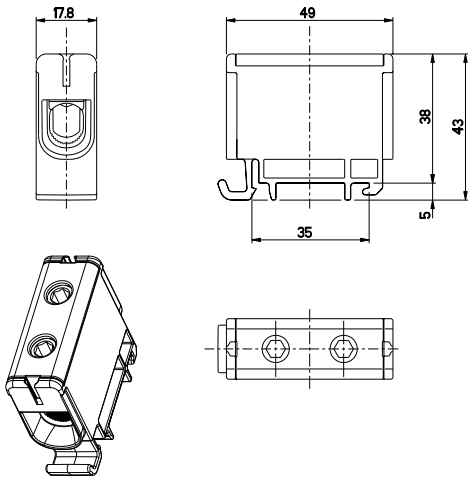
**FTP2222FE416.4**



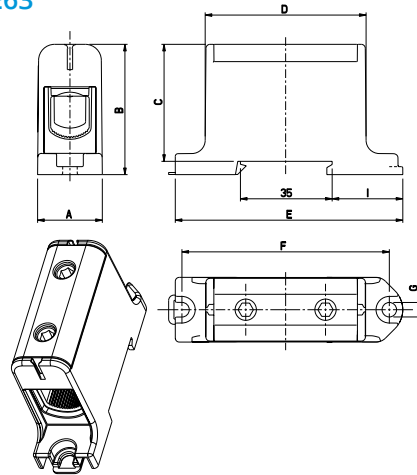
# Dimensional drawings, Ensto Vulcano

Dimensions in mm [inches]

**KE61**

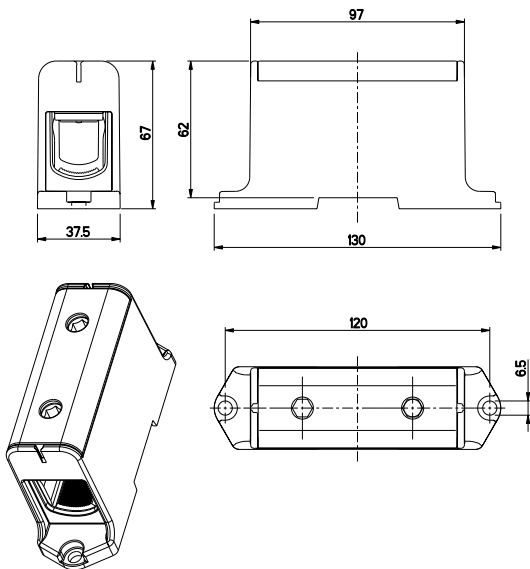


**KE62, KE63**

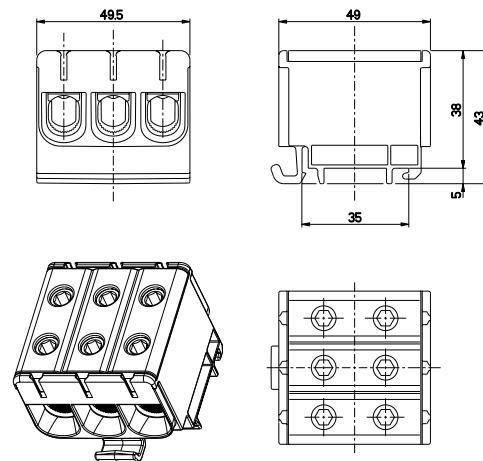


	A	B	C	D	E	F	G	I
KE62	24	49	44	60	86	78	5.5	25.5
KE63	29.5	59	54	72	95	87	5.5	34.5

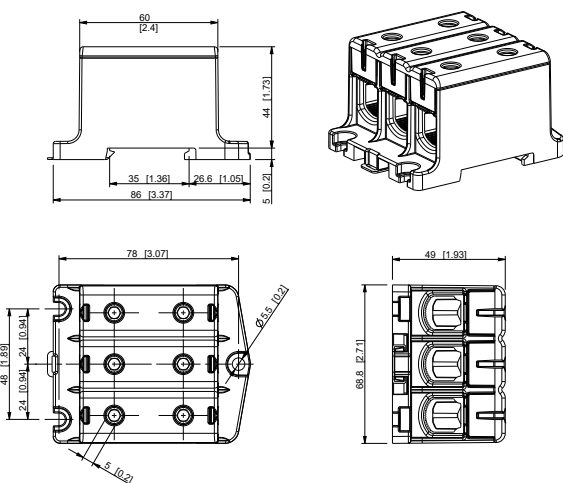
**KE64**



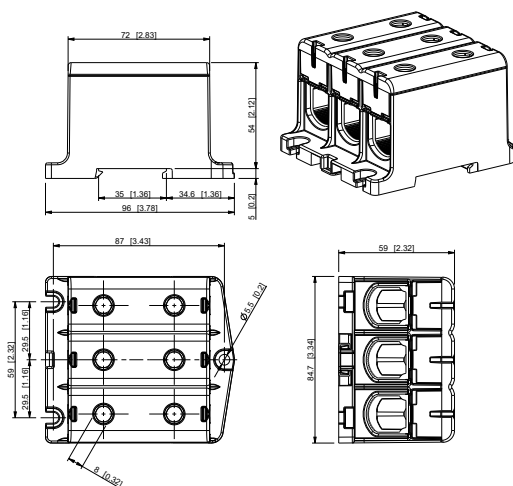
**KE61.03**



**KE62.03**



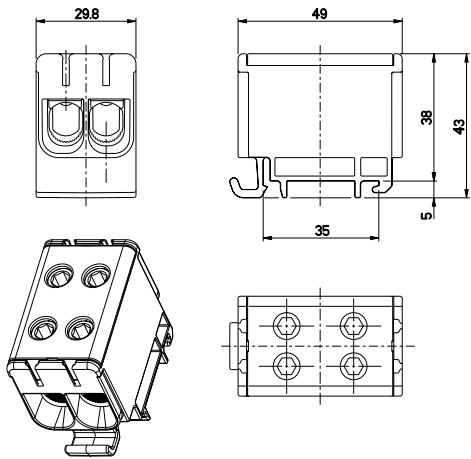
**KE63.03**



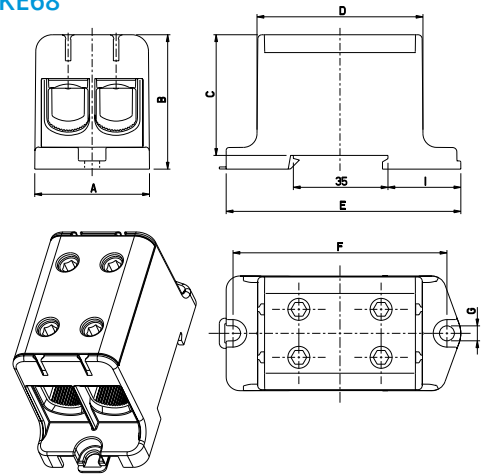
# Dimensional drawings, Ensto Clampo Pro universal terminals

Dimensions in mm

## KE66

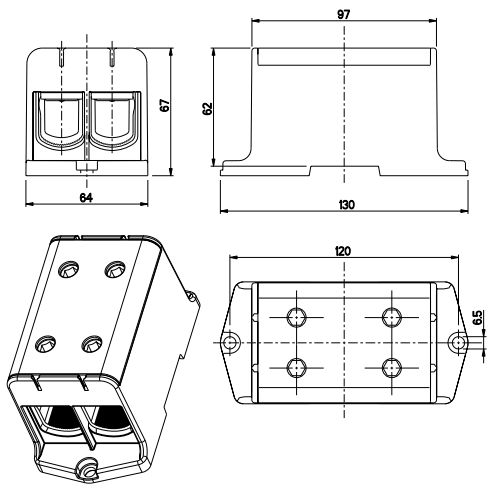


## KE67, KE68



	A	B	C	D	E	F	G	I
KE67	42	49	44	60	86	78	5.5	25.5
KE68	51.5	59	54	72	95	87	5.5	34.5

## KE69

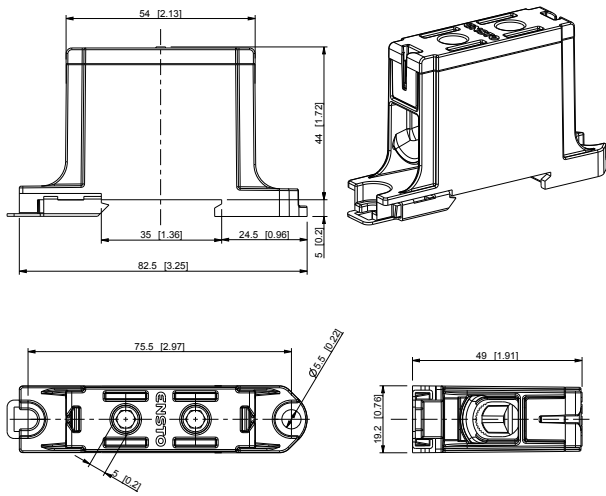




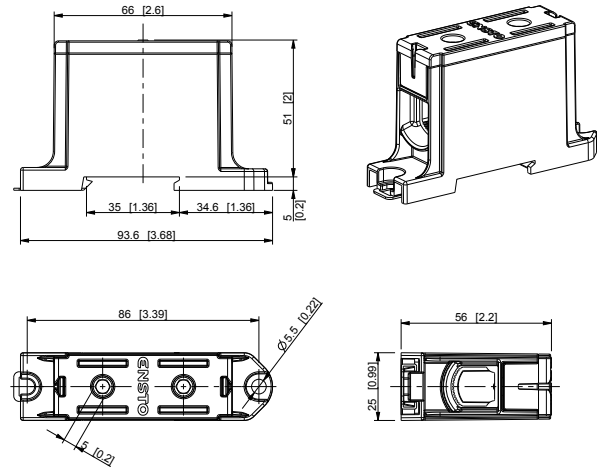
# Dimensional drawings, Ensto Clampo Pro 1000 V terminals

Dimensions in mm [inches]

