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Cembre

Certified Quality Management System

GENERAL CATALOGUE

QUALITY POLICY AND OBJECTIVES

This catalogue illustrates the range of our standard products.
For each product family we indicate the principal features, and sometimes the most frequent applications and the necessary guidelines for a correct application.
Our sales personnel are at your disposal to supply more detailed information and our design and development engineers are available to study new solutions to particular applications.

On 22nd December 1992 ***the Quality Management System*** *of our company was upgraded by* ***Lloyd's Register Quality Assurance (LRQA) to ISO 9001*** *with field of application enlarged to:* ***"Design and Manufacture of cable accessories, electrical connectors and associated tools"****.*
In fact, our previous ***Quality Management System*** *already assessed on 14th December 1990 according to ISO 9002, has been enlarged to the* ***Design and Manufacture of all our products; Cembre's Quality is now guaranteed across our whole range of production****.*
The activity of the main premises in Brescia, the Italian regional officies and the subsidiary companies in Great Britain, France, Spain, Germany and USA are ruled according to the prescriptions of a single Quality System; ***such Quality System has been assessed by Lloyd's Register of Quality as conforming to the prescriptions of the ISO 9001:2000 norm for the design, manufacture, stockholding and sales of cable accessories, electrical connectors and associated toolings. In house repair, refurbishment and associated recalibration of toolings.***

This guarantees a homogeneous and high quality level of products and services that Cembre provides to all its customers.

Cembre S.p.A. *factory in Brescia (ITALY)*
covers an area of approximately 115.000 sqm

Cembre Ltd. *factory in Curdworth (Birmingham)*

Production Units

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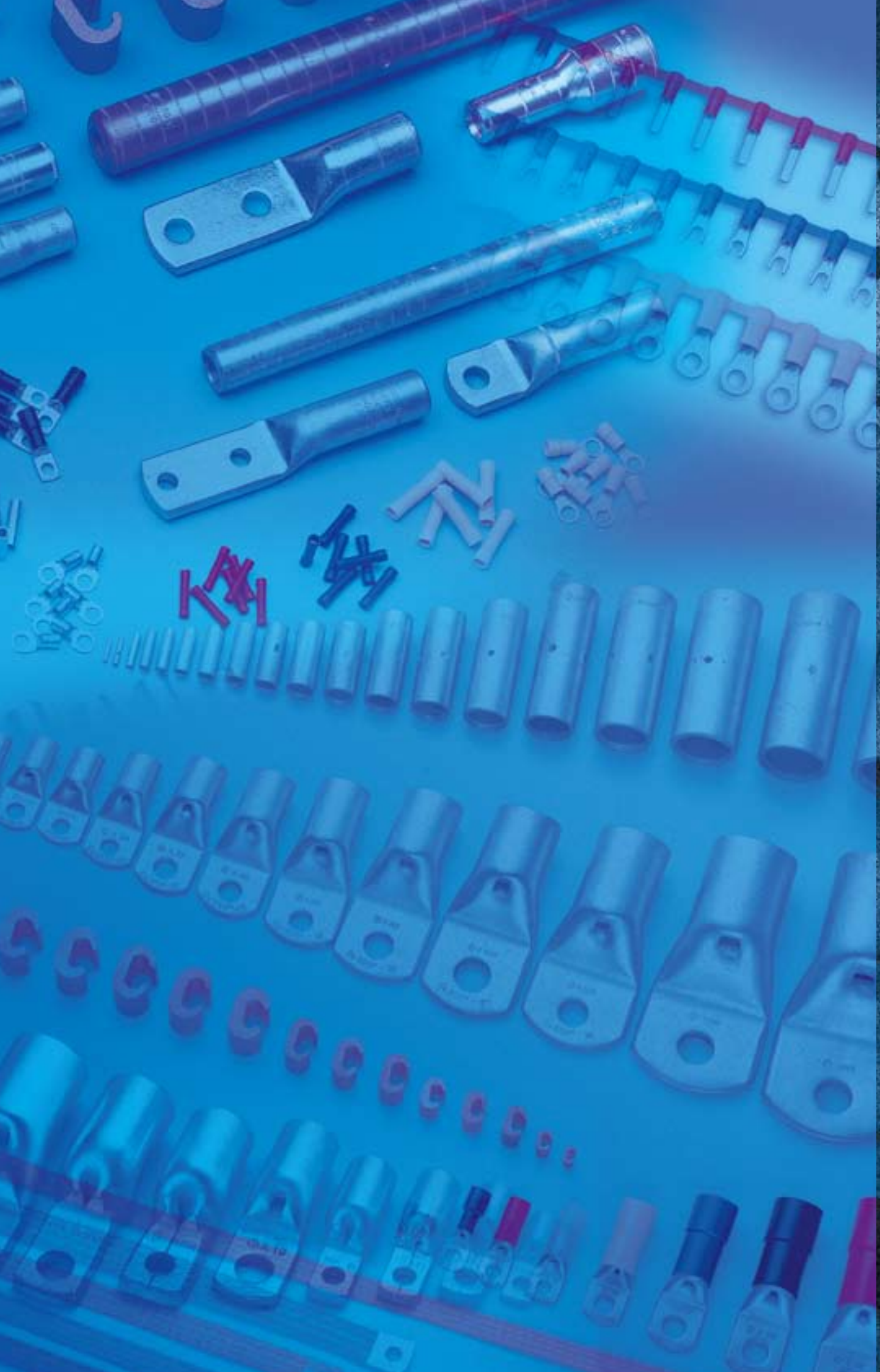


ELECTRICAL CONNECTORS

HALOGEN FREE INSULATED TERMINALS

VP RP BP GP

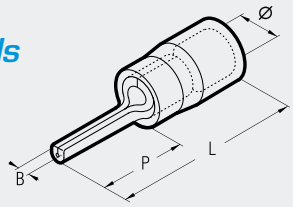
P range funnel entry

OPERATING TEMPERATURE UP TO 115° C

HALOGEN FREE

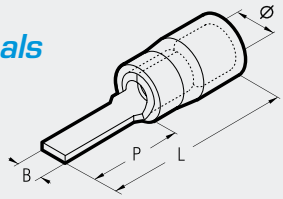
The "P" range of terminals has been designed, to meet the increasing demands for improved safety and reliability of electrical connectors. The polycarbonate insulation, is a halogen free, self extinguishing thermoplastic material class V0 (UL 94). The unique funnel shaped entry of the insulation sleeve, guarantees total insertion of the conductor strands into the terminal barrel, creating a secure and reliable, electrical and mechanical connection. The maximum operating temperature is 115°C (Surge 130°C). Recommended installation Tools are shown on pages 88 to 95, 121-122

pin terminals



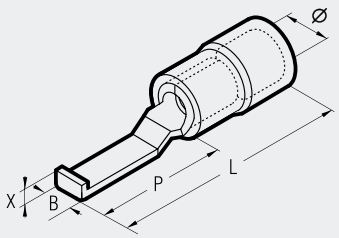
Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	Quantity Box/Bag
 0,25÷1,5 (22÷16)	RP-P 8	4,0	1,7	7,8	17,9	3.500/100
	RP-P 10	4,0	1,8	9,8	19,9	3.500/100
	RP-P 12	4,0	1,8	12,0	22,1	3.000/100
 1,5÷2,5 (16÷14)	BP-P 8	4,9	1,7	7,8	17,9	3.000/100
	BP-P 10	4,9	1,8	9,8	19,9	3.000/100
	BP-P 12	4,9	1,8	11,8	21,9	3.000/100
 4÷6 (12÷10)	GP-P 10	6,6	2,2	10,4	24,5	1.500/100
	GP-P 12	6,6	2,2	12,6	26,7	1.500/100
	GP-P 14	6,6	2,2	14,6	28,7	1.500/100

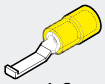
blade terminals



Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	Quantity Box/Bag
 0,2÷0,5 (24÷20)	VP-PP 12/19	3,0	1,9	12,4	22,4	4.000/100
 0,25÷1,5 (22÷16)	RP-PP 12	4,0	3,0	12,8	22,9	3.500/100
	RP-PP 12/1	4,0	3,0	11,3	21,4	3.500/100
	RP-PP 12/19	4,0	1,9	13,2	23,3	3.500/100
	RP-PP 12/23	4,0	2,3	13,2	23,3	3.500/100
	RP-PP 14	4,0	3,0	14,8	24,9	3.000/100
	RP-PP 16/23	4,0	2,3	17,2	27,3	2.500/100
 1,5÷2,5 (16÷14)	BP-PP 12	4,9	3,5	12,8	22,9	2.500/100
	BP-PP 12/25	4,9	2,5	13,3	23,4	2.500/100
	BP-PP 12/29	4,9	2,9	13,3	23,4	2.500/100
	BP-PP 16/25	4,9	2,5	17,2	27,3	2.500/100
 4÷6 (12÷10)	GP-PP 12	6,6	4,0	13,3	27,4	1.000/100
	GP-PP 17	6,6	2,9	19,1	33,2	1.000/100

Hooked Blade Terminals



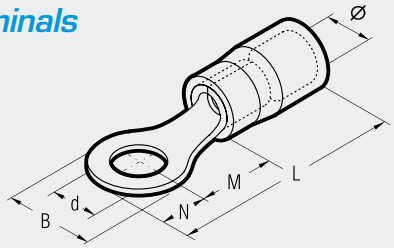
Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	X	Quantity Box/Bag
 0,25÷1,5 (22÷16)	RP-PPL 30	3,9	3,0	17,5	28,3	1,7	3.000/100
	RP-PPL 46	3,9	4,6	17,5	28,3	1,7	3.000/100
 1,5÷2,5 (16÷14)	BP-PPL 30	4,9	3,0	17,5	28,3	1,7	2.500/100
	BP-PPL 46	4,9	4,6	17,5	28,3	1,7	2.500/100
 4÷6 (12÷10)	GP-PPL 46	6,7	4,6	17,5	32,6	1,9	1.000/100

HALOGEN FREE INSULATED TERMINALS

P range funnel entry

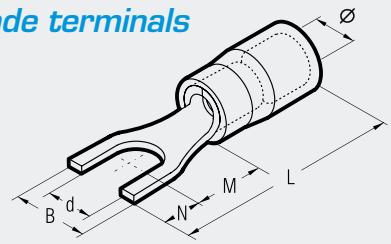
VP RP BP GP

ring terminals



Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity Box/Bag
0,2÷0,5 (24÷20)	2	*VP-M 2	3,0	5,6	4,5	2,8	17,5	2,2	4.000/100
	3	VP-M 3	3,0	5,6	4,5	2,8	17,5	3,2	4.000/100
	3,5	VP-M 3,5	3,0	5,6	4,5	2,8	17,5	3,7	4.000/100
	4	VP-M 4	3,0	7,0	6,5	3,5	20,2	4,3	4.000/100
	5	VP-M 5	3,0	7,8	7,1	3,9	21,2	5,3	4.000/100
	6	*VP-M 6	3,0	9,4	8,1	4,7	23,0	6,4	4.000/100
0,25÷1,5 (22÷16)	2	*RP-M 2	4,0	5,6	4,5	2,8	17,4	2,2	3.000/100
	3	RP-M 3	4,0	5,6	4,5	2,8	17,4	3,2	3.000/100
	3,5	RP-M 3,5	4,0	5,6	4,5	2,8	17,4	3,7	3.000/100
	3,5	RP-M 3,5/1	4,0	6,2	7,1	3,1	20,2	3,7	3.000/100
	4	RP-M 4	4,0	7,0	6,5	3,5	20,1	4,3	3.000/100
	4	RP-M 4/3	4,0	7,8	7,1	3,9	21,1	4,3	3.000/100
	5	RP-M 5	4,0	7,8	7,1	3,9	21,1	5,3	3.000/100
	6	RP-M 6	4,0	9,4	8,1	4,7	22,9	6,4	3.000/100
	6	RP-M 6/1	4,0	12,0	10,3	6,0	26,4	6,4	3.000/100
	7	RP-M 7	4,0	9,4	8,1	4,7	22,9	7,2	2.500/100
	8	RP-M 8	4,0	12,0	10,3	6,0	26,4	8,4	2.000/100
	10	RP-M 10	4,0	15,5	13,0	7,7	30,9	10,5	1.500/100
	12	RP-M 12	4,0	18,0	15,5	9,0	34,6	13,0	1.500/100
1,5÷2,5 (16÷14)	2	*BP-M 2	4,9	5,6	5,0	2,8	17,9	2,2	2.500/100
	3	BP-M 3	4,9	5,6	5,0	2,8	17,9	3,2	2.500/100
	3,5	BP-M 3,5	4,9	5,6	5,0	2,8	17,9	3,7	2.500/100
	3,5	BP-M 3,5/1	4,9	6,2	6,5	3,1	19,7	3,7	2.500/100
	4	BP-M 4	4,9	8,0	6,5	4,0	20,6	4,3	2.500/100
	5	BP-M 5	4,9	8,0	7,5	4,0	21,6	5,3	2.500/100
	6	BP-M 6	4,9	9,4	8,6	4,7	23,4	6,4	2.500/100
	6	BP-M 6/1	4,9	12,0	10,3	6,0	26,4	6,4	2.000/100
	6	*BP-M 6/2	4,9	8,4	5,4	4,2	19,7	6,4	2.500/100
	7	BP-M 7	4,9	10,0	7,8	5,0	22,9	7,2	2.000/100
	8	BP-M 8	4,9	12,0	10,3	6,0	26,4	8,4	1.500/100
	10	BP-M 10	4,9	15,5	13,0	7,7	30,9	10,5	1.500/100
	12	BP-M 12	4,9	18,0	15,5	9,0	34,6	13,0	1.000/100
4÷6 (12÷10)	3	GP-M 3	6,6	8,0	8,1	4,0	26,2	3,2	1.500/100
	3,5	GP-M 3,5	6,6	8,0	8,1	4,0	26,2	3,7	1.500/100
	4	GP-M 4	6,6	9,0	8,1	4,5	26,7	4,3	1.000/100
	5	GP-M 5	6,6	9,0	8,1	4,5	26,7	5,3	1.000/100
	6	GP-M 6	6,6	11,0	11,1	5,5	30,7	6,4	1.000/100
	6	GP-M 6/1	6,6	11,0	8,1	5,5	27,7	6,4	1.000/100
	7	GP-M 7	6,6	11,0	11,1	5,5	30,7	7,2	1.000/100
	8	GP-M 8	6,6	13,6	12,1	6,8	33,0	8,4	1.000/100
	8	*GP-M 8/1	6,6	11,0	8,1	5,5	27,7	8,4	1.000/100
	10	GP-M 10	6,6	13,6	12,1	6,8	33,0	10,5	1.000/100
	10	GP-M 10/1	6,6	15,5	13,8	7,7	35,7	10,5	1.000/100
	12	GP-M 12	6,6	19,0	15,1	9,5	38,7	13,0	1.000/100
	14	GP-M 14	6,6	21,0	16,1	10,5	40,7	15,0	500/100
	16	GP-M 16	6,6	24,0	17,1	12,0	43,2	17,0	500/100