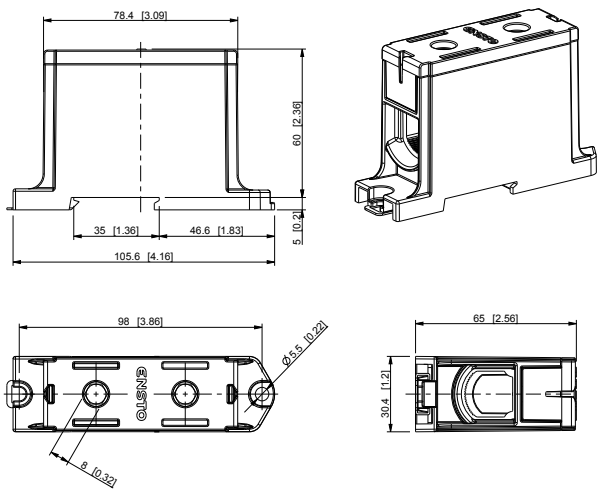
**KE161**



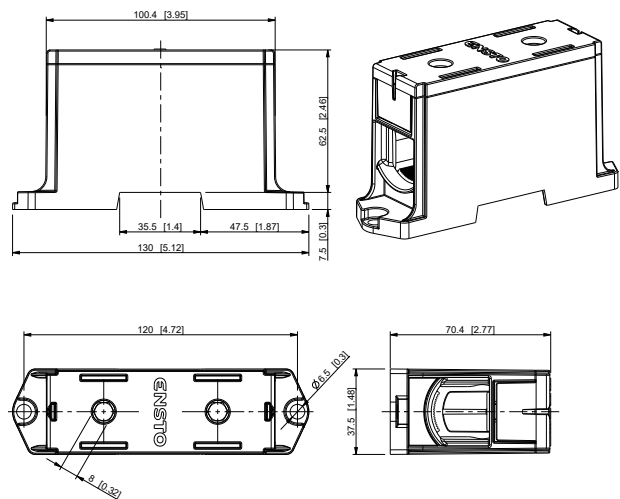
**KE162**



**KE163**



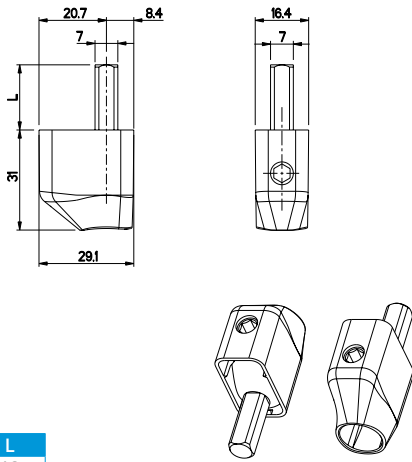
**KE164**



# Dimensional drawings, Ensto Clampo Apparatus

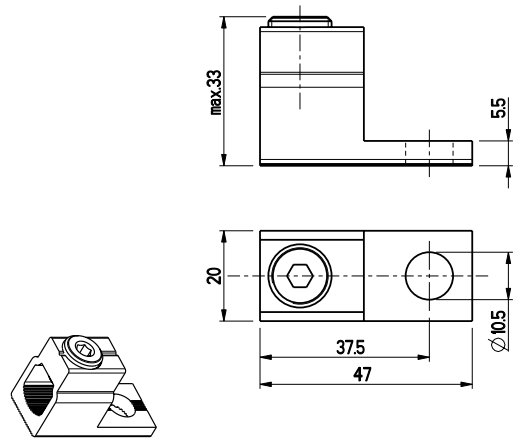
Dimensions in mm

KE12.12, KE12.20

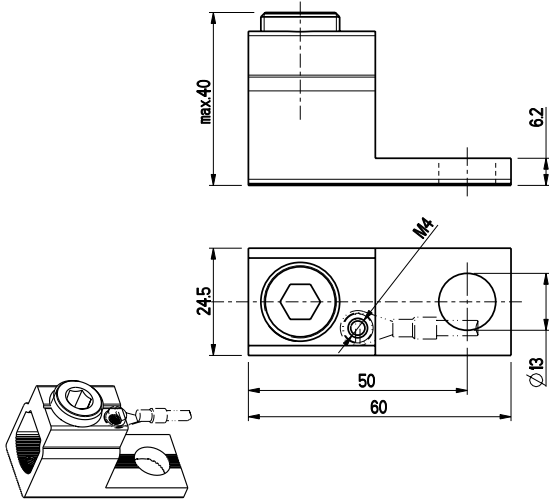


	L
KE12.12	12
KE12.20	20

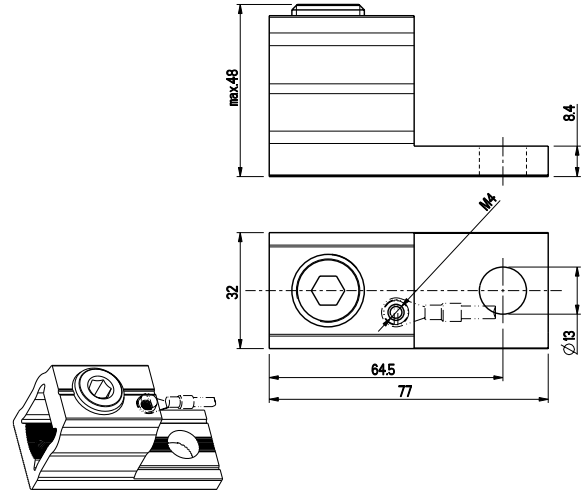
KE52.2



KE53.2

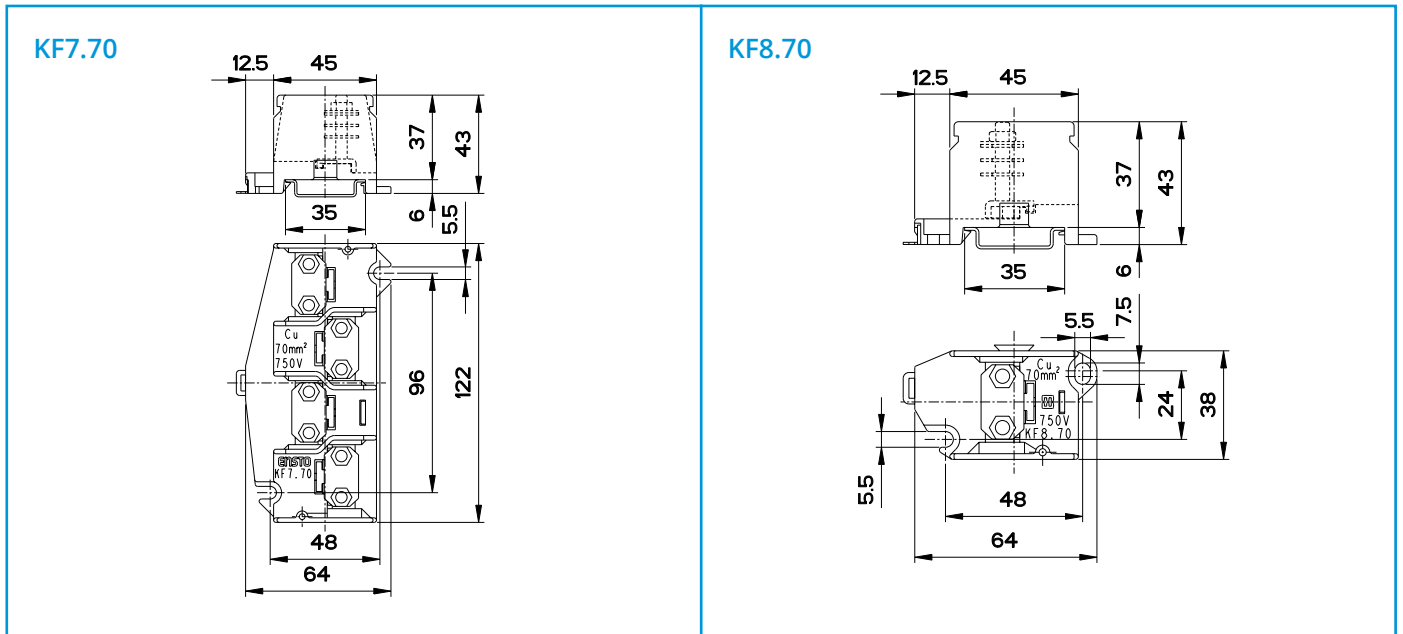


KE54.2



# Dimensional drawings, Ensto Clampo Tap tapping terminals

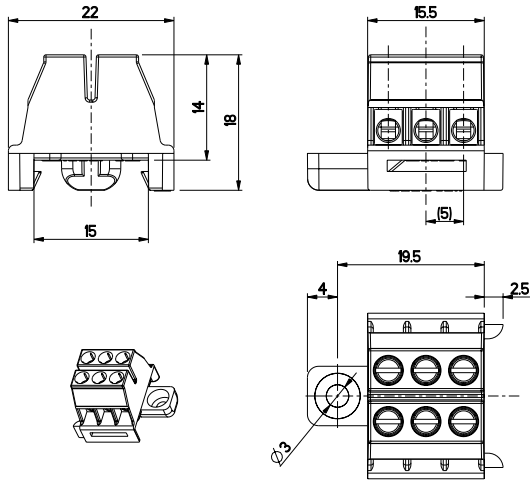
Dimensions  
in mm



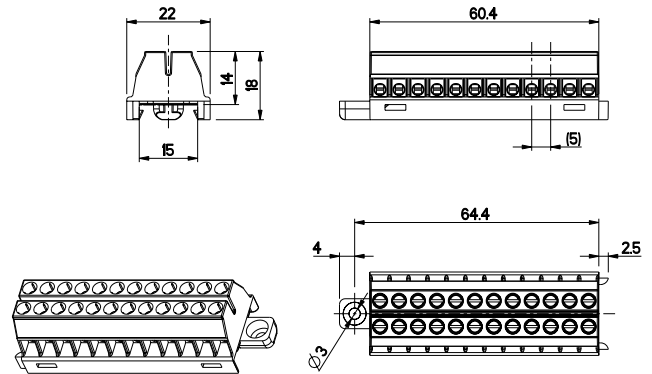
# Dimensional drawings, Ensto Clampo Compact terminal blocks

Dimensions  
in mm

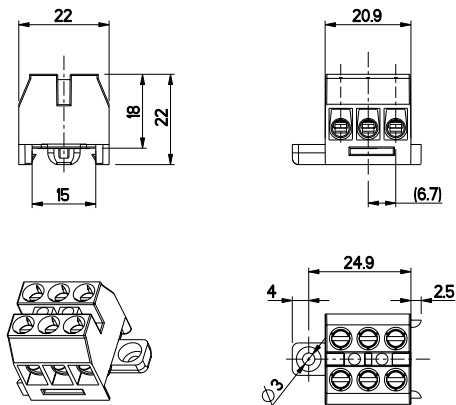
## KR5031



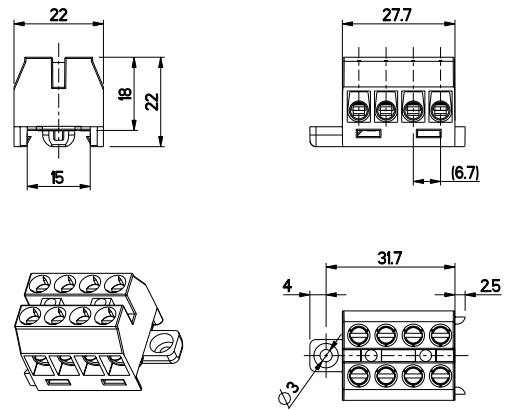
## KR5131



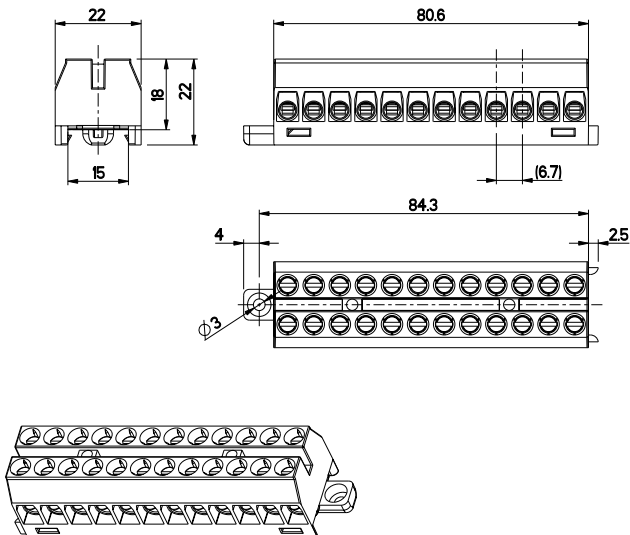
## KR8031



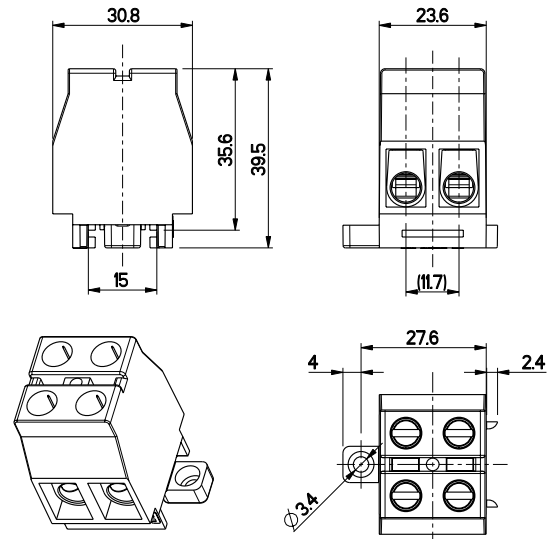
## KR8041



## KR8121

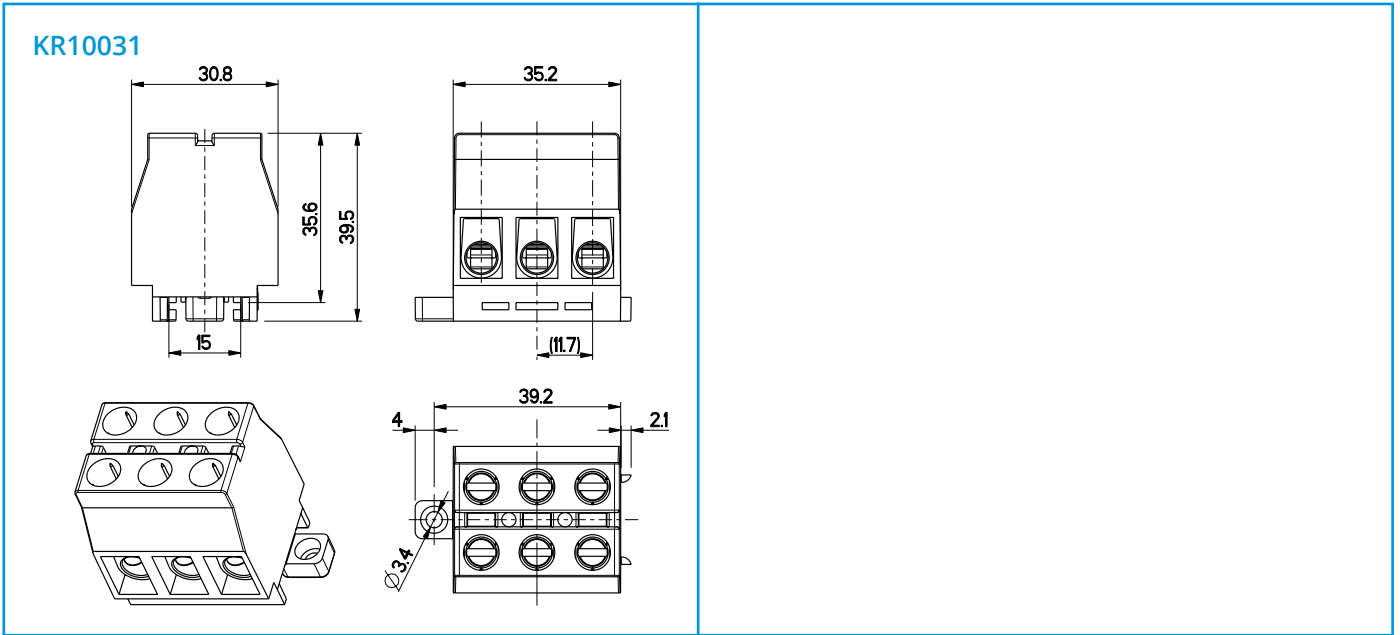


## KR10021



# Dimensional drawings, Ensto Clampo Compact terminal blocks

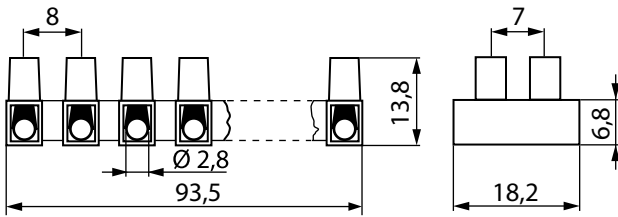
Dimensions  
in mm



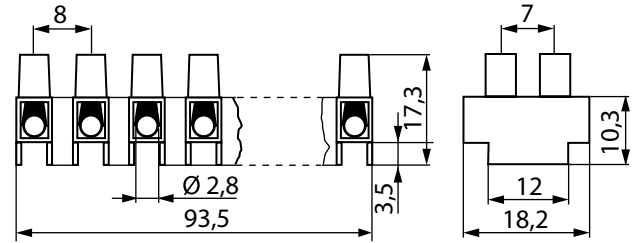
# Dimensional drawings, Ensto Clampo Eurostrips

Dimensions in mm

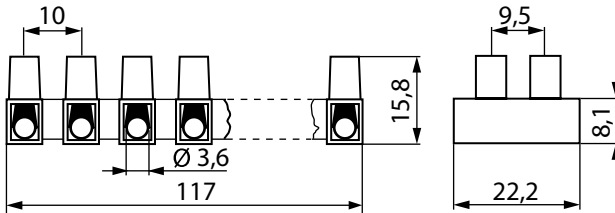
KA16.12, KB16.12



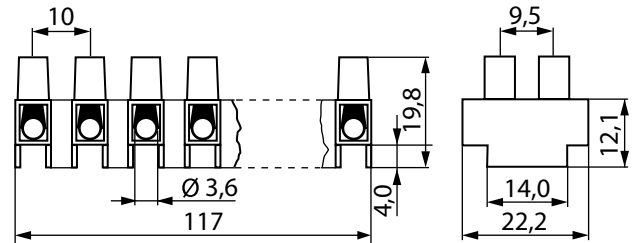
KA17.12, KB17.12



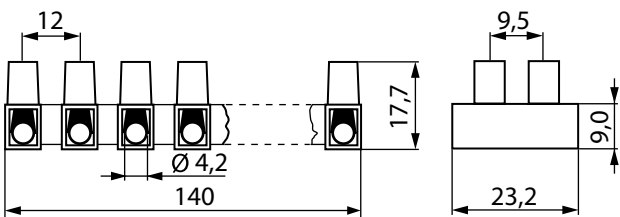
KA241.12, KB241.12



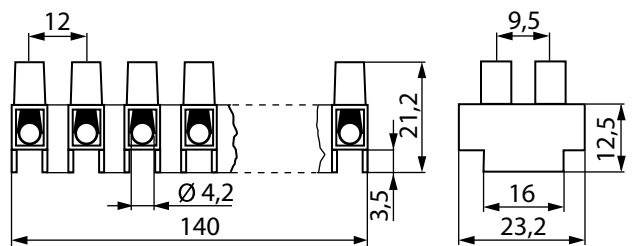
KA242.12, KB242.12



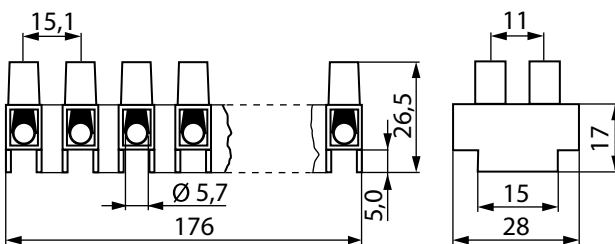
KA460.12, KB460.12



KA463.12, KB463.12



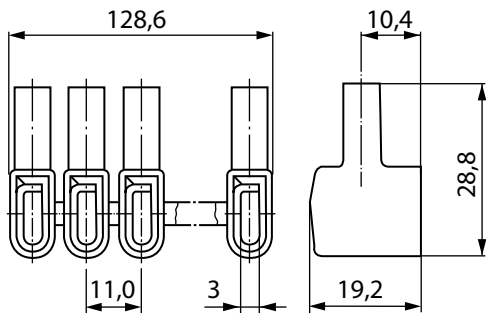
KA612.12, KB612.12



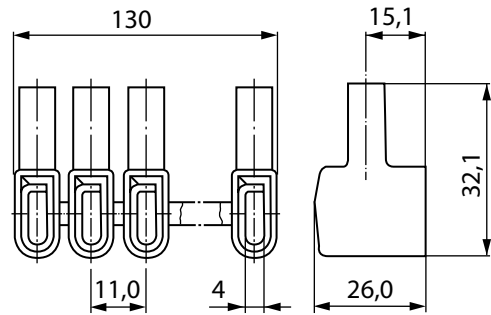
# Dimensional drawings, Ensto Clampo Wire Connectors