fork/spade terminals



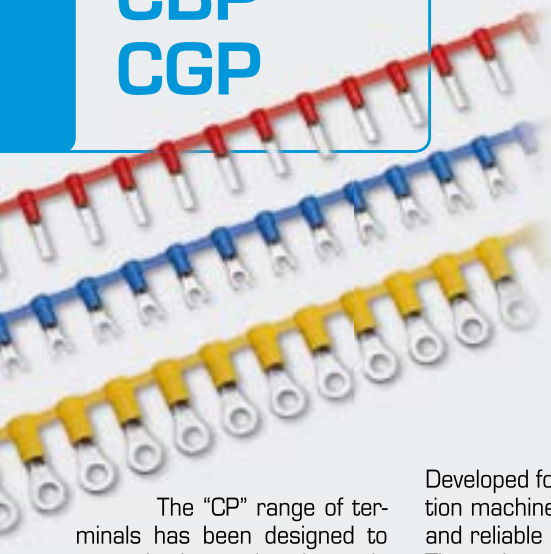
Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity Box/Bag
0,2÷0,5 (24÷20)	3	VP-U 3	3,0	5,5	5,5	4,0	18,7	3,2	4.000/100
	3,5	VP-U 3,5	3,0	6,0	6,5	3,8	19,5	3,7	4.000/100
	4	VP-U 4	3,0	6,5	7,5	3,7	20,4	4,3	4.000/100
0,25÷1,5 (22÷16)	3	RP-U 3	4,0	5,5	5,5	4,0	19,6	3,2	3.500/100
	3,5	RP-U 3,5	4,0	6,0	6,5	3,8	20,4	3,7	3.500/100
	3,5	RP-U 3,5/2	4,0	6,4	6,5	3,8	20,4	3,7	3.500/100
	4	RP-U 4	4,0	6,5	7,5	3,7	21,3	4,3	3.000/100
	4	RP-U 4/1	4,0	8,5	7,5	3,7	21,3	4,3	3.000/100
	4	RP-U 4/2	4,0	7,5	7,5	3,7	21,3	4,3	3.000/100
	5	RP-U 5	4,0	8,5	7,5	3,7	21,3	5,3	3.000/100
	5	*RP-U 5/1	4,0	9,4	7,5	3,7	21,3	5,3	3.000/100
	6	RP-U 6	4,0	9,4	8,1	4,7	22,9	6,4	2.500/100
	6	RP-U 6/1	4,0	12,0	9,2	7,1	26,4	6,4	2.500/100
	8	RP-U 8	4,0	14,0	10,0	6,3	26,4	8,4	2.000/100
	10	RP-U 10	4,0	17,5	13,0	7,7	30,9	10,5	1.500/100
	12	RP-U 12	4,0	20,0	15,5	9,0	34,6	13,0	1.500/100
1,5÷2,5 (16÷14)	3	BP-U 3	4,9	5,5	5,5	4,0	19,6	3,2	2.500/100
	3,5	BP-U 3,5	4,9	6,4	6,5	3,8	20,4	3,7	2.500/100
	3,5	*BP-U 3,5/1	4,9	7,2	6,5	3,8	20,4	3,7	2.500/100
	4	BP-U 4	4,9	6,5	7,5	3,7	21,3	4,3	2.500/100
	4	BP-U 4/1	4,9	8,5	7,5	3,7	21,3	4,3	2.000/100
	4	BP-U 4/2	4,9	7,5	7,5	3,7	21,3	4,3	2.000/100
	5	BP-U 5	4,9	8,5	7,5	3,7	21,3	5,3	2.500/100
	6	BP-U 6	4,9	9,4	8,1	4,7	22,9	6,4	2.500/100
	6	BP-U 6/1	4,9	12,0	9,2	7,1	26,4	6,4	2.000/100
	8	BP-U 8	4,9	14,0	10,0	6,3	26,4	8,4	1.500/100
	10	BP-U 10	4,9	17,5	13,0	7,7	30,9	10,5	2.000/100
	12	BP-U 12	4,9	20,0	15,5	9,0	34,6	13,0	1.000/100
4÷6 (12÷10)	3,5	GP-U 3,5	6,6	7,5	8,5	3,9	26,5	3,7	1.500/100
	4	GP-U 4	6,6	7,5	8,0	4,4	26,5	4,3	1.000/100
	5	GP-U 5	6,6	9,5	8,0	4,4	26,5	5,3	1.000/100
	6	GP-U 6	6,6	10,0	11,0	5,5	30,6	6,4	1.000/100
	8	GP-U 8	6,6	13,5	12,0	8,0	34,1	8,4	1.000/100
	10	GP-U 10	6,6	15,5	13,0	8,0	35,1	10,5	1.000/100
	10	GP-U 10/1	6,6	17,5	13,8	7,7	35,7	10,5	1.000/100
	12	GP-U 12	6,6	21,0	15,1	9,5	38,7	13,0	500/100
	14	GP-U 14	6,6	23,0	16,1	10,5	40,7	15,0	500/100
	16	GP-U 16	6,6	26,0	17,1	11,5	42,7	17,0	500/100

**Available on request*

INSULATED CHAIN TERMINALS

CRP
CBP
CGP

CP range with easy entry



HALOGEN FREE

OPERATING TEMPERATURE UP TO 115° C

The "CP" range of terminals has been designed to meet the increasing demands for improved safety and reliability of electrical connectors.

Developed for use with production machinery, to give a quick and reliable crimped joint.

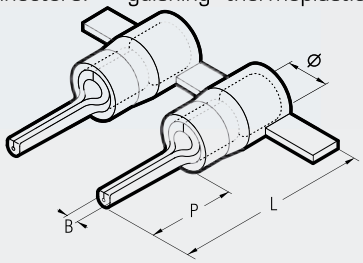
The polycarbonate insulation, is a halogen free, self extinguishing thermoplastic material class V0 (UL 94).

The unique funnel shaped entry of the insulation sleeve, guarantees total insertion of the conductor strands into the terminal barrel, creating a secure and reliable, electrical and mechanical connection.

The maximum operating temperature is 115°C (Surge 130°C).

Pin terminals

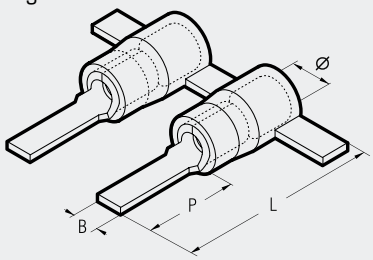
c UL us LISTED



Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	Quantity
0,25÷1,5 (22÷16)	CRP-P 8	4,0	1,8	8,0	17,9	2.000
	CRP-P 10	4,0	1,8	10,0	19,9	2.000
	CRP-P 12	4,0	1,8	12,0	22,1	2.000
1,5÷2,5 (16÷14)	CBP-P 8	4,9	1,8	8,0	17,9	1.750
	CBP-P 10	4,9	1,8	10,0	19,9	1.750
	CBP-P 12	4,9	1,8	12,0	21,9	1.750
4÷6 (12÷10)	CGP-P 10	6,6	2,2	10,0	24,5	1.250
	CGP-P 12	6,6	2,2	12,0	26,7	1.250
	CGP-P 14	6,6	2,2	14,0	28,7	1.250

blade terminal

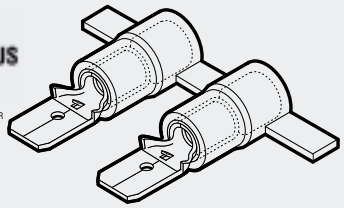
c UL us LISTED



Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	Quantity
0,25÷1,5 (22÷16)	CRP-PP 12	4,0	3,0	12,8	22,9	2.000
	*CRP-PP 12/1	4,0	3,0	11,3	21,4	2.000
	*CRP-PP 12/23	4,0	2,3	13,2	23,3	2.000
	CRP-PP 14	4,0	3,0	14,8	24,9	2.000
1,5÷2,5 (16÷14)	CBP-PP 12	4,9	3,5	12,8	22,9	1.750
	*CBP-PP 12/25	4,9	2,5	13,3	23,4	1.750
4÷6 (12÷10)	CGP-PP 12	6,6	4,0	13,3	27,4	1.250
	*CGP-PP 17	6,6	2,9	19,1	33,2	1.250

male disconnect terminals

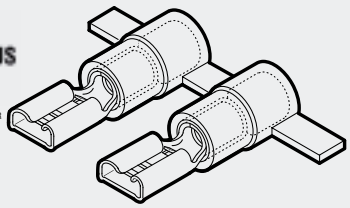
c UL us LISTED QUICK CONNECT CONNECTOR 28 JB



Conductor Size sqmm (AWG)	Ref.	Tab mm	Quantity
0,25÷1,5 (22÷16)	CRP-M 608	6,35 x 0,8	2.000
1,5÷2,5 (16÷14)	CBP-M 608	6,35 x 0,8	1.750
4÷6 (12÷10)	CGP-M 608	6,35 x 0,8	1.250

female disconnect terminals

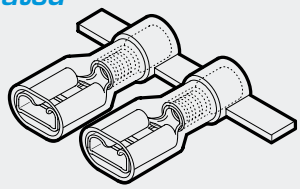
c UL us LISTED QUICK CONNECT CONNECTOR 28 JB



Conductor Size sqmm (AWG)	Ref.	Tab mm	Quantity
0,25÷1,5 (22÷16)	CRP-F 305	2,8 x 0,5	2.000
	CRP-F 308	2,8 x 0,8	2.000
	CRP-F 405	4,8 x 0,5	2.000
	CRP-F 408	4,8 x 0,8	2.000
	CRP-F 608	6,35 x 0,8	2.000
1,5÷2,5 (16÷14)	CBP-F 405	4,8 x 0,5	1.750
	CBP-F 408	4,8 x 0,8	1.750
	CBP-F 608	6,35 x 0,8	1.750
4÷6 (12÷10)	CGP-F 608	6,35 x 0,8	1.250

female disconnect terminals fully insulated

c UL us LISTED QUICK CONNECT CONNECTOR 28 JB



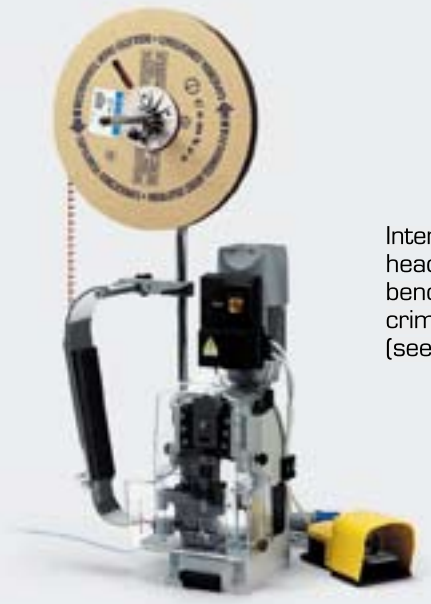
Conductor Size sqmm (AWG)	Ref.	Tab mm	Quantity
0,25÷1,5 (22÷16)	CRP-F 608P	6,35 x 0,8	1.500
1,5÷2,5 (16÷14)	CBP-F 608P	6,35 x 0,8	1.500
4÷6 (12÷10)	CGP-F 608P	6,35 x 0,8	1.250