Dimensions in mm

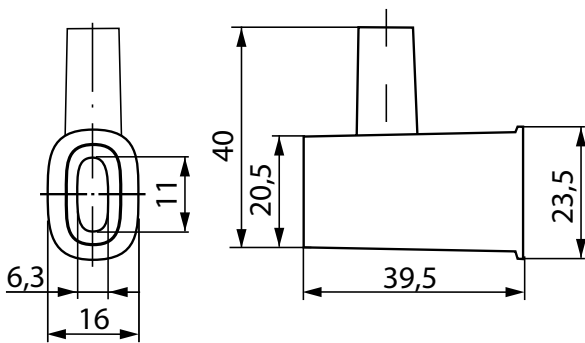
AL1.12



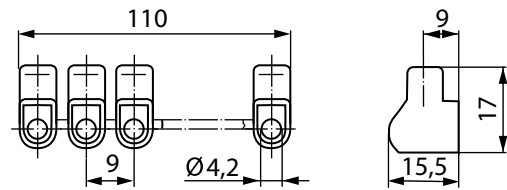
AL2.12



AL13



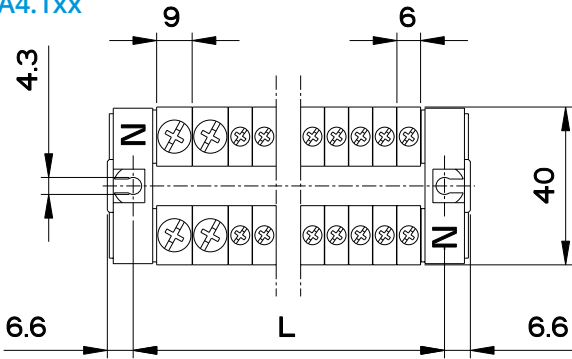
KD160.01, KD160.12



# Dimensional drawings, Ensto Clampo Ground terminals

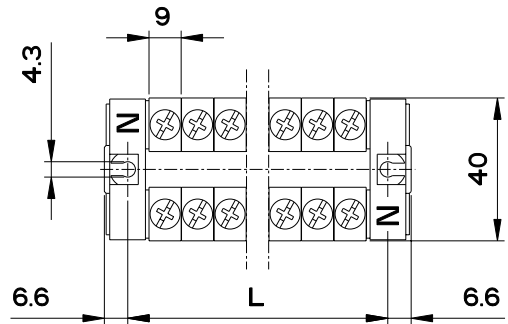
Dimensions in mm

**KNA4.1xx**



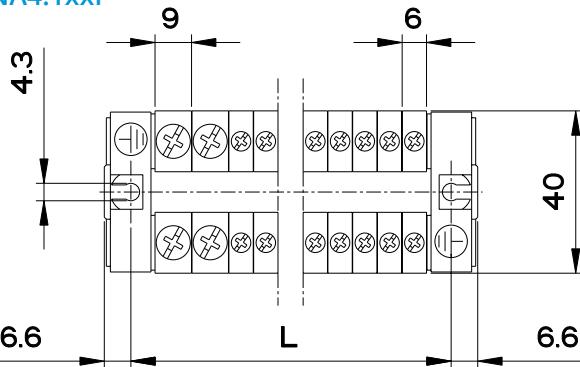
	L
KNA4.104	39,5
KNA4.106	52
KNA4.108	66
KNA4.110	82
KNA4.112	93
KNA4.114	109
KNA4.120	147

**KN4.1xx**



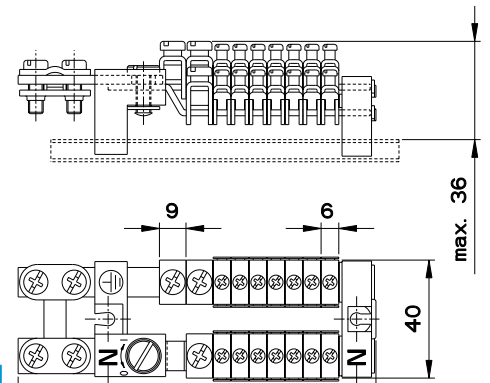
	L
KN4.102	30
KN4.104	48
KN4.106	66
KN4.108	84
KN4.110	102
KN4.112	120

**KNA4.1xxP**



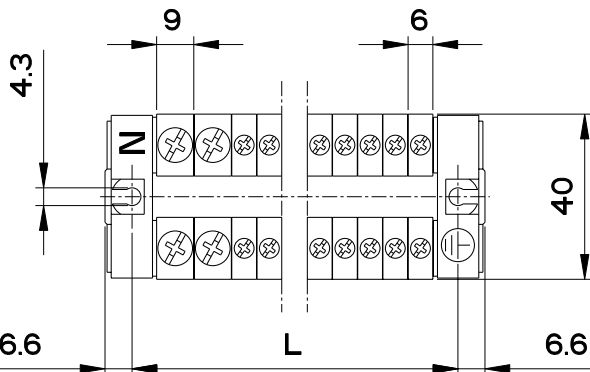
	L
KNA4.104P	39,5
KNA4.106P	52
KNA4.108P	66
KNA4.110P	82
KNA4.112P	93
KNA4.114P	109
KNA4.120P	147

**KNA5.1xx**



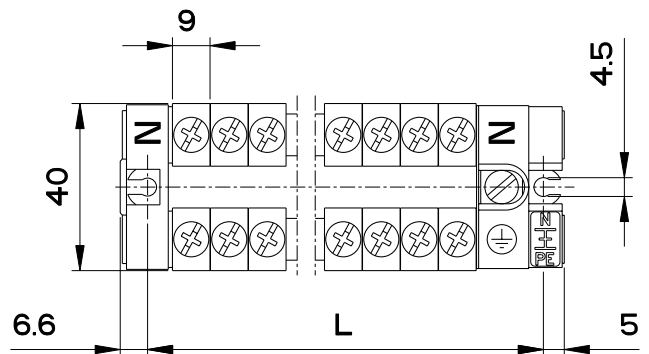
	L
KNA5.108	93
KNA5.113	115,5
KNA5.117	140
KNA5.120	158,5
KNA5.125	204
KNA5.130	234,5
KNA5.134	259
KNA5.138	283,5

**KNA4.1xxNP**



	L
KNA4.108NP	66
KNA4.114NP	109
KNA4.120NP	147
KNA4.126NP	196
KNA4.136NP	256

**KN4.2xx**

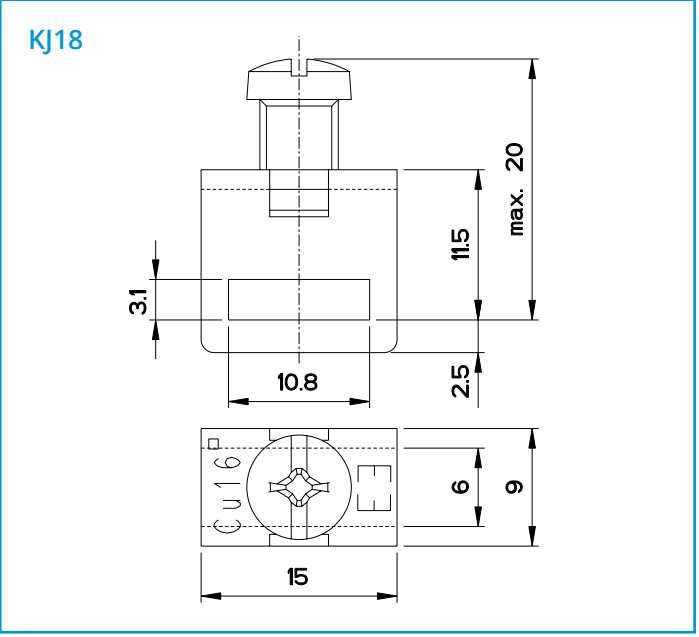
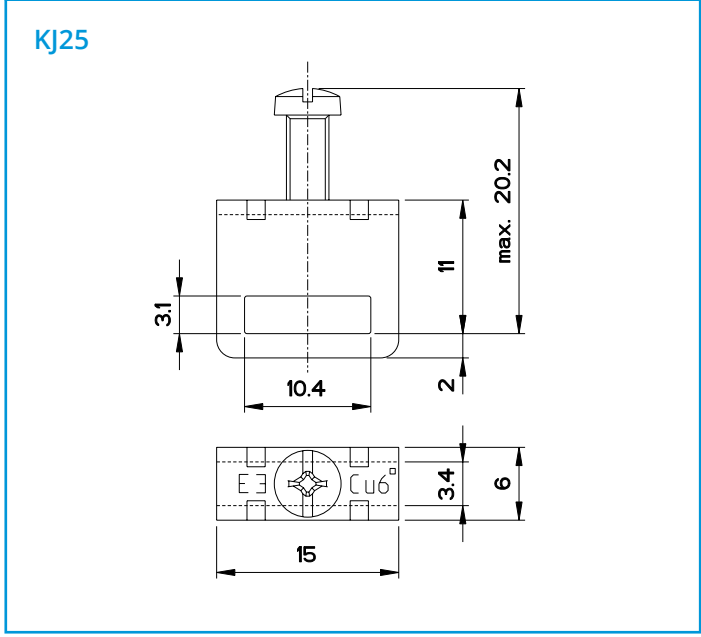
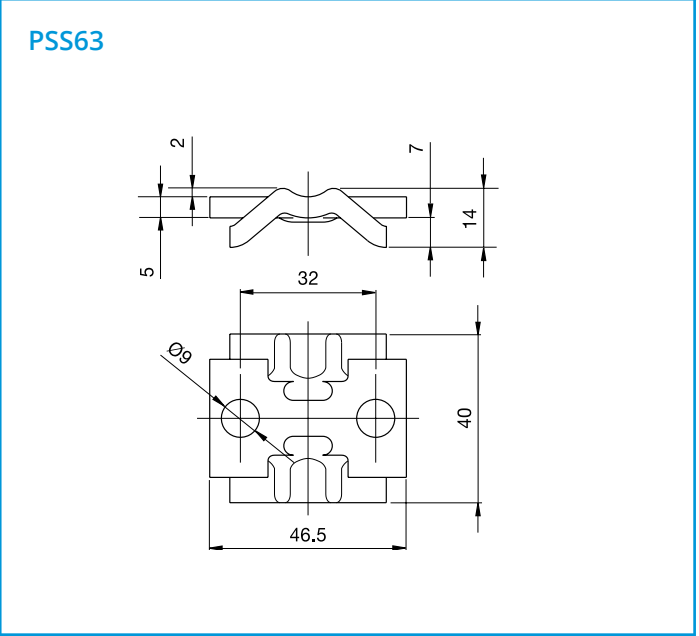
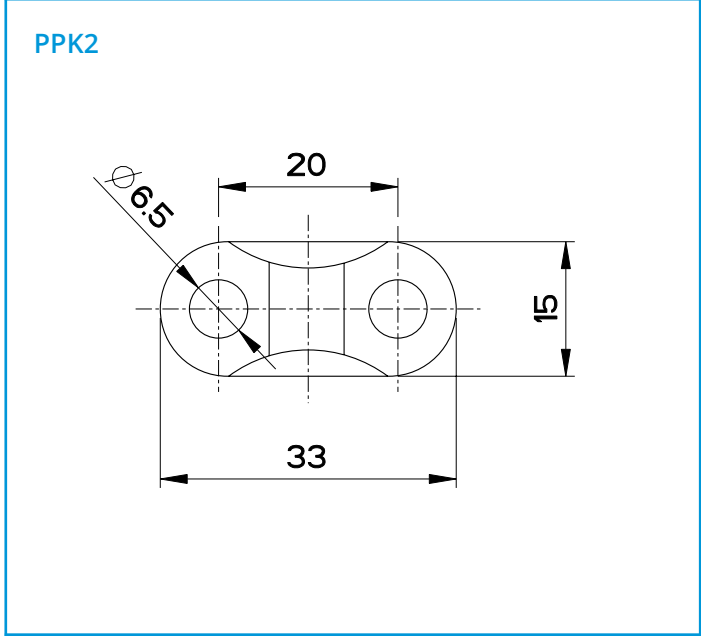
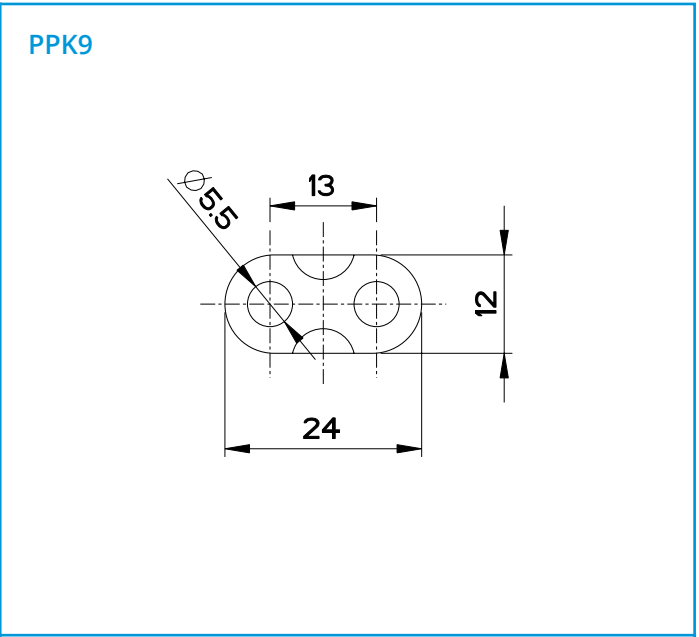
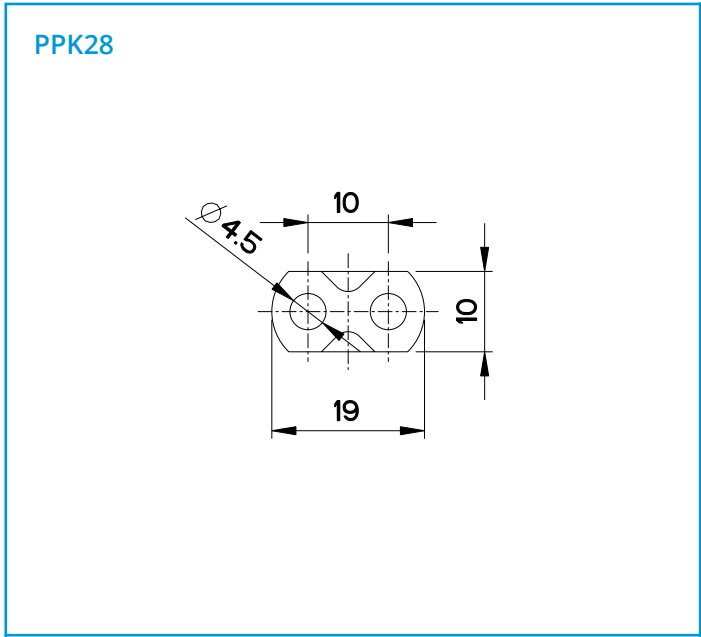


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KN4.208	93
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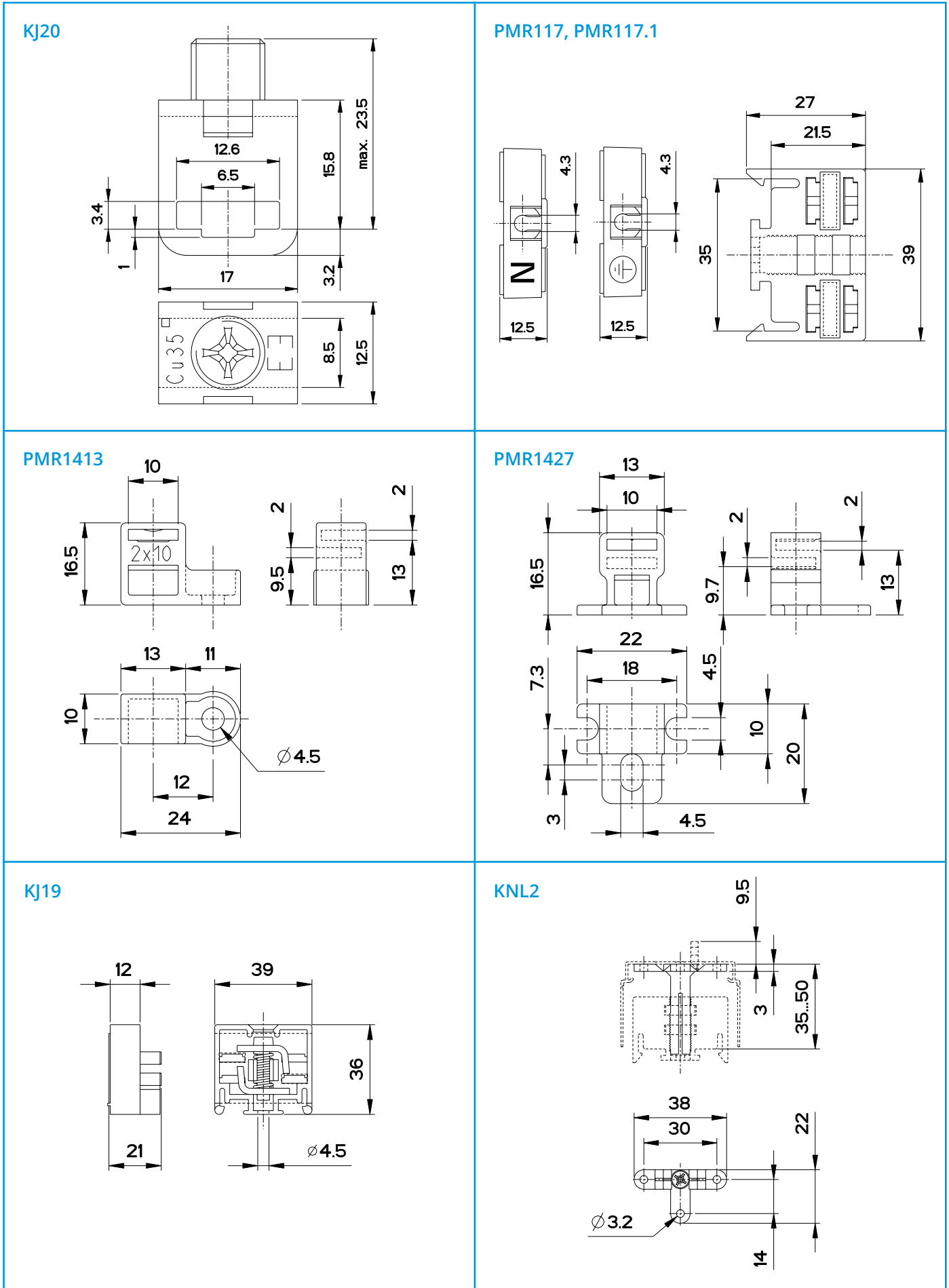
# Dimensional drawings, Ensto Clampo Ground terminals

Dimensions in mm



# Dimensional drawings, Ensto Clampo Ground terminals

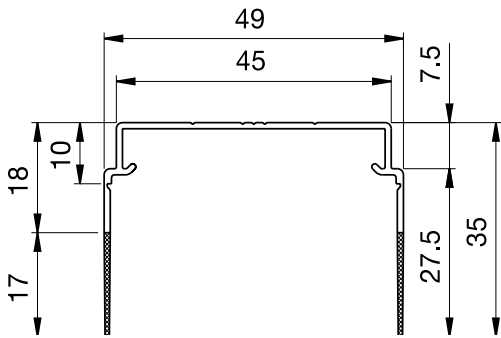
Dimensions in mm



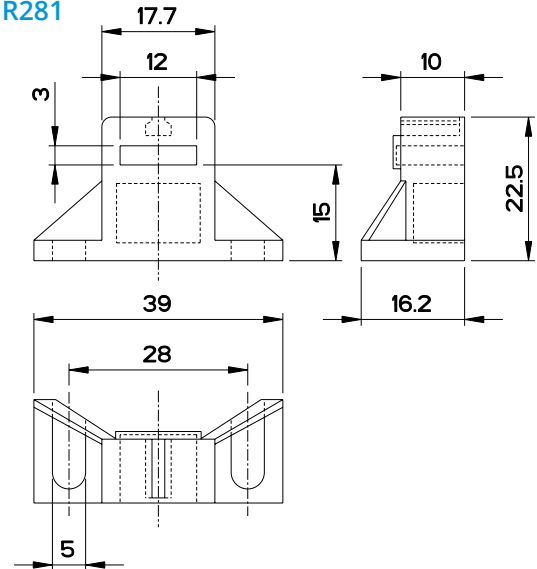
# Dimensional drawings, Ensto Clampo Ground terminals