**Available on request*

INSULATED CHAIN TERMINALS

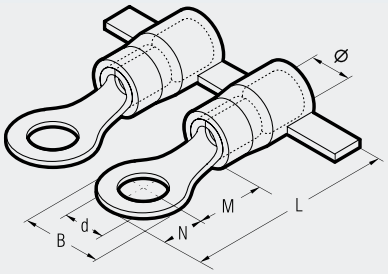
CP range with easy entry

CRP
CBP
CGP



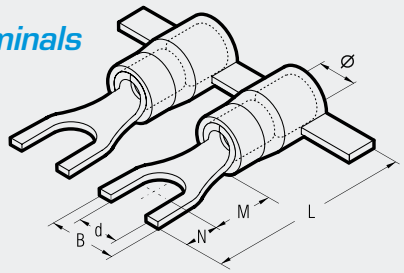
Interchangeable application heads are available for the bench press ELB-3 to suit the crimping of these connectors (see page 96).

ring terminals

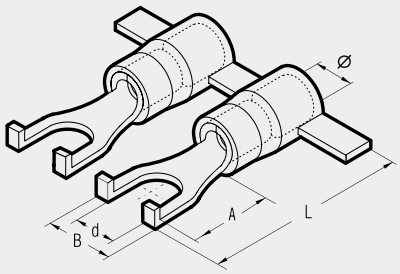


Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity
0,25÷1,5 (22÷16)	3	CRP-M 3	4,0	5,6	4,5	2,8	17,4	3,2	2.000
	3,5	CRP-M 3,5	4,0	5,6	4,5	2,8	17,4	3,7	2.000
	3,5	*CRP-M 3,5/1	4,0	6,2	7,1	3,1	20,2	3,7	2.000
	4	CRP-M 4	4,0	7,0	6,5	3,5	20,1	4,3	2.000
	4	*CRP-M 4/3	4,0	7,8	7,1	3,9	21,1	4,3	2.000
	5	CRP-M 5	4,0	7,8	7,1	3,9	21,1	5,3	2.000
	6	CRP-M 6	4,0	9,4	8,1	4,7	22,9	6,4	2.000
	6	*CRP-M 6/1	4,0	12,0	10,3	6,0	26,4	6,4	2.000
	7	CRP-M 7	4,0	9,4	8,1	4,7	22,9	7,2	2.000
	8	CRP-M 8	4,0	12,0	10,3	6,0	26,4	8,4	2.000
1,5÷2,5 (16÷14)	3	CBP-M 3	4,9	5,6	5,0	2,8	17,9	3,2	1.750
	3,5	CBP-M 3,5	4,9	5,6	5,0	2,8	17,9	3,7	1.750
	3,5	*CBP-M 3,5/1	4,9	6,2	6,5	3,1	19,6	3,7	1.750
	4	CBP-M 4	4,9	8,0	6,5	4,0	20,6	4,3	1.750
	5	CBP-M 5	4,9	8,0	7,5	4,0	21,6	5,3	1.750
	6	CBP-M 6	4,9	9,4	8,6	4,7	23,4	6,4	1.750
	6	*CBP-M 6/1	4,9	12,0	10,3	6,0	26,4	6,4	1.750
	7	CBP-M 7	4,9	10,0	7,8	5,0	22,9	7,2	1.750
	8	CBP-M 8	4,9	12,0	10,3	6,0	26,4	8,4	1.750
4÷6 (12÷10)	3	CGP-M 3	6,6	8,0	8,1	4,0	26,2	3,2	1.250
	3,5	CGP-M 3,5	6,6	8,0	8,1	4,0	26,2	3,7	1.250
	4	CGP-M 4	6,6	9,0	8,1	4,5	26,7	4,3	1.250
	5	CGP-M 5	6,6	9,0	8,1	4,5	26,7	5,3	1.250
	6	CGP-M 6	6,6	11,0	11,1	5,5	30,7	6,4	1.250
	6	*CGP-M 6/1	6,6	11,0	8,1	5,5	27,7	6,4	1.250
	7	CGP-M 7	6,6	11,0	11,1	5,5	30,7	7,2	1.250
	8	CGP-M 8	6,6	13,6	12,1	6,8	33,0	8,4	1.250
	8	*CGP-M 8/1	6,6	11,0	8,1	5,5	27,7	8,4	1.250

fork/spade terminals



Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity
0,25÷1,5 (22÷16)	3	CRP-U 3	4,0	5,5	5,5	4,0	19,6	3,2	2.000
	3,5	CRP-U 3,5	4,0	6,0	6,5	3,8	20,4	3,7	2.000
	3,5	*CRP-U 3,5/2	4,0	6,4	6,5	3,8	20,4	3,7	2.000
	4	CRP-U 4	4,0	6,5	7,5	3,7	21,3	4,3	2.000
	4	*CRP-U 4/1	4,0	8,5	7,5	3,7	21,3	4,3	2.000
	4	*CRP-U 4/2	4,0	7,5	7,5	3,7	21,3	4,3	2.000
	5	CRP-U 5	4,0	8,5	7,5	3,7	21,3	5,3	2.000
	6	CRP-U 6	4,0	9,4	8,1	4,7	22,9	6,4	2.000
	6	*CRP-U 6/1	4,0	12,0	9,2	7,1	26,4	6,4	2.000
	8	*CRP-U 8	4,0	14,0	10,0	6,3	26,4	8,4	2.000
1,5÷2,5 (16÷14)	3	CBP-U 3	4,9	5,5	5,5	4,0	19,6	3,2	1.750
	3,5	CBP-U 3,5	4,9	6,4	6,5	3,8	20,4	3,7	1.750
	4	CBP-U 4	4,9	6,5	7,5	3,7	21,3	4,3	1.750
	4	*CBP-U 4/1	4,9	8,5	7,5	3,7	21,3	4,3	1.750
	4	*CBP-U 4/2	4,9	7,5	7,5	3,7	21,3	4,3	1.750
	5	CBP-U 5	4,9	8,5	7,5	3,7	21,3	5,3	1.750
	6	CBP-U 6	4,9	9,4	8,1	4,7	22,9	6,4	1.750
4÷6 (12÷10)	3,5	*CGP-U 3,5	6,6	7,5	8,5	3,9	26,5	3,7	1.250
	4	*CGP-U 4	6,6	7,5	8,0	4,4	26,5	4,3	1.250
	5	CGP-U 5	6,6	9,5	8,0	4,4	26,5	5,3	1.250
	6	CGP-U 6	6,6	10,0	11,0	5,5	30,6	6,4	1.250



Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm Ø	B	A	L	d	Quantity
1,5÷2,5 (16÷14)	4	CBP-U 4/3L	4,9	6,5	9,5	14,5	4,3	1.750

*Available on request

PVC INSULATED CRIMP TERMINALS

RF BF GF

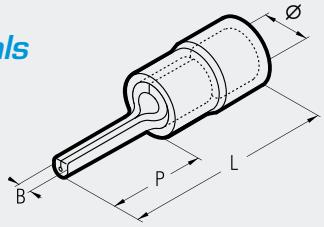
F range funnel entry

VALSTAR V3-F
Comprising:
- An assortment of crimp terminals for conductor sizes 0,25 ÷ 6 sqmm
- Tool HP3

The unique funnel shape of PVC sleeve, guarantees total insertion of the conductor strands into the terminal barrel, creating a secure and reliable, electrical and mechanical connection.

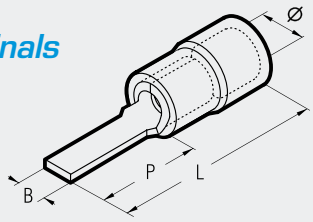
The internal surface of the barrel is rifled to improve contact with conductor strands when crimped and to increase tensile strength.
The "F" range of terminals offers a wide selection of rings, forks, pins and blades, designed to meet the ever changing requirements of the end users.
Recommended crimping tools are shown on pages 88 to 95, 121-122

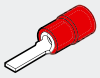
pin terminals



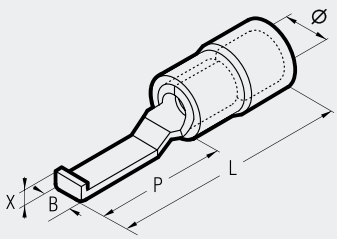
Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	Quantity Box/Bag
 0,25÷1,5 (22÷16)	RF-P 8	3,9	1,7	8,0	17,9	3.500/100
	RF-P 10	3,9	1,8	10,0	19,9	3.500/100
	RF-P 12	3,9	1,8	12,0	22,1	3.000/100
 1,5÷2,5 (16÷14)	BF-P 8	4,9	1,7	8,0	17,9	3.000/100
	BF-P 10	4,9	1,8	10,0	19,9	3.000/100
	BF-P 12	4,9	1,8	12,0	21,9	3.000/100
 4÷6 (12÷10)	GF-P 10	6,7	2,2	10,0	24,6	1.500/100
	GF-P 12	6,7	2,2	12,0	26,8	1.500/100
	GF-P 14	6,7	2,2	14,0	28,8	1.500/100

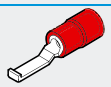
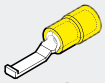
blade terminals



Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	Quantity Box/Bag
 0,25÷1,5 (22÷16)	RF-PP 12	3,9	3,0	12,8	22,9	3.500/100
	RF-PP 12/1	3,9	3,0	11,3	21,4	3.500/100
	RF-PP 12/19	3,9	1,9	13,2	23,3	3.500/100
	RF-PP 12/23	3,9	2,3	13,2	23,3	3.000/100
	RF-PP 14	3,9	3,0	14,8	24,9	3.000/100
	RF-PP 16/23	3,9	2,3	17,2	27,3	2.500/100
 1,5÷2,5 (16÷14)	BF-PP 12	4,9	3,5	12,8	22,9	2.500/100
	BF-PP 12/25	4,9	2,5	13,3	23,4	2.500/100
	BF-PP 12/29	4,9	2,9	13,3	23,4	2.500/100
	BF-PP 16/25	4,9	2,5	17,2	27,3	2.500/100
 4÷6 (12÷10)	GF-PP 12	6,7	4,0	13,3	27,5	1.000/100
	GF-PP 17	6,7	2,9	19,2	33,4	1.000/100

Hooked Blade Terminals



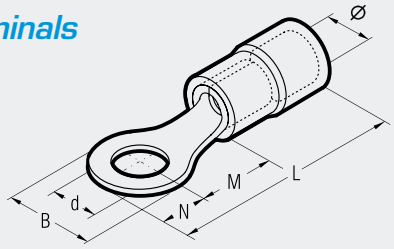
Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	X	Quantity Box/Bag
 0,25÷1,5 (22÷16)	RF-PPL 30	3,9	3,0	17,5	28,4	1,7	3.000/100
	RF-PPL 46	3,9	4,6	17,5	28,4	1,7	2.500/100
 1,5÷2,5 (16÷14)	BF-PPL 30	4,9	3,0	17,5	28,4	1,7	2.500/100
	BF-PPL 46	4,9	4,6	17,5	28,4	1,7	2.500/100
 4÷6 (12÷10)	GF-PPL 46	6,7	4,6	17,5	32,7	1,9	1.000/100