Dimensions in mm

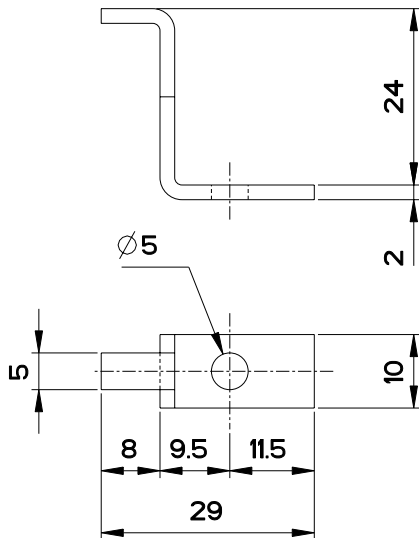
RDP6



PMR281



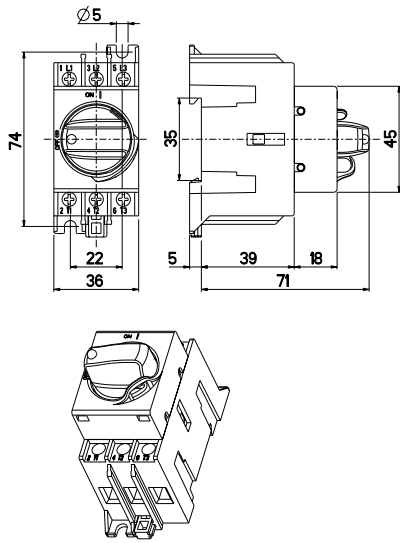
PPK225



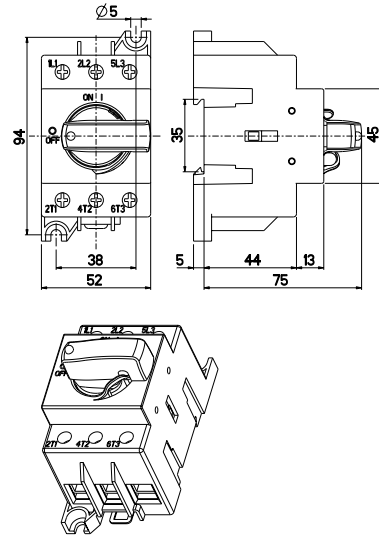
# Dimensional drawings, Ensto Compact switch disconnectors

Dimensions in mm

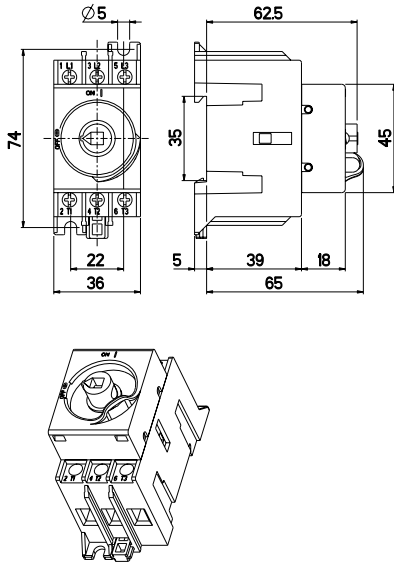
KS3.xx, KS3.xxRY



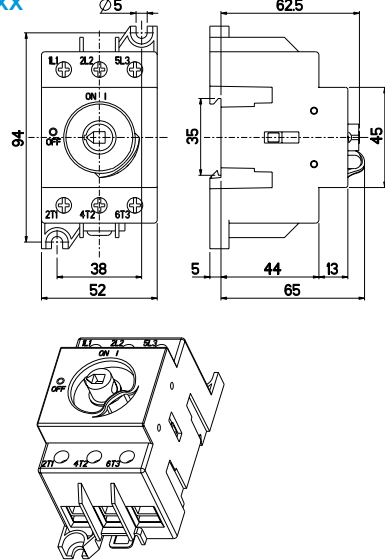
KSM3.xxx, KSM3.xxxRY



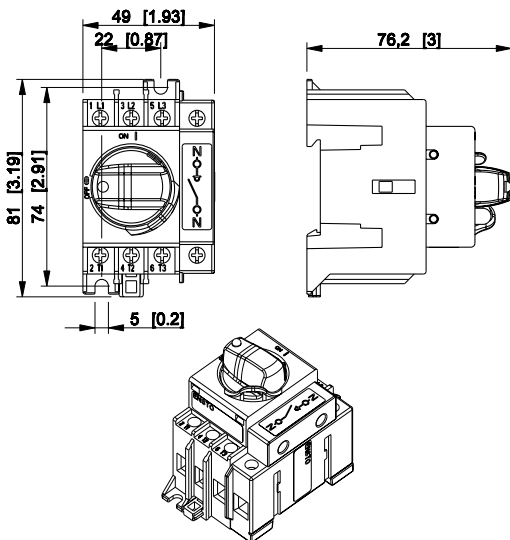
KS31.xx



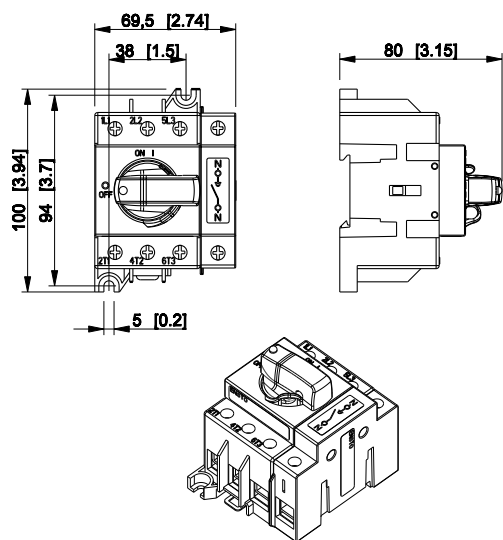
KSM31.xxx



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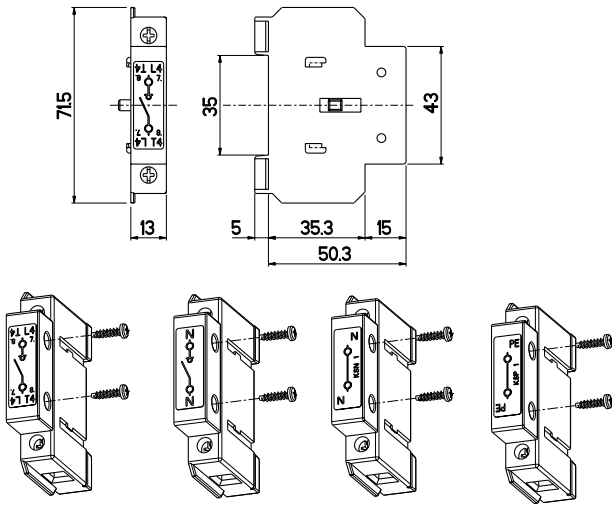
KSM3.80N, KSM3.100N



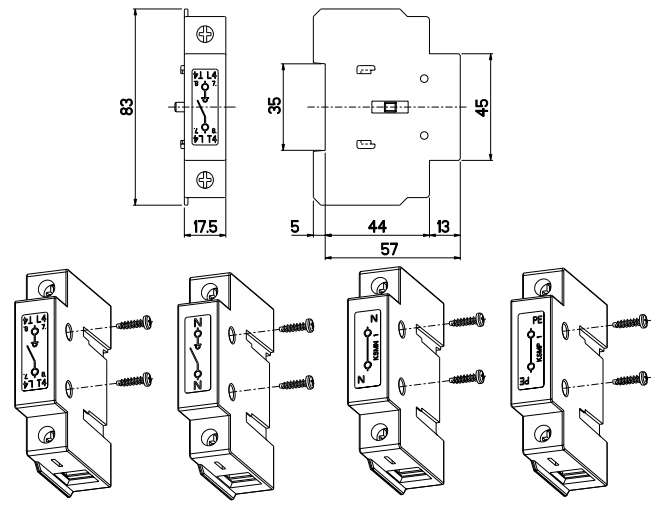
# Dimensional drawings, Ensto Compact switch disconnectors