PVC INSULATED CRIMP TERMINALS

F range funnel entry

RF BF GF

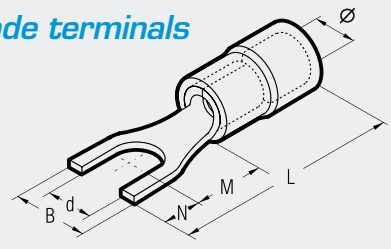
ring terminals



Cond. Size sqmm (AWG)	Ø Stud mm		Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity Box/Bag
0,25÷1,5 (22÷16)	2	*	RF-M 2	3,9	5,6	4,5	2,8	17,4	2,2	3.000/100
	3		RF-M 3	3,9	5,6	4,5	2,8	17,4	3,2	3.000/100
	3,5		RF-M 3,5	3,9	5,6	4,5	2,8	17,4	3,7	3.000/100
	3,5		RF-M 3,5/1	3,9	6,2	7,1	3,1	20,3	3,7	3.000/100
	4		RF-M 4	3,9	7,0	6,5	3,5	20,1	4,3	3.000/100
	4		RF-M 4/3	3,9	7,8	7,1	3,9	21,1	4,3	3.000/100
	5		RF-M 5	3,9	7,8	7,1	3,9	21,1	5,3	3.000/100
	6		RF-M 6	3,9	9,4	8,1	4,7	22,9	6,4	3.000/100
	6		RF-M 6/1	3,9	12,0	10,3	6,0	26,4	6,4	3.000/100
	7		RF-M 7	3,9	9,4	8,1	4,7	22,9	7,2	2.500/100
	8		RF-M 8	3,9	12,0	10,3	6,0	26,4	8,4	2.000/100
	10		RF-M 10	3,9	15,5	13,0	7,7	30,9	10,5	1.500/100
	12		RF-M 12	3,9	18,0	15,5	9,0	34,6	13,0	1.500/100
1,5÷2,5 (16÷14)	2	*	BF-M 2	4,9	5,6	5,0	2,8	17,9	2,2	2.500/100
	3		BF-M 3	4,9	5,6	5,0	2,8	17,9	3,2	2.500/100
	3,5		BF-M 3,5	4,9	5,6	5,0	2,8	17,9	3,7	2.500/100
	3,5		BF-M 3,5/1	4,9	6,2	6,5	3,1	19,7	3,7	2.500/100
	4		BF-M 4	4,9	8,0	6,5	4,0	20,6	4,3	2.500/100
	5		BF-M 5	4,9	8,0	7,5	4,0	21,6	5,3	2.500/100
	6		BF-M 6	4,9	9,4	8,6	4,7	23,4	6,4	2.500/100
	6		BF-M 6/1	4,9	12,0	10,3	6,0	26,4	6,4	2.000/100
	6	*	BF-M 6/2	4,9	8,4	5,4	4,2	19,7	6,4	2.500/100
	7		BF-M 7	4,9	10,0	7,8	5,0	22,9	7,2	2.000/100
	8		BF-M 8	4,9	12,0	10,3	6,0	26,4	8,4	1.500/100
	10		BF-M 10	4,9	15,5	13,0	7,7	30,9	10,5	1.500/100
	12		BF-M 12	4,9	18,0	15,5	9,0	34,6	13,0	1.000/100
4÷6 (12÷10)	3		GF-M 3	6,7	8,0	8,1	4,0	26,3	3,2	1.500/100
	3,5		GF-M 3,5	6,7	8,0	8,1	4,0	26,3	3,7	1.500/100
	4		GF-M 4	6,7	9,0	8,1	4,5	26,8	4,3	1.000/100
	5		GF-M 5	6,7	9,0	8,1	4,5	26,8	5,3	1.000/100
	6		GF-M 6	6,7	11,0	11,1	5,5	30,8	6,4	1.000/100
	6		GF-M 6/1	6,7	11,0	8,1	5,5	27,8	6,4	1.000/100
	7		GF-M 7	6,7	11,0	11,1	5,5	30,8	7,2	1.000/100
	8		GF-M 8	6,7	13,6	12,1	6,8	33,1	8,4	1.000/100
	8	*	GF-M 8/1	6,7	11,0	8,1	5,5	27,8	8,4	1.000/100
	10		GF-M 10	6,7	13,6	12,1	6,8	33,1	10,5	1.000/100
	10		GF-M 10/1	6,7	15,5	13,8	7,7	35,8	10,5	1.000/100
	12		GF-M 12	6,7	19,0	15,1	9,5	38,8	13,0	1.000/100
	14		GF-M 14	6,7	21,0	16,1	10,5	40,8	15,0	500/100
	16		GF-M 16	6,7	24,0	17,1	12,0	43,3	17,0	500/100

**Available on request*

fork/spade terminals



Cond. Size sqmm (AWG)	Ø Stud mm		Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity Box/Bag
0,25÷1,5 (22÷16)	3		RF-U 3	3,9	5,5	5,5	4,0	19,6	3,2	3.500/100
	3,5		RF-U 3,5	3,9	6,0	6,5	3,8	20,4	3,7	3.500/100
	3,5		RF-U 3,5/1	3,9	7,2	6,5	3,8	20,4	3,7	4.000/100
	3,5		RF-U 3,5/2	3,9	6,4	6,5	3,8	20,4	3,7	3.500/100
	4		RF-U 4	3,9	6,5	7,5	3,7	21,3	4,3	3.000/100
	4		RF-U 4/1	3,9	8,5	7,5	3,7	21,3	4,3	3.000/100
	4		RF-U 4/2	3,9	7,5	7,5	3,7	21,3	4,3	3.000/100
	5		RF-U 5	3,9	8,5	7,5	3,7	21,3	5,3	3.000/100
	5	*	RF-U 5/1	3,9	9,4	7,5	3,7	21,3	5,3	3.000/100
	6		RF-U 6	3,9	9,4	8,1	4,7	22,9	6,4	2.500/100
	6		RF-U 6/1	3,9	12,0	9,2	7,1	26,4	6,4	2.500/100
	8		RF-U 8	3,9	14,0	10,0	6,3	26,4	8,4	2.000/100
	10		RF-U 10	3,9	17,5	13,0	7,7	30,9	10,5	1.500/100
	12		RF-U 12	3,9	20,0	15,5	9,0	34,6	13,0	1.500/100
1,5÷2,5 (16÷14)	3		BF-U 3	4,9	5,5	5,5	4,0	19,6	3,2	2.500/100
	3,5		BF-U 3,5	4,9	6,4	6,5	3,8	20,4	3,7	2.500/100
	3,5	*	BF-U 3,5/1	4,9	7,2	6,5	3,8	20,4	3,7	2.500/100
	4		BF-U 4	4,9	6,5	7,5	3,7	21,3	4,3	2.500/100
	4		BF-U 4/1	4,9	8,5	7,5	3,7	21,3	4,3	2.000/100
	4		BF-U 4/2	4,9	7,5	7,5	3,7	21,3	4,3	2.000/100
	5		BF-U 5	4,9	8,5	7,5	3,7	21,3	5,3	2.500/100
	6		BF-U 6	4,9	9,4	8,1	4,7	22,9	6,4	2.500/100
	6		BF-U 6/1	4,9	12,0	9,2	7,1	26,4	6,4	2.000/100
	8		BF-U 8	4,9	14,0	10,0	6,3	26,4	8,4	1.500/100
	10		BF-U 10	4,9	17,5	13,0	7,7	30,9	10,5	2.000/100
	12		BF-U 12	4,9	20,0	15,5	9,0	34,6	13,0	1.000/100
4÷6 (12÷10)	3,5		GF-U 3,5	6,7	7,5	8,5	3,9	26,6	3,7	1.500/100
	4		GF-U 4	6,7	7,5	8,0	4,4	26,6	4,3	1.000/100
	5		GF-U 5	6,7	9,5	8,0	4,4	26,6	5,3	1.000/100
	6		GF-U 6	6,7	10,0	11,0	5,5	30,7	6,4	1.000/100
	8		GF-U 8	6,7	13,5	12,0	8,0	34,2	8,4	1.000/100
	10		GF-U 10	6,7	15,5	13,0	8,0	35,2	10,5	1.000/100
	10		GF-U 10/1	6,7	17,5	13,8	7,7	35,8	10,5	1.000/100
	12		GF-U 12	6,7	21,0	15,1	9,5	38,8	13,0	500/100
	14		GF-U 14	6,7	23,0	16,1	10,5	40,8	15,0	500/100
	16		GF-U 16	6,7	26,0	17,1	11,5	42,8	17,0	500/100

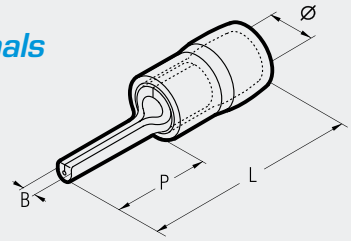
REINFORCED PVC INSULATED TERMINALS

RK BK GK

K range

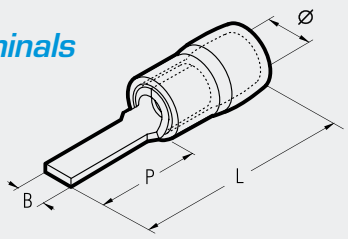
"K" range terminals have been designed to offer maximum efficiency under heavy duty applications.
This enhanced performance is achieved by involving the cable insulation in the crimp, and utilising a copper sleeve which is located between the terminal barrel and the PVC sleeve.
This copper sleeve will be formed around the cable insulation when crimped, to give increased mechanical strength to the joint.
"K" range terminals are therefore ideal for use in applications which are subject to continuous mechanical vibration (eg. engines, motors, rolling stock etc.).
Recommended crimping tool: HP 3-K

pin terminals



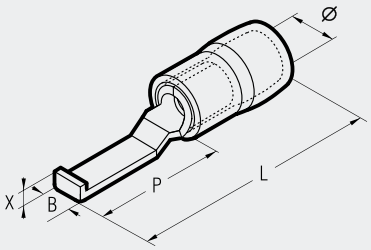
Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	Quantity Box/Bag
 0,25÷1,5 (22÷16)	**RK-P 8**	4,1	1,7	7,8	17,8	*3.500/100*
	RK-P 10	4,1	1,8	9,8	19,8	*3.500/100*
	RK-P 12	4,1	1,8	12,0	22,0	*3.000/100*
 1,5÷2,5 (16÷14)	**BK-P 8**	4,6	1,7	7,8	17,8	*3.000/100*
	BK-P 10	4,6	1,8	9,8	19,8	*3.000/100*
	BK-P 12	4,6	1,8	11,8	21,8	*3.000/100*
 4÷6 (12÷10)	**GK-P 10**	6,6	2,2	10,4	24,4	*1.500/100*
	GK-P 12	6,6	2,2	12,6	26,6	*1.500/100*
	GK-P 14	6,6	2,2	14,6	28,6	*1.500/100*

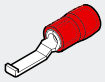
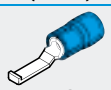
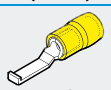
blade terminals



Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	Quantity Box/Bag
 0,25÷1,5 (22÷16)	**RK-PP 12**	4,1	3,0	12,8	22,8	*3.500/100*
	RK-PP 12/19	4,1	1,9	13,2	23,2	*3.500/100*
	RK-PP 16/23	4,1	2,3	17,2	27,2	*2.500/100*
 1,5÷2,5 (16÷14)	**BK-PP 12**	4,6	3,5	12,8	22,8	*2.500/100*
	BK-PP 12/25	4,6	2,5	13,3	23,3	*2.500/100*
	BK- PP 16/25	4,6	2,5	17,2	27,2	*2.500/100*
 4÷6 (12÷10)	**GK-PP 12**	6,6	4,0	13,3	27,3	*1.000/100*
	GK-PP 17	6,6	2,9	19,2	33,2	*1.000/100*

Hooked Blade Terminals



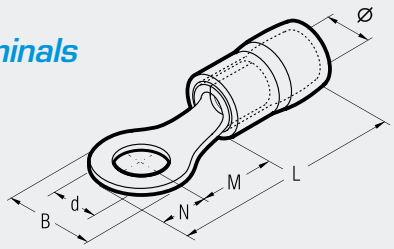
Conductor Size sqmm (AWG)	Ref.	Dimensions mm Ø	B	P	L	X	Quantity Box/Bag
 0,25÷1,5 (22÷16)	**RK-PPL 30**	4,1	3,0	17,5	28,3	1,7	*3.000/100*
	RK-PPL 46	4,1	4,6	17,5	28,3	1,7	*3.000/100*
 1,5÷2,5 (16÷14)	**BK-PPL 30**	4,6	3,0	17,5	28,3	1,7	*2.500/100*
	BK-PPL 46	4,6	4,6	18,0	28,3	1,7	*2.500/100*
 4÷6 (12÷10)	**GK-PPL 46**	6,6	4,6	17,5	32,5	1,9	*1.000/100*