Dimensions  
in mm

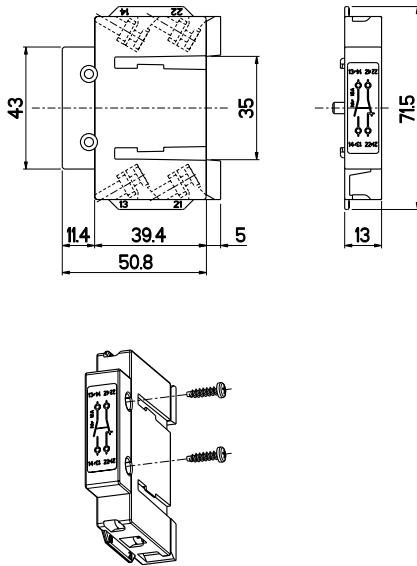
KS1.xx, KS1N, KSN1, KSP1



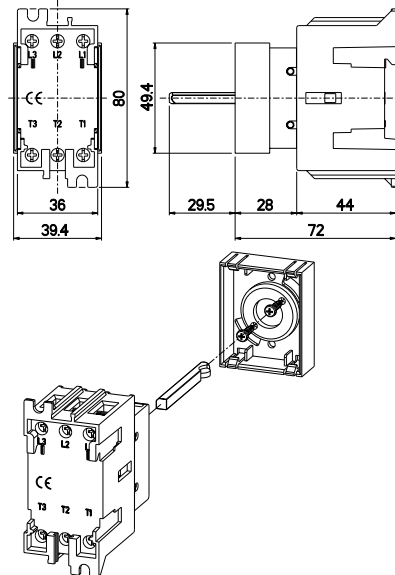
KSM1.xxx, KSM1N, KSMN1, KSMP1



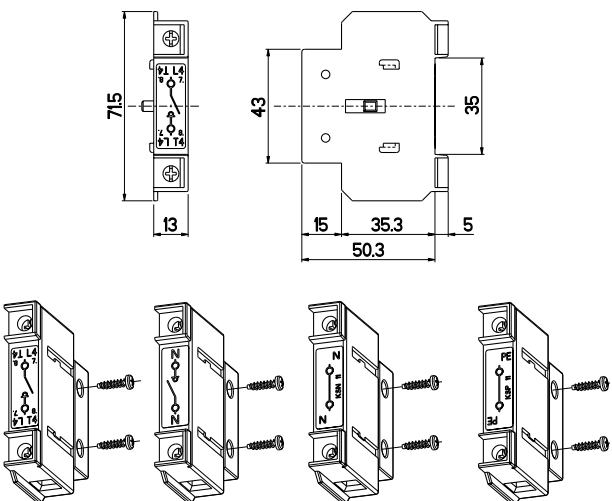
KSA1



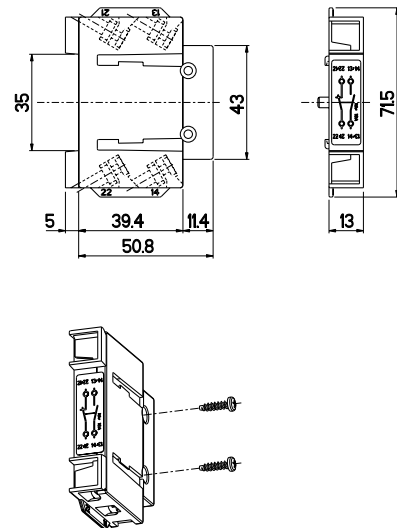
KS13.xx



KS11.xx, KS11N, KSN11, KSP11



KSA11



# Dimensional drawings, Fuse bases

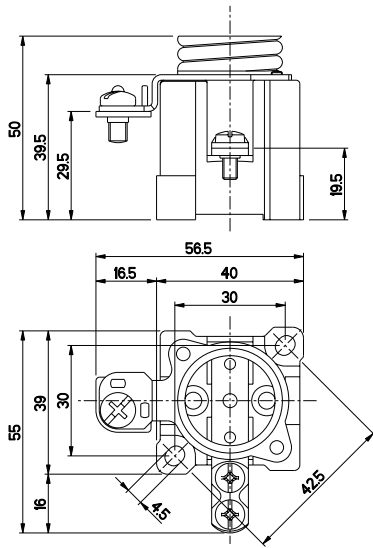
Dimensions in mm

<p><b>KVC1.1</b></p>	<p><b>KVC1.2</b></p>
<p><b>KVC30</b></p>	<p><b>KV25.1</b></p>
<p><b>KV25.2</b></p>	<p><b>KV25.211</b></p>