REINFORCED PVC INSULATED TERMINALS

K range

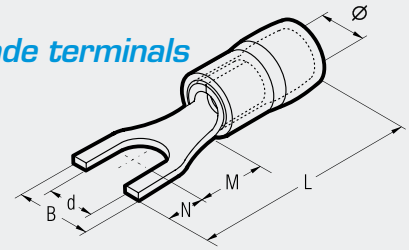
RK BK GK

ring terminals



Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity Box/Bag
0,25÷1,5 (22÷16)	3	**RK-M 3**	4,1	5,6	4,5	2,8	17,3	3,2	*3.000/100*
	3,5	**RK-M 3,5**	4,1	5,6	4,5	2,8	17,3	3,7	*3.000/100*
	3,5	**RK-M 3,5/1**	4,1	6,2	7,1	3,1	20,2	3,7	*3.000/100*
	4	**RK-M 4**	4,1	7,0	6,5	3,5	20,0	4,3	*3.000/100*
	5	**RK-M 5**	4,1	7,8	7,1	3,9	21,0	5,3	*3.000/100*
	6	**RK-M 6**	4,1	9,4	8,1	4,7	22,8	6,4	*3.000/100*
	6	**RK-M 6/1**	4,1	12,0	10,3	6,0	26,3	6,4	*3.000/100*
	7	**RK-M 7**	4,1	9,4	8,1	4,7	22,8	7,2	*2.500/100*
	8	**RK-M 8**	4,1	12,0	10,3	6,0	26,3	8,4	*2.500/100*
	10	**RK-M 10**	4,1	15,5	13,0	7,7	30,8	10,5	*1.500/100*
	12	**RK-M 12**	4,1	18,0	15,5	9,0	34,5	13,0	*1.500/100*
1,5÷2,5 (16÷14)	3	**BK-M 3**	4,6	5,6	5,0	2,8	17,8	3,2	*2.500/100*
	3,5	**BK-M 3,5**	4,6	5,6	5,0	2,8	17,8	3,7	*2.500/100*
	3,5	**BK-M 3,5/1**	4,6	6,2	6,5	3,1	19,6	3,7	*2.500/100*
	4	**BK-M 4**	4,6	8,0	6,5	4,0	20,5	4,3	*2.500/100*
	5	**BK-M 5**	4,6	8,0	7,5	4,0	21,5	5,3	*2.500/100*
	6	**BK-M 6**	4,6	9,4	8,6	4,7	23,3	6,4	*2.500/100*
	6	**BK-M 6/1**	4,6	12,0	10,3	6,0	26,3	6,4	*2.000/100*
	7	**BK-M 7**	4,6	10,0	7,8	5,0	22,8	7,2	*2.000/100*
	8	**BK-M 8**	4,6	12,0	10,3	6,0	26,3	8,4	*1.500/100*
	10	**BK-M 10**	4,6	15,5	13,0	7,7	30,8	10,5	*1.500/100*
	12	**BK-M 12**	4,6	18,0	15,5	9,0	34,5	13,0	*1.000/100*
4÷6 (12÷10)	3	**GK-M 3**	6,6	8,0	8,1	4,0	26,1	3,2	*1.500/100*
	3,5	**GK-M 3,5**	6,6	8,0	8,1	4,0	26,1	3,7	*1.500/100*
	4	**GK-M 4**	6,6	9,0	8,1	4,5	26,6	4,3	*1.000/100*
	5	**GK-M 5**	6,6	9,0	8,1	4,5	26,6	5,3	*1.000/100*
	6	**GK-M 6**	6,6	11,0	11,1	5,5	30,6	6,4	*1.000/100*
	7	**GK-M 7**	6,6	11,0	11,1	5,5	30,6	7,2	*1.000/100*
	8	**GK-M 8**	6,6	13,6	12,1	6,8	32,9	8,4	*1.000/100*
	8	**GK-M 8/1**	6,6	11,0	8,1	5,5	27,6	8,4	*1.000/100*
	10	**GK-M 10**	6,6	13,6	12,1	6,8	32,9	10,5	*1.000/100*
	10	**GK-M 10/1**	6,6	15,5	13,8	7,7	35,6	10,5	*1.000/100*
	12	**GK-M 12**	6,6	19,0	15,1	9,5	38,6	13,0	*500/100*
	14	**GK-M 14**	6,6	21,0	16,1	10,5	40,6	15,0	*500/100*
	16	**GK-M 16**	6,6	24,0	17,1	12,0	43,1	17,0	*500/100*

fork/spade terminals



Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity Box/Bag
0,25÷1,5 (22÷16)	3	**RK-U 3**	4,1	5,5	5,5	4,0	19,5	3,2	*3.000/100*
	3,5	**RK-U 3,5**	4,1	6,0	6,5	3,8	20,3	3,7	*3.000/100*
	4	**RK-U 4**	4,1	6,5	7,5	3,7	21,2	4,3	*3.000/100*
	5	**RK-U 5**	4,1	8,5	7,5	3,7	21,2	5,3	*3.000/100*
	6	**RK-U 6**	4,1	9,4	8,1	4,7	22,8	6,4	*2.500/100*
	6	**RK-U 6/1**	4,1	12,0	9,2	7,1	26,3	6,4	*2.500/100*
	8	**RK-U 8**	4,1	14,0	10,0	6,3	26,3	8,4	*2.500/100*
	10	**RK-U 10**	4,1	17,5	13,0	7,7	30,8	10,5	*1.500/100*
	12	**RK-U 12**	4,1	20,0	15,5	9,0	34,5	13,0	*1.500/100*
1,5÷2,5 (16÷14)	3	**BK-U 3**	4,6	5,5	5,5	4,0	19,5	3,2	*2.500/100*
	3,5	**BK-U 3,5**	4,6	6,4	6,5	3,8	20,3	3,7	*2.500/100*
	4	**BK-U 4**	4,6	6,5	7,5	3,7	21,2	4,3	*2.500/100*
	5	**BK-U 5**	4,6	8,5	7,5	3,7	21,2	5,3	*2.500/100*
	6	**BK-U 6**	4,6	9,4	8,1	4,7	22,8	6,4	*2.500/100*
	6	**BK-U 6/1**	4,6	12,0	9,2	7,1	26,3	6,4	*2.500/100*
	8	**BK-U 8**	4,6	14,0	10,0	6,3	26,3	8,4	*1.500/100*
	10	**BK-U 10**	4,6	17,5	13,0	7,7	30,8	10,5	*2.000/100*
	12	**BK-U 12**	4,6	20,0	15,5	9,0	34,5	13,0	*1.000/100*
4÷6 (12÷10)	3,5	**GK-U 3,5**	6,6	7,5	8,5	3,9	26,4	3,7	*1.500/100*
	4	**GK-U 4**	6,6	7,5	8,0	4,4	26,4	4,3	*1.000/100*
	5	**GK-U 5**	6,6	9,5	8,0	4,4	26,4	5,3	*1.000/100*
	6	**GK-U 6**	6,6	10,0	11,0	5,5	30,5	6,4	*1.000/100*
	8	**GK-U 8**	6,6	13,5	12,0	8,0	34,0	8,4	*1.000/100*
	10	**GK-U 10**	6,6	15,5	13,0	8,0	35,0	10,5	*1.000/100*
	12	**GK-U 12**	6,6	21,0	15,1	9,5	38,6	13,0	*500/100*
	14	**GK-U 14**	6,6	23,0	16,1	10,5	40,6	15,0	*500/100*
	16	**GK-U 16**	6,6	26,0	17,1	11,5	42,6	17,0	*500/100*

FEMALE DISCONNECT TERMINALS

RF-F
BF-F
GF-F

Manufactured from brass strip
- Electrolytically tin plated
- Recommended crimping tools are shown on pages 88 to 95, 121-122

polycarbonate insulated terminals - partially reinforced with copper sleeve

Cond. Size sqmm (AWG)	Ref.	Tab Size	Quantity Box/Bag
0,25÷1,5 (22÷16)	RF-F 305	2,8 x 0,5	3.500/100
	RF-F 308	2,8 x 0,8	3.500/100
	RF-F 405	4,8 x 0,5	3.000/100
	RF-F 408	4,8 x 0,8	3.000/100
	RF-F 608	6,35 x 0,8	2.000/100
1,5÷2,5 (16÷14)	BF-F 405	4,8 x 0,5	3.000/100
	BF-F 408	4,8 x 0,8	2.500/100
	BF-F 608	6,35 x 0,8	2.000/100
4÷6 (12÷10)	GF-F 608	6,35 x 0,8	1.000/100

polycarbonate fully insulated terminals - partially reinforced with copper sleeve

Cond. Size sqmm (AWG)	Ref.	Tab Size	Quantity Box/Bag
0,25÷1,5 (22÷16)	RF-F 305P	2,8 x 0,5	2.500/100
	RF-F 308P	2,8 x 0,8	2.500/100
	RF-F 405P	4,8 x 0,5	2.000/100
	RF-F 408P	4,8 x 0,8	2.000/100
	RF-F 608P	6,35 x 0,8	1.500/100
1,5÷2,5 (16÷14)	BF-F 405P	4,8 x 0,5	2.000/100
	BF-F 408P	4,8 x 0,8	2.000/100
	BF-F 608P	6,35 x 0,8	1.500/100
4÷6 (12÷10)	GF-F 608P	6,35 x 0,8	1.000/100

PVC insulated terminals - fully reinforced with copper sleeve

Manufactured from brass strip
- Electrolytically tin plated
- Recommended crimping tool: HP 3

Cond. Size sqmm (AWG)	Ref.	Tab Size	Quantity Box/Bag
0,25÷1,5 (22÷16)	RKF-F 608	6,35 x 0,8	2.500/100
1,5÷2,5 (16÷14)	BKF-F 608	6,35 x 0,8	2.000/100
4÷6 (12÷10)	GK-F 608	6,35 x 0,8	1.500/100

MALE DISCONNECT TERMINALS

RF-M
BF-M
GF-M

Manufactured from brass strip
- Electrolytically tin plated
- Recommended crimping tools are shown on pages 88 to 95, 121-122

polycarbonate insulated terminals - partially reinforced with copper sleeve

Cond. Size sqmm (AWG)	Ref.	Tab Size	Quantity Box/Bag
0,25÷1,5 (22÷16)	RF-M 608	6,35 x 0,8	3.000/100
1,5÷2,5 (16÷14)	BF-M 608	6,35 x 0,8	2.500/100
4÷6 (12÷10)	GF-M 608	6,35 x 0,8	1.000/100

polycarbonate fully insulated terminals - partially reinforced with copper sleeve

Cond. Size sqmm (AWG)	Ref.	Tab Size	Quantity Box/Bag
0,25÷1,5 (22÷16)	RF-M 608P	6,35 x 0,8	1.000/100
1,5÷2,5 (16÷14)	BF-M 608P	6,35 x 0,8	1.000/100

MALE/FEMALE CONNECTORS

RF-FM
BF-FM
RF-B
BF-B

Manufactured from brass strip
- Electrolytically tin plated
- Recommended crimping tools are shown on pages 88 to 95, 121-122

polycarbonate insulated terminals - partially reinforced with copper sleeve

Cond. Size sqmm (AWG)	Ref.	Tab Size	Quantity Box/Bag
0,25÷1,5 (22÷16)	RF-FM 608	6,35 x 0,8	1.500/100
1,5÷2,5 (16÷14)	BF-FM 608	6,35 x 0,8	1.500/100

BULLET AND SOCKET CONNECTORS

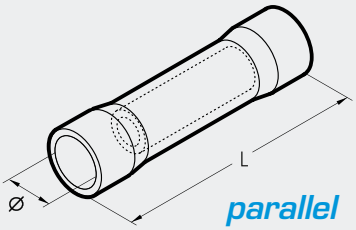
polycarbonate insulated terminals - partially reinforced with copper sleeve

Cond. Size sqmm (AWG)	Ref.	Øi mm	Quantity Box/Bag
0,25÷1,5 (22÷16)	RF-BM 4	4	2.500/100
	RF-BF 4	4	1.000/100
1,5÷2,5 (16÷14)	BF-BM 5	5	2.000/100
	BF-BF 5	5	800/100

BUTT AND PARALLEL CONNECTORS

PL-M
PL-P

butt connectors



parallel connectors

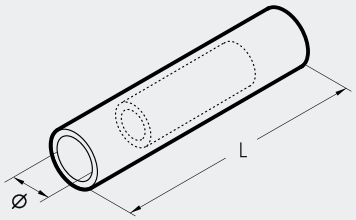
PVC insulated

Cond. Size sqmm (AWG)	Ref.	Ø mm	L mm	Quantity Box/Bag
0,2÷0,5 (24÷20)	PL 01-M	3,0	25	3.000/100
0,25÷1,5 (22÷16)	PL 03-M	4,0	25	2.000/100
1,5÷2,5 (16÷14)	PL 06-M	5,0	25	1.500/100
4÷6 (12÷10)	PL 1-M	6,5	32	500/100
0,25÷1,5 (22÷16)	PL 03-P	4,0	20	3.000/100
1,5÷2,5 (16÷14)	PL 06-P	5,0	16	2.000/100

Manufactured from copper tube
- Electrolytically tin plated
- Recommended crimping tools are shown on pages 88 to 95, 121-122

BUTT CONNECTORS

NL-M

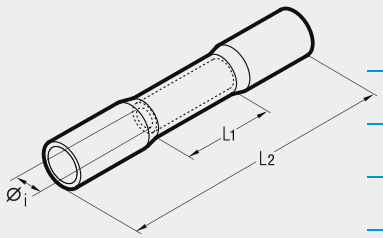


Nylon insulated

Cond. Size sqmm (AWG)	Ref.	Øi mm	L mm	Quantity Box/Bag
0,25÷1,5 (22÷16)	NL 03-M	4,0	25,0	2.000/100
1,5÷2,5 (16÷14)	NL 06-M	5,4	25,5	1.500/100
4÷6 (12÷10)	NL 1-M	5,4	32,0	1.000/100
10 (8÷7)	NL 2-M	6,8	43,0	500/100
16 (6÷5)	NL 3-M	7,9	44,0	500/100

Manufactured from copper tube
- Electrolytically tin plated
- Recommended crimping tools are shown on pages 88 to 95, 121-122