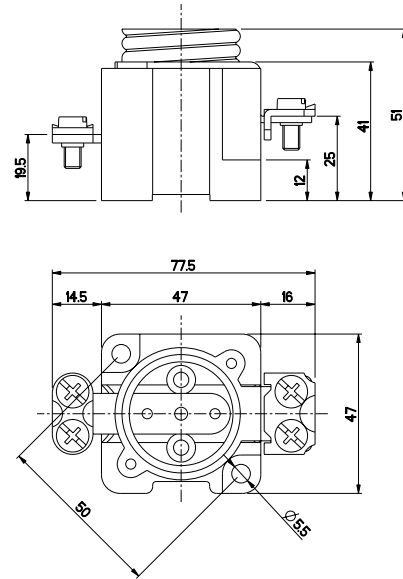
# Dimensional drawings, Fuse bases

Dimensions in mm

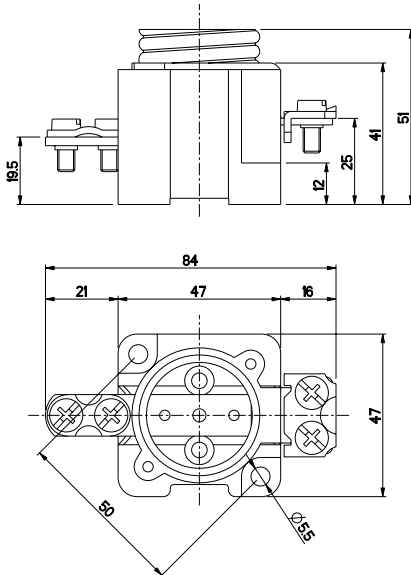
**KV25.291**



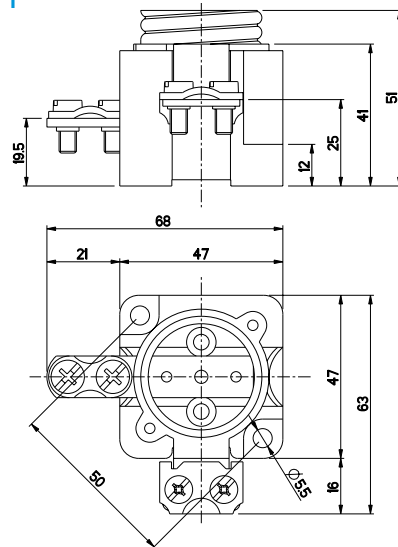
**KV63.1**



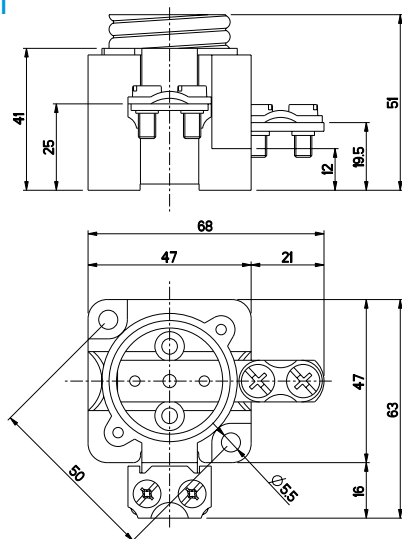
**KV63.2**



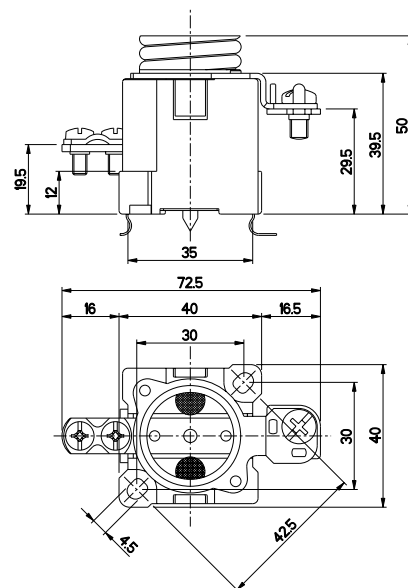
**KV63.211**



**KV63.291**

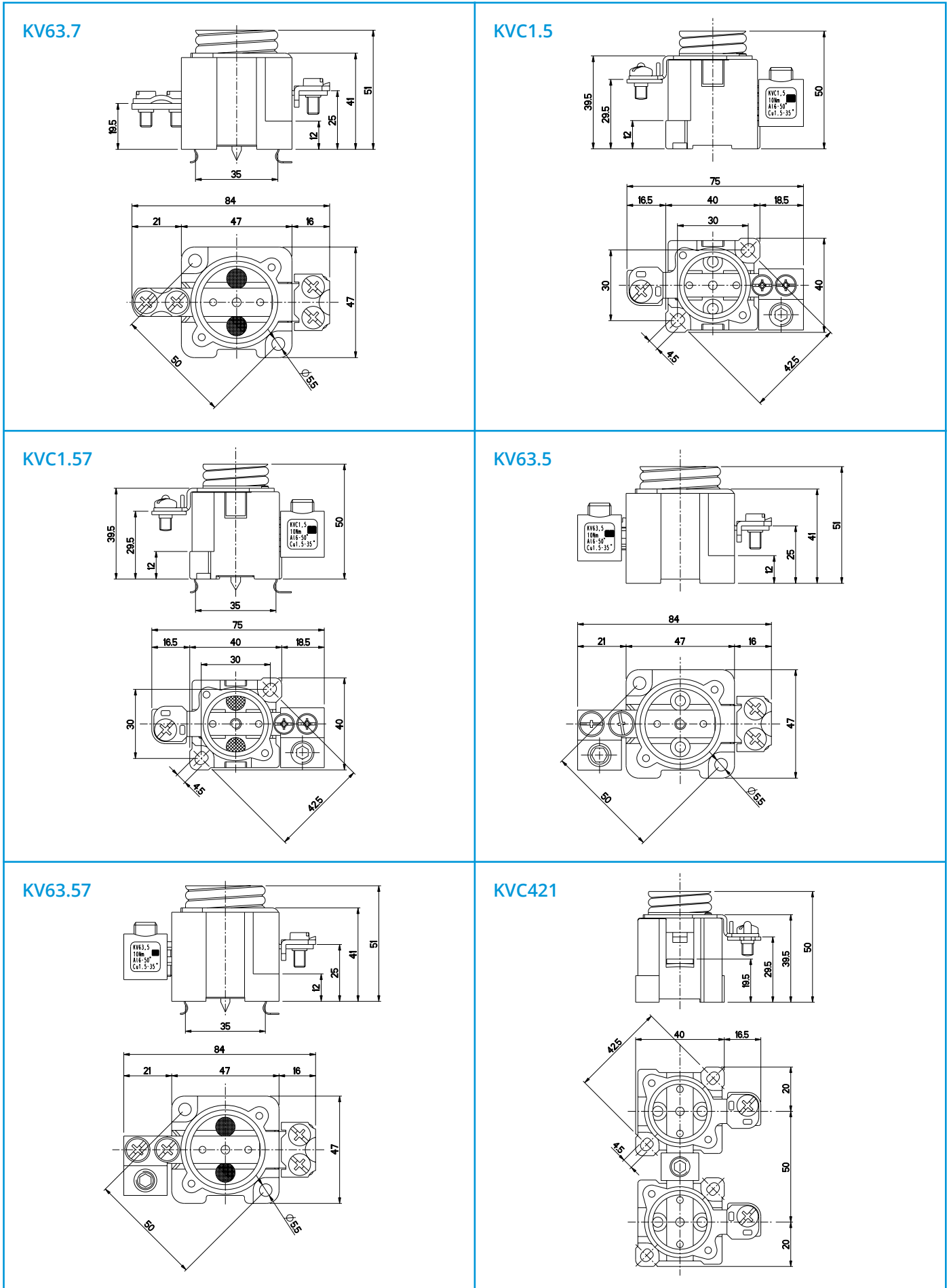


**KVC1.7**



# Dimensional drawings, Fuse bases

Dimensions in mm

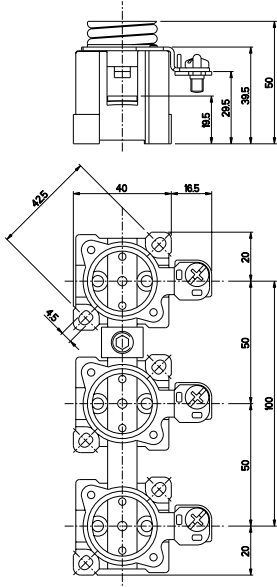




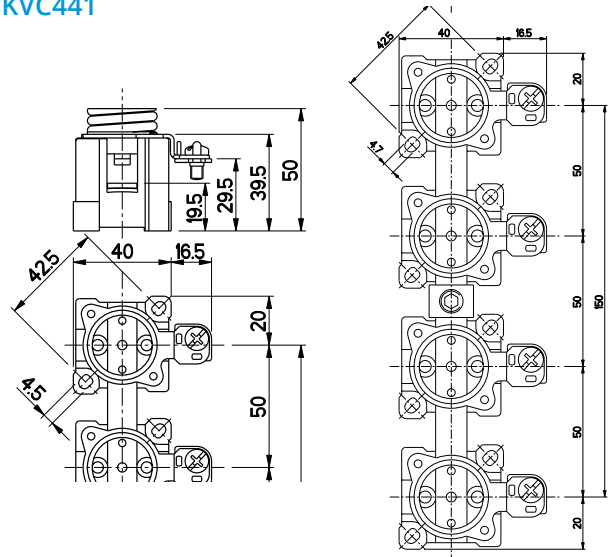
# Dimensional drawings, Fuse bases

Dimensions in mm

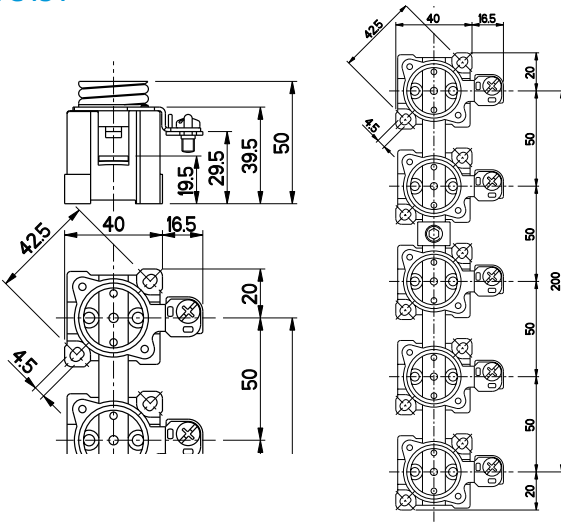
KVC431



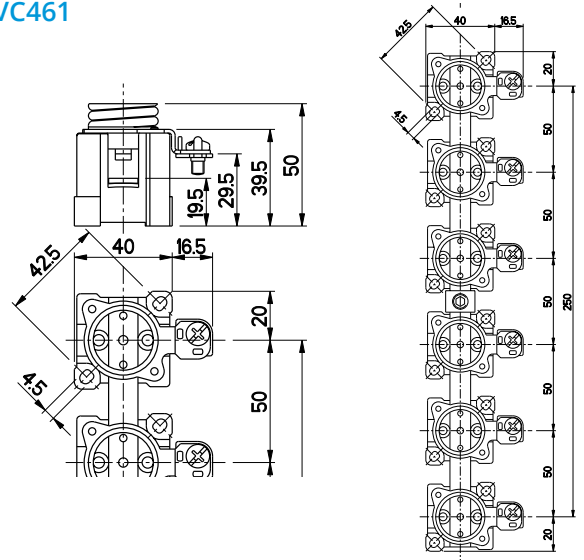
KVC441



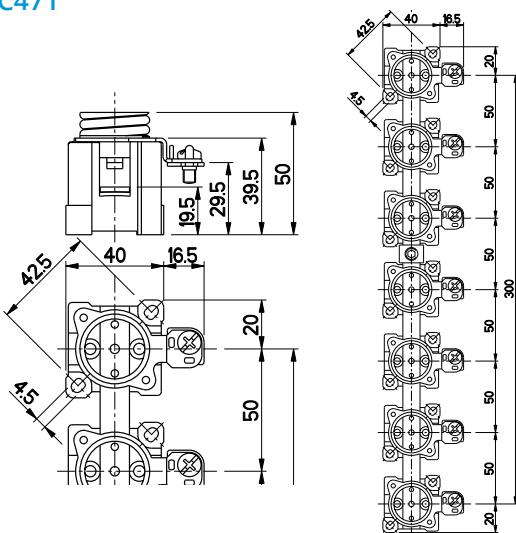
KVC451



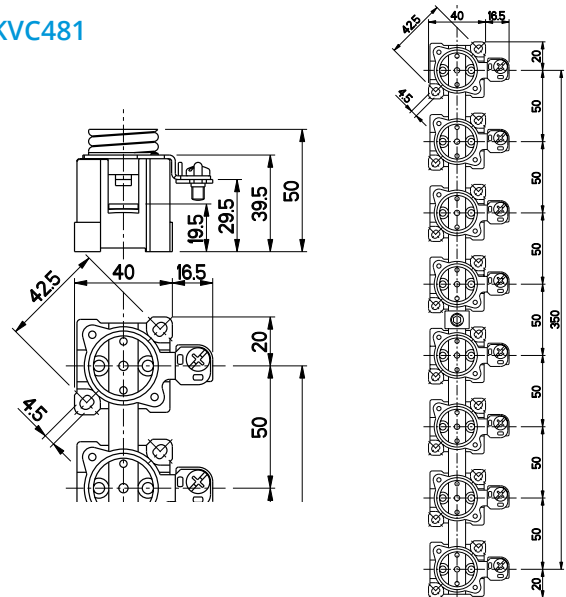
KVC461



KVC471



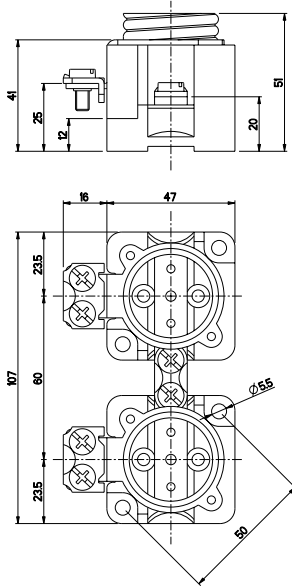
KVC481



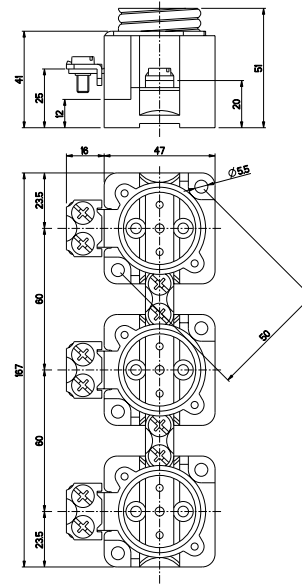
# Dimensional drawings, Fuse bases

Dimensions in mm

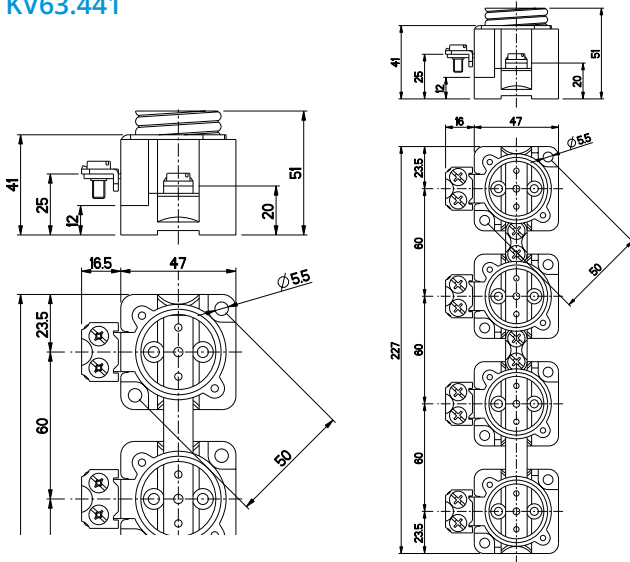
**KV63.421**



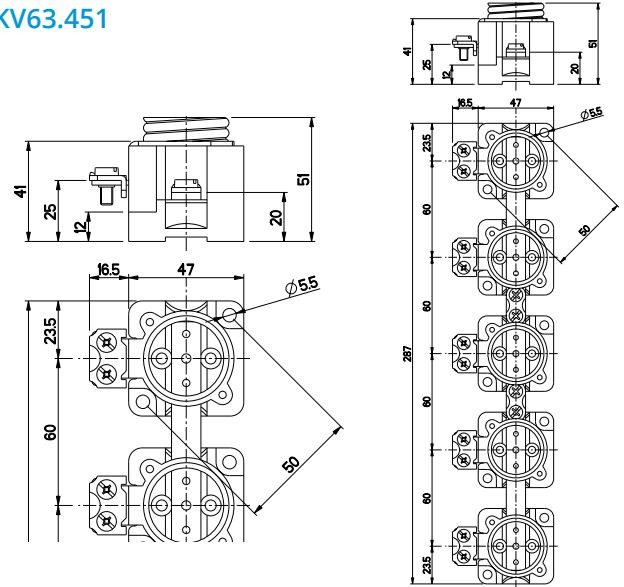
**KV63.431**



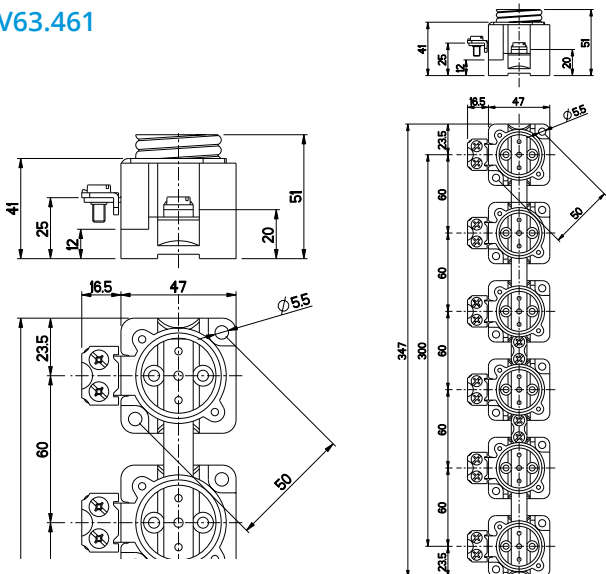
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**KV63.451**



**KV63.461**



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