WL-M



PE HD insulated, heat shrinkable

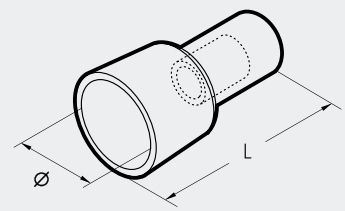
Cond. Size sqmm (AWG)	Ref.	Ø i mm	L1 mm	L2 mm	Quantity Box/Bag
0,5÷1 (20÷17)	WL 03-M	1,7	15,0	36,0	100
1,5÷2,5 (16÷14)	WL 06-M	2,3	15,0	36,0	100
4÷6 (12÷10)	WL 1-M	3,4	15,0	41,0	100

Max operating voltage: 600 V
Shrink temperature: 150 °C
Temperature range: -40 °C to + 105 °C

Manufactured from copper tube
- Electrolytically tin plated
- Heat shrink sleeve with sealant
- Recommended crimping tools are shown on pages 88 to 95

CLOSE END CONNECTORS

NL-P



Nylon insulated

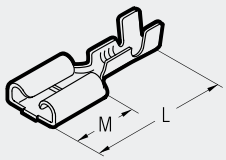
Cond. Size sqmm (AWG)	Ref.	Øi mm	L mm	Quantity Box/Bag
1,5÷2,5 (16÷14)	NL 06-P	7,9	19,9	1.000/100
	NL 06-PB	6,5	13,6	1.500/100
4÷6 (12÷10)	NL 1-P	10,5	21,5	800/100
	NL 1-PG	9,0	17,8	1.000/100

Manufactured from copper tube
- Electrolytically tin plated
- Recommended crimping tools are shown on pages 88 to 95, 121-122

FEMALE CONNECTORS

RN-FA
BN-FA

open barrel



- Manufactured from brass strip
- Recommended crimping tools are shown on pages 88 and 89

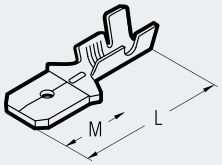
Conductor Size sqmm (AWG)	Ref.	Tab mm	M mm	L mm	Quantity Box/Bag
0,5÷1 (20÷17)	RN-FA 305	2,8 x 0,5	6,3	15,0	6.000/100
	RN-FA 405	4,8 x 0,5	6,3	15,0	5.000/100
	RN-FA 608	6,3 x 0,8	7,7	19,0	3.000/100
1÷2,5 (17÷14)	BN-FA 608	6,3 x 0,8	7,7	19,0	3.000/100
1÷2,5 (17÷14)	* BN-FAB 608	6,3 x 0,8	7,7	15,5	1.000/100
1÷2,5 (17÷14)	** BN-FAR 608	6,3 x 0,8	7,7	19,0	3.000/100

*flag type **with retainer

MALE CONNECTORS

RN-MA
BN-MA

open barrel



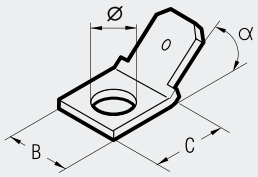
- Manufactured from brass strip
- Recommended crimping tool is shown on page 89

Conductor Size sqmm (AWG)	Ref.	Tab mm	M mm	L mm	Quantity Box/Bag
0,5÷1 (20÷17)	RN-MA 305	2,8 x 0,5	5,8	13,0	6.000/100
	RN-MA 405	4,8 x 0,5	6,3	17,3	5.000/100
	RN-MA 608	6,3 x 0,8	7,9	19,7	4.000/100
1÷2,5 (17÷14)	BN-MA 608	6,3 x 0,8	7,9	20,0	4.000/100

MALE TABS

MP
MPD

for board mounting



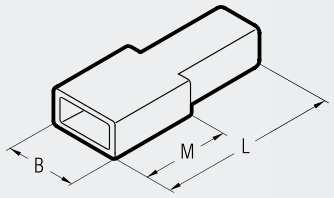
- Manufactured from brass strip

Ref.	Tab mm	Ø Stud mm	B mm	C mm	α	Quantity Box/Bag
MP 608	6,3 x 0,8	4	8	8,5	0°	5.000/100
MP 608/45	6,3 x 0,8	4	8	8,5	45°	6.000/100
MP 608/90	6,3 x 0,8	4	8	8,5	90°	5.000/100
* MP 608D	6,3 x 0,8	4	8	14	0°	5.000/100

*double tab

CFA
CMA

UL Approved ®



Ref.	Connector	B mm	M mm	L mm	Material	*Quantity Box/Bag*
CFA 300	Female 2,8	5,5	7	18	Polyethylene	*3.000/100*
CFA 400	Female 4,8	7,5	9	20	Polyethylene	*2.000/100*
***CFA 600**	Female 6,3	9,0	11	24	Polyethylene	*1.500/100*
****CFA2 600**	Female 6,3	9,0	9	22	Polyethylene	*1.500/100*
CFAR 600	Female 6,3 frontal insertion with retainer	9,0	12	25	Polyamide 6.6	*1.000/100*
CFAB 600	Female 6,3 flag	10,0	-	19	Polyamide 6.6	*1.000/100*
***CMA 600**	Male 6,3	12,0	11	22	Polyethylene	*1.000/100*

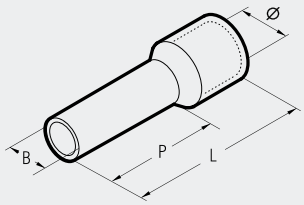
* *For a single cable.*
Colours available:
Transparent: no suffix
Red: add suffix R
Black: add suffix N

** *For twin cables.*
Colours available:
Transparent: no suffix
Red: add suffix R
Black: add suffix N
Green: add suffix V
Blue: add suffix B
Yellow: add suffix G

POLYPROPYLENE INSULATED END SLEEVES

PKE
PKC
CPKD

for flexible copper cables



The PKE, PKC, CPKD range of end sleeves is manufactured from tin plated electrolytic copper.
Designed and developed to reinforce the fine wire strands, when terminating a cable into a connector block.
Recommended crimping tools are shown on pages 88 to 95, 99, 121-122.

Conductor Size sqmm	Ref.	Dimensions mm Ø	B	P	L	Insulation Colour	Quantity Box/Bag
0,1÷0,3	**PKE 308**	1,9	1,3	8,0	12,4	yellow	25.000/500
0,3÷0,5	**PKE 508**	2,6	1,3	8,0	14,0	white	10.000/500
0,75	**PKE 7508**	3,4	1,6	8,2	14,6	blue	10.000/500
1,0	**PKE 108**	3,4	1,8	8,2	14,6	red	10.000/500
1,5	**PKE 1508**	3,8	2,1	8,2	14,6	black	10.000/500
	PKE 1518	3,8	2,1	18,0	24,4		5.000/500
2,5	**PKE 2508**	4,4	2,6	8,2	15,2	grey	7.500/500
	PKE 2518	4,4	2,6	18,0	25,0		5.000/500
4,0	**PKE 409**	4,8	3,2	9,0	16,0	orange	5.000/200
	PKE 418	4,8	3,2	18,0	25,0		3.000/200
6,0	**PKE 612**	5,8	3,9	12,0	20,0	green	2.500/100
	PKE 618	5,8	3,9	18,0	26,0		2.000/100
10,0	**PKE 1012**	7,4	4,8	12,0	21,5	brown	1.500/100
	PKE 1018	7,4	4,8	18,0	27,5		1.500/100
16,0	**PKE 1612**	9,3	5,9	12,0	22,7	white	1.000/100
	PKE 1618	9,3	5,9	18,0	28,6		1.000/100
25,0	**PKE 25016**	10,0	7,9	16,0	29,0	black	500/50
	PKE 25022	10,0	7,9	22,0	35,0		500/50

VALSTAR ND#2/PKE
Comprising:
- a selection of PKE end sleeves conductor size 1÷6 sqmm
- tool ND#2

VALSTAR ND#2/PKC
Comprising:
- a selection of PKC end sleeves conductor size 1÷6 sqmm
- tool ND#2

Conductor Size sqmm	Ref.	Dimensions mm Ø	B	P	L	Insulation Colour	Quantity Box/Bag
0,1÷0,3	**PKC 306**	1,9	1,3	6,0	10,4	light blue	25.000/500
	PKC 308	1,9	1,3	8,0	12,4		25.000/500
0,3÷0,5	**PKC 508**	2,6	1,3	8,0	14,0	orange	10.000/500
	PKC 510	2,6	1,3	10,0	16,0		10.000/500
0,75	**PKC 7508**	3,4	1,6	8,2	14,6	white	10.000/500
	PKC 7512	3,4	1,6	12,0	18,4		10.000/500
1,0	**PKC 108**	3,4	1,8	8,2	14,6	yellow	10.000/500
	PKC 112	3,4	1,8	12,0	18,4		10.000/500
1,5	**PKC 1508**	3,8	2,1	8,2	14,6	red	10.000/500
	PKC 1518	3,8	2,1	18,0	24,4		5.000/500
2,5	**PKC 2508**	3,9	2,6	8,2	15,2	blue	7.500/500
	PKC 2518	3,9	2,6	18,0	25,0		5.000/500
4,0	**PKC 409**	4,8	3,2	9,0	16,0	grey	5.000/200
	PKC 418	4,8	3,2	18,0	25,0		3.000/200
6,0	**PKC 612**	5,8	3,9	12,0	20,0	black	2.500/100
	PKC 618	5,8	3,9	18,0	26,0		2.000/100
10,0	**PKC 1012**	7,4	4,8	12,0	21,5	ivory	1.500/100
	PKC 1018	7,4	4,8	18,0	27,5		1.500/100
16,0	**PKC 1612**	9,3	5,9	12,0	22,7	green	1.000/100
	PKC 1618	9,3	5,9	18,0	28,6		1.000/100
25,0	**PKC 25016**	10,0	7,9	16,0	29,0	brown	500/50
	PKC 25022	10,0	7,9	22,0	35,0		500/50
35,0	**PKC 35016**	12,0	8,9	16,0	30,0	beige	500/50
	PKC 35025	12,0	8,9	25,0	39,0		400/50
50,0	**PKC 50020**	13,8	11,0	20,0	36,0	olive	300/50
	PKC 50030	13,8	11,0	30,0	46,0		250/50

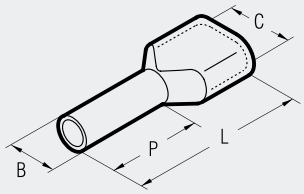
Insulated chain end sleeves

Developed for use with production equipment, to give a quick and reliable crimped joint. Conforms to DIN standard 46 228/4.

Conductor Size sqmm	Ref.	Dimensions mm Ø	B	P	L	Insulation Colour	Quantity Reel
0,3÷0,5	**CPKD 508**	2,6	1,3	8,0	14,0	white	5.000
0,75	**CPKD 7508**	2,8	1,5	8,0	14,0	grey	5.000
1	**CPKD 108**	3,0	1,7	8,0	14,0	red	5.000
1,5	**CPKD 1508**	3,5	2,0	8,0	14,0	black	5.000
2,5	**CPKD 2508**	4,2	2,5	8,0	14,0	blue	3.000

"TWIN" POLYPROPYLENE INSULATED END SLEEVES

for fine stranded cables



PKET
PKCT

Type PKET, PKCT ranges of twin end sleeves are manufactured from tin plated electrolytic copper.
Designed to accomodate two cables terminating in the same sleeve they are ideal for looping conductors.

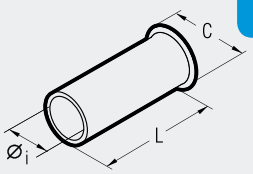
Recommended crimping tools are shown on pages 88 to 95, 99, 121-122.

Conductor Size sqmm	Ref.	Dimensions mm C	B	P	L	Insulation Colour	ND#1,ND#2,ND#3 and HNKE 50 Compression Aperture	Quantity Bag
2 x 0,5	**PKET 508**	4,6x2,6	1,5	8,0	15,0	white	1,5	500
2 x 0,75	**PKET 7508**	5,2x2,6	2,1	8,0	15,0	blue	1,5	500
	PKET 7512	5,2x2,6	2,1	12,0	19,0			500
2 x 1	**PKET 108**	5,8x3,2	2,6	8,0	16,0	red	1,5	500
	PKET 112	5,8x3,2	2,6	12,0	20,0			500
2 x 1,5	**PKET 1508**	6,5x3,6	2,6	8,0	16,0	black	2,5	500
	PKET 1512	6,5x3,6	2,6	12,0	20,0		2,4	500
2 x 2,5	**PKET 2510**	7,5x4,3	3,2	10,0	18,0	grey	4	250
	PKET 2512	7,5x4,3	3,2	12,0	21,0			250
2 x 4	**PKET 412**	9,0x5,2	4,2	12,0	23,0	orange	6	100
2 x 6	**PKET 614**	10,0x7,2	5,3	14,0	26,0	green	10	100
2 x 10	**PKET 1014**	13,0x7,2	7,0	14,0	26,0	brown	16	100
2 x 16	**PKET 1616**	18,0x9,5	8,8	16,0	30,0	white	35	100

Conductor Size sqmm	Ref.	Dimensions mm C	B	P	L	Insulation Colour	ND#1,ND#2,ND#3 and HNKE 50 Compression Aperture	Quantity Bag
2 x 0,5	**PKCT 508**	4,6x2,6	1,5	8,0	15,0	orange	1,5	500
2 x 0,75	**PKCT 7508**	5,2x2,6	2,1	8,0	15,0	white	1,5	500
	PKCT 7512	5,2x2,6	2,1	12,0	19,0			500
2 x 1	**PKCT 108**	5,8x3,2	2,6	8,0	16,0	yellow	1,5	500
	PKCT 112	5,8x3,2	2,6	12,0	20,0			500
2 x 1,5	**PKCT 1508**	6,5x3,6	2,6	8,0	16,0	red	2,5	500
	PKCT 1512	6,5x3,6	2,6	12,0	20,0		2,4	500
2 x 2,5	**PKCT 2510**	7,5x4,3	3,2	10,0	18,0	blue	4	250
	PKCT 2512	7,5x4,3	3,2	12,0	21,0			250
2 x 4	**PKCT 412**	9,0x5,2	4,2	12,0	23,0	grey	6	100
2 x 6	**PKCT 614**	10,0x7,2	5,3	14,0	26,0	black	10	100
2 x 10	**PKCT 1014**	13,0x7,2	7,0	14,0	26,0	ivory	16	100
2 x 16	**PKCT 1616**	18,0x9,5	8,8	16,0	30,0	green	35	100

UNINSULATED END SLEEVES

for flexible copper cables



KE

KE series end sleeves is manufactured from tin plated electrolytic copper.
Designed and developed for use with flexible cables.

Recommended crimping tools are shown on pages 88 to 95, 99, 121-122.

Conductor Size sqmm	Ref.	Dimensions mm Øi	L	C	Quantity Box/Bag
0,5	***KE 506 ST**	1,0	6	2,1	50.000/500
	KE 508 ST	1,0	8	2,1	50.000/500
0,75	***KE 7506 ST**	1,2	6	2,3	50.000/500
	KE 7508 ST	1,2	8	2,3	50.000/500
1	***KE 106 ST**	1,4	6	2,5	25.000/500
	***KE 110 ST**	1,4	10	2,5	25.000/500
1,5	***KE 1508 ST**	1,8	7	2,8	25.000/500
	***KE 1510 ST**	1,8	10	2,8	25.000/500
2,5	***KE 2508 ST**	2,3	7	3,4	25.000/500
	***KE 2510 ST**	2,3	10	3,4	20.000/500
4	***KE 410 ST**	2,8	9	4,0	12.500/500
	***KE 412 ST**	2,8	12	4,0	12.500/500
6	***KE 610 ST**	3,5	10	4,7	10.000/500
	***KE 612 ST**	3,5	12	4,7	7.500/500
	***KE 616 ST**	3,5	15	4,7	5.000/500
10	***KE 1016 ST**	4,5	15	5,8	4.000/250
16	***KE 1616 ST**	5,8	15	7,5	3.000/250
25	**KE 25012 ST**	7,3	12	9,5	2.500/100
	***KE 25018 ST**	7,3	18	9,5	1.500/100
35	**KE 35012 ST**	8,3	12	11,0	1.500/100
	***KE 35018 ST**	8,3	18	11,0	1.000/100

**To DIN standard 46 228/1*

UNINSULATED TERMINALS

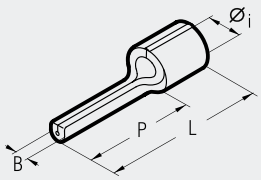
S

S range - brazed seam

S range terminals are manufactured from electrolytic copper strip and tin plated. The seam is brazed to provide uniform mechanical strength.
The terminal barrel is rifled to enhance electrical contact and to improve mechanical strength.

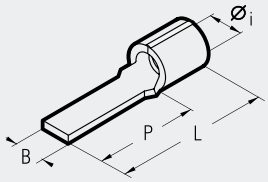
Recommended crimping tools are shown on pages 88 to 95, 121-122.

pin terminals



Conductor Size sqmm (AWG)	Ref.	Dimensions mm				Quantity Box/Bag
		Øi	B	P	L	
0,25÷1,25 (22÷16)	**S 1,5-P 8**	1,8	1,7	8,0	12,0	*8.000/100*
	S 1,5-P 10	1,8	1,8	10,0	14,0	*8.000/100*
	S 1,5-P 12	1,8	1,8	12,0	16,2	*8.000/100*
1,5÷2,5 (16÷14)	**S 2,5-P 8**	2,4	1,7	8,0	12,0	*7.000/100*
	S 2,5-P 10	2,4	1,8	10,0	14,0	*7.000/100*
	S 2,5-P 12	2,4	1,8	12,0	16,0	*7.000/100*
4÷6 (12÷10)	**S 6-P 10**	3,6	2,2	10,0	16,8	*4.000/100*
	S 6-P 12	3,6	2,2	12,0	19,4	*4.000/100*
	S 6-P 14	3,6	2,2	14,0	21,0	*3.500/100*

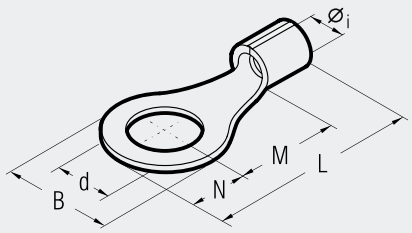
blade terminals



Conductor Size sqmm (AWG)	Ref.	Dimensions mm				Quantity Box/Bag
		Øi	B	P	L	
0,25÷1,25 (22÷16)	**S 1,5-PP 12**	1,8	3,0	12,8	17,0	*8.000/100*
	***S 1,5-PP 12/1**	1,8	3,0	11,3	15,5	*8.000/100*
	S 1,5-PP 12/19	1,8	1,9	13,2	17,4	*8.000/100*
	S 1,5-PP 14	1,8	3,0	14,8	19,0	*8.000/100*
1,5÷2,5 (16÷14)	**S 2,5-PP 12**	2,4	3,5	12,8	17,0	*7.000/100*
	S 2,5-PP 12/25	2,4	2,5	13,3	17,5	*7.000/100*
	S 2,5-PP 16/25	2,4	2,5	17,2	21,4	*7.000/100*
4÷6 (12÷10)	**S 6-PP 12**	3,6	4,0	13,3	19,7	*4.000/100*
	S 6-PP 17	3,6	2,9	19,1	25,5	*4.000/100*

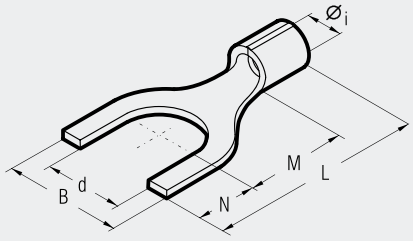
**Available on request*

ring terminals



Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm Øi	B	M	N	L	d	Quantity Box/Bag
0,25÷1,25 (22÷16)	2	*S 1,5-M 2	1,8	5,6	4,5	2,8	11,5	2,2	7.000/100
	3	S 1,5-M 3	1,8	5,6	4,5	2,8	11,5	3,2	7.000/100
	3,5	S 1,5-M 3,5	1,8	5,6	4,5	2,8	11,5	3,7	7.000/100
	3,5	*S 1,5-M 3,5/1	1,8	6,2	7,1	3,1	14,4	3,7	7.000/100
	4	S 1,5-M 4	1,8	7,0	6,5	3,5	14,2	4,3	7.000/100
	4	*S 1,5-M 4/3	1,8	7,8	7,1	3,9	15,2	4,3	7.000/100
	5	S 1,5-M 5	1,8	7,8	7,1	3,9	15,2	5,3	7.000/100
	6	S 1,5-M 6	1,8	9,4	8,1	4,7	17,0	6,4	6.000/100
	6	S 1,5-M 6/1	1,8	12,0	10,3	6,0	20,5	6,4	5.000/100
	7	S 1,5-M 7	1,8	9,4	8,1	4,7	17,0	7,2	6.000/100
	8	S 1,5-M 8	1,8	12,0	10,3	6,0	20,5	8,4	4.000/100
	10	S 1,5-M 10	1,8	15,5	13,0	7,7	25,0	10,5	3.000/100
	12	S 1,5-M 12	1,8	18,0	15,5	9,0	28,7	13,0	2.000/100
1,5÷2,5 (16÷14)	2	*S 2,5-M 2	2,4	5,6	5,0	2,8	12,0	2,2	8.000/100
	3	S 2,5-M 3	2,4	5,6	5,0	2,8	12,0	3,2	6.000/100
	3,5	S 2,5-M 3,5	2,4	5,6	5,0	2,8	12,0	3,7	6.000/100
	3,5	*S 2,5-M 3,5/1	2,4	6,2	6,5	3,1	13,8	3,7	5.000/100
	4	S 2,5-M 4	2,4	8,0	6,5	4,0	14,7	4,3	5.000/100
	5	S 2,5-M 5	2,4	8,0	7,5	4,0	15,7	5,3	5.000/100
	6	S 2,5-M 6	2,4	9,4	8,6	4,7	17,5	6,4	5.000/100
	6	S 2,5-M 6/1	2,4	12,0	10,3	6,0	20,5	6,4	5.000/100
	7	S 2,5-M 7	2,4	10,0	7,8	5,0	17,0	7,2	5.000/100
	8	S 2,5-M 8	2,4	12,0	10,3	6,0	20,5	8,4	4.000/100
	10	S 2,5-M 10	2,4	15,5	13,0	7,7	25,0	10,5	2.500/100
	12	S 2,5-M 12	2,4	18,0	15,5	9,0	28,7	13,0	2.000/100
4÷6 (12÷10)	3	S 6-M 3	3,6	8,0	8,1	4,0	18,5	3,2	3.000/100
	3,5	S 6-M 3,5	3,6	8,0	8,1	4,0	18,5	3,7	3.000/100
	4	S 6-M 4	3,6	9,0	8,1	4,5	19,0	4,3	3.000/100
	5	S 6-M 5	3,6	9,0	8,1	4,5	19,0	5,3	2.500/100
	6	S 6-M 6	3,6	11,0	11,1	5,5	23,0	6,4	2.500/100
	6	*S 6-M 6/1	3,6	11,0	8,1	5,5	20,0	6,4	2.500/100
	7	S 6-M 7	3,6	11,0	11,1	5,5	23,0	7,2	2.500/100
	8	S 6-M 8	3,6	13,6	12,1	6,8	25,3	8,4	2.000/100
	8	*S 6-M 8/1	3,6	11,0	8,1	5,5	20,0	8,4	2.500/100
	10	S 6-M 10	3,6	13,6	12,1	6,8	25,3	10,5	2.000/100
	10	S 6-M 10/1	3,6	15,5	13,8	7,7	28,0	10,5	2.000/100
	12	S 6-M 12	3,6	19,0	15,1	9,5	31,0	13,0	2.000/100
	14	S 6-M 14	3,6	21,0	16,1	10,5	33,0	15,0	1.000/100
	16	S 6-M 16	3,6	24,0	17,1	12,0	35,5	17,0	1.000/100
10 (8)	4	S 10-M 4	4,8	11,5	9,0	5,8	23,8	4,3	2.000/100
	5	S 10-M 5	4,8	11,5	9,0	5,8	23,8	5,3	2.000/100
	6	S 10-M 6	4,8	11,5	9,0	5,8	23,8	6,4	2.000/100
	7	S 10-M 7	4,8	11,5	9,0	5,8	23,8	7,2	1.500/100

fork/spade terminals



Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm Øi	B	M	N	L	d	Quantity Box/Bag
0,25÷1,25 (22÷16)	3	S 1,5-U 3	1,8	5,5	5,5	4,0	13,7	3,2	7.000/100
	3,5	S 1,5-U 3,5	1,8	6,0	6,5	3,8	14,5	3,7	7.000/100
	3,5	*S 1,5-U 3,5/2	1,8	6,4	6,5	3,8	14,5	3,7	7.000/100
	4	S 1,5-U 4	1,8	6,5	7,5	3,7	15,4	4,3	7.000/100
	4	*S 1,5-U 4/1	1,8	8,5	7,5	3,7	15,4	4,3	5.000/100
	4	S 1,5-U 4/2	1,8	7,5	7,5	3,7	15,4	4,3	5.000/100
	5	S 1,5-U 5	1,8	8,5	7,5	3,7	15,4	5,3	5.000/100
	5	*S 1,5-U 5/1	1,8	9,4	7,5	3,7	15,4	5,3	5.000/100
	6	S 1,5-U 6	1,8	9,4	8,1	4,7	17,0	6,4	6.000/100
	6	*S 1,5-U 6/1	1,8	12,0	9,2	7,1	20,5	6,4	6.000/100
	8	S 1,5-U 8	1,8	14,0	10,0	6,3	20,5	8,4	3.000/100
	10	S 1,5-U 10	1,8	17,5	13,0	7,7	25,0	10,5	2.500/100
	12	S 1,5-U 12	1,8	20,0	15,5	9,0	28,7	13,0	2.000/100
1,5÷2,5 (16÷14)	3	S 2,5-U 3	2,4	5,5	5,5	4,0	13,7	3,2	6.000/100
	3,5	S 2,5-U 3,5	2,4	6,4	6,5	3,8	14,5	3,7	6.000/100
	3,5	*S 2,5-U 3,5/1	2,4	7,2	6,5	3,8	14,5	3,7	5.000/100
	4	S 2,5-U 4	2,4	6,5	7,5	3,7	15,4	4,3	5.000/100
	4	*S 2,5-U 4/1	2,4	8,5	7,5	3,7	15,4	4,3	5.000/100
	4	*S 2,5-U 4/2	2,4	7,5	7,5	3,7	15,4	4,3	5.000/100
	5	S 2,5-U 5	2,4	8,5	7,5	3,7	15,4	5,3	5.000/100
	6	S 2,5-U 6	2,4	9,4	8,1	4,7	17,0	6,4	5.000/100
	6	*S 2,5-U 6/1	2,4	12,0	9,2	7,1	20,5	6,4	4.000/100
	8	S 2,5-U 8	2,4	14,0	10,0	6,3	20,5	8,4	2.500/100
	10	S 2,5-U 10	2,4	17,5	13,0	7,7	25,0	10,5	2.000/100
	12	S 2,5-U 12	2,4	20,0	15,5	9,0	28,7	13,0	2.000/100
4÷6 (12÷10)	3,5	S 6-U 3,5	3,6	7,5	8,5	3,9	18,8	3,7	3.000/100
	4	S 6-U 4	3,6	7,5	8,0	4,4	18,8	4,3	3.000/100
	5	S 6-U 5	3,6	9,5	8,0	4,4	18,8	5,3	2.500/100
	6	S 6-U 6	3,6	10,0	11,0	5,5	22,9	6,4	2.500/100
	8	S 6-U 8	3,6	13,5	12,0	8,0	26,4	8,4	2.000/100
	10	S 6-U 10	3,6	15,5	13,0	8,0	27,4	10,5	2.000/100
	10	*S 6-U 10/1	3,6	17,5	13,8	7,7	28,0	10,5	2.000/100
	12	S 6-U 12	3,6	21,0	15,1	9,5	31,0	13,0	1.000/100
	14	*S 6-U 14	3,6	23,0	16,1	10,5	33,0	15,0	1.000/100
	16	*S 6-U 16	3,6	26,0	17,1	11,5	35,0	17,0	1.000/100

*Available on request

UNINSULATED TERMINALS

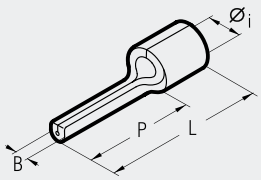
RN BN GN

RN, BN, GN range - unbrazed

RN, BN. GN range terminals are manufactured from electrolytic copper strip and tin plated.
The seam is unbrazed.
The terminal barrel is rifled to enhance electrical contact and to improve mechanical strength.

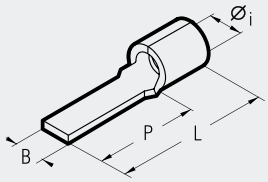
Recommended crimping tools are shown on pages 88 to 95, 121-122.

pin terminals



Conductor Size sqmm (AWG)	Ref.	Dimensions mm Øi	B	P	L	Quantity Box/Bag
0,25÷1,5 (22÷16)	**RN-P 8**	1,8	1,7	8,0	12,0	*8.000/100*
	RN-P 10	1,8	1,8	10,0	14,0	*8.000/100*
	RN-P 12	1,8	1,8	12,0	16,2	*8.000/100*
1,5÷2,5 (16÷14)	**BN-P 8**	2,4	1,7	8,0	12,0	*7.000/100*
	BN-P 10	2,4	1,8	10,0	14,0	*7.000/100*
	BN-P 12	2,4	1,8	12,0	16,0	*7.000/100*
4÷6 (12÷10)	**GN-P 10**	3,6	2,2	10,0	16,8	*4.000/100*
	GN-P 12	3,6	2,2	12,0	19,0	*4.000/100*
	GN-P 14	3,6	2,2	14,0	21,0	*3.500/100*

blade terminals



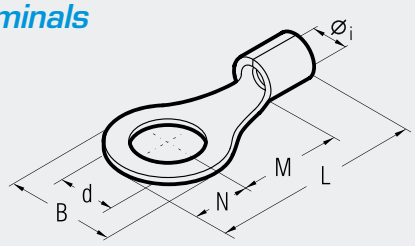
Conductor Size sqmm (AWG)	Ref.	Dimensions mm Øi	B	P	L	Quantity Box/Bag
0,25÷1,5 (22÷16)	**RN-PP 12**	1,8	3,0	12,8	17,0	*8.000/100*
	RN-PP 12/1	1,8	3,0	11,3	15,5	*8.000/100*
	RN-PP 12/19	1,8	1,9	13,2	17,4	*8.000/100*
	RN-PP 12/23	1,8	2,3	13,2	17,4	*8.000/100*
	RN-PP 14	1,8	3,0	14,8	19,0	*8.000/100*
	RN-PP 16/23	1,8	2,3	17,2	21,4	*8.000/100*
1,5÷2,5 (16÷14)	**BN-PP 12**	2,4	3,5	12,8	17,0	*7.000/100*
	BN-PP 12/25	2,4	2,5	13,3	17,5	*7.000/100*
	BN-PP 16/25	2,4	2,5	17,2	21,4	*7.000/100*
4÷6 (12÷10)	**GN-PP 12**	3,6	4,0	13,3	19,7	*4.000/100*
	GN-PP 17	3,6	2,9	19,1	25,5	*4.000/100*

UNINSULATED TERMINALS

RN, BN, GN range - unbrazed

RN
BN
GN

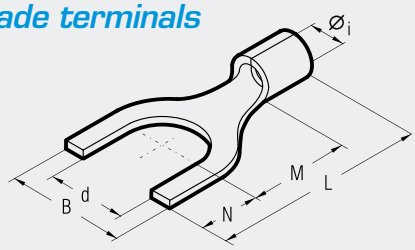
ring terminals



Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm						Quantity Box/Bag
			Øi	B	M	N	L	d	
0,25÷1,5 (22÷16)	2	*RN-M 2	1,8	5,6	4,5	2,8	11,5	2,2	7.000/100
	3	RN-M 3	1,8	5,6	4,5	2,8	11,5	3,2	7.000/100
	3,5	RN-M 3,5	1,8	5,6	4,5	2,8	11,5	3,7	7.000/100
	3,5	RN-M 3,5/1	1,8	6,2	7,1	3,1	14,4	3,7	7.000/100
	4	RN-M 4	1,8	7,0	6,5	3,5	14,2	4,3	7.000/100
	4	RN-M 4/3	1,8	7,8	7,1	3,9	15,2	4,3	7.000/100
	5	RN-M 5	1,8	7,8	7,1	3,9	15,2	5,3	7.000/100
	6	RN-M 6	1,8	9,4	8,1	4,7	17,0	6,4	6.000/100
	6	RN-M 6/1	1,8	12,0	10,3	6,0	20,5	6,4	6.000/100
	7	RN-M 7	1,8	9,4	8,1	4,7	17,0	7,2	6.000/100
	8	RN-M 8	1,8	12,0	10,3	6,0	20,5	8,4	4.000/100
	10	RN-M 10	1,8	15,5	13,0	7,7	25,0	10,5	3.000/100
	12	RN-M 12	1,8	18,0	15,5	9,0	28,7	13,0	2.000/100
1,5÷2,5 (16÷14)	2	*BN-M 2	2,4	5,6	5,0	2,8	12,0	2,2	6.000/100
	3	BN-M 3	2,4	5,6	5,0	2,8	12,0	3,2	6.000/100
	3,5	BN-M 3,5	2,4	5,6	5,0	2,8	12,0	3,7	6.000/100
	3,5	BN-M 3,5/1	2,4	6,2	6,5	3,1	13,8	3,7	5.000/100
	4	BN-M 4	2,4	8,0	6,5	4,0	14,7	4,3	5.000/100
	5	BN-M 5	2,4	8,0	7,5	4,0	15,7	5,3	5.000/100
	6	BN-M 6	2,4	9,4	8,6	4,7	17,5	6,4	5.000/100
	6	BN-M 6/1	2,4	12,0	10,3	6,0	20,5	6,4	5.000/100
	7	BN-M 7	2,4	10,0	7,8	5,0	17,0	7,2	5.000/100
	8	BN-M 8	2,4	12,0	10,3	6,0	20,5	8,4	4.000/100
	10	BN-M 10	2,4	15,5	13,0	7,7	25,0	10,5	2.500/100
	12	BN-M 12	2,4	18,0	15,5	9,0	28,7	13,0	2.000/100
4÷6 (12÷10)	3	GN-M 3	3,6	8,0	8,1	4,0	18,5	3,2	3.000/100
	3,5	GN-M 3,5	3,6	8,0	8,1	4,0	18,5	3,7	3.000/100
	4	GN-M 4	3,6	9,0	8,1	4,5	19,0	4,3	3.000/100
	5	GN-M 5	3,6	9,0	8,1	4,5	19,0	5,3	2.500/100
	6	GN-M 6	3,6	11,0	11,1	5,5	23,0	6,4	2.500/100
	6	GN-M 6/1	3,6	11,0	8,1	5,5	20,0	6,4	2.500/100
	7	GN-M 7	3,6	11,0	11,1	5,5	23,0	7,2	2.500/100
	8	GN-M 8	3,6	13,6	12,1	6,8	25,3	8,4	2.000/100
	8	*GN-M 8/1	3,6	11,0	8,1	5,5	20,0	8,4	2.500/100
	10	GN-M 10	3,6	13,6	12,1	6,8	25,3	10,5	2.000/100
	10	GN-M 10/1	3,6	15,5	13,8	7,7	28,0	10,5	2.000/100
	12	GN-M 12	3,6	19,0	15,1	9,5	31,0	13,0	2.000/100
	14	GN-M 14	3,6	21,0	16,1	10,5	33,0	15,0	1.000/100
	16	GN-M 16	3,6	24,0	17,1	12,0	35,5	17,0	1.000/100

**Available on request*

fork/spade terminals

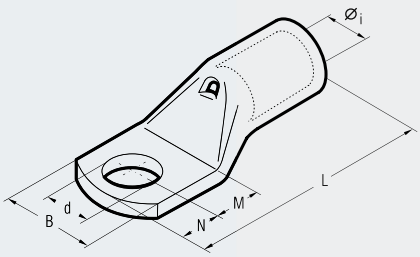


Cond. Size sqmm (AWG)	Ø Stud mm	Ref.	Dimensions mm						Quantity Box/Bag
			Øi	B	M	N	L	d	
0,25÷1,5 (22÷16)	3	RN-U 3	1,8	5,5	5,5	4,0	13,7	3,2	7.000/100
	3,5	RN-U 3,5	1,8	6,0	6,5	3,8	14,5	3,7	7.000/100
	3,5	RN-U 3,5/2	1,8	6,4	6,5	3,8	14,5	3,7	7.000/100
	4	RN-U 4	1,8	6,5	7,5	3,7	15,4	4,3	7.000/100
	4	RN-U 4/1	1,8	8,5	7,5	3,7	15,4	4,3	5.000/100
	4	RN-U 4/2	1,8	7,5	7,5	3,7	15,4	4,3	5.000/100
	5	RN-U 5	1,8	8,5	7,5	3,7	15,4	5,3	5.000/100
	5	*RN-U 5/1	1,8	9,4	7,5	3,7	15,4	5,3	5.000/100
	6	RN-U 6	1,8	9,4	8,1	4,7	17,0	6,4	6.000/100
	6	RN-U 6/1	1,8	12,0	9,2	7,1	20,5	6,4	6.000/100
	8	RN-U 8	1,8	14,0	10,0	6,3	20,5	8,4	5.000/100
	10	RN-U 10	1,8	17,5	13,0	7,7	25,0	10,5	3.000/100
	12	RN-U 12	1,8	20,0	15,5	9,0	28,7	13,0	2.000/100
1,5÷2,5 (16÷14)	3	BN-U 3	2,4	5,5	5,5	4,0	13,7	3,2	6.000/100
	3,5	BN-U 3,5	2,4	6,4	6,5	3,8	14,5	3,7	6.000/100
	3,5	*BN-U 3,5/1	2,4	7,2	6,5	3,8	14,5	3,7	5.000/100
	4	BN-U 4	2,4	6,5	7,5	3,7	15,4	4,3	5.000/100
	4	BN-U 4/1	2,4	8,5	7,5	3,7	15,4	4,3	5.000/100
	4	BN-U 4/2	2,4	7,5	7,5	3,7	15,4	4,3	5.000/100
	5	BN-U 5	2,4	8,5	7,5	3,7	15,4	5,3	5.000/100
	6	BN-U 6	2,4	9,4	8,1	4,7	17,0	6,4	5.000/100
	6	BN-U 6/1	2,4	12,0	9,2	7,1	20,5	6,4	4.000/100
	8	BN-U 8	2,4	14,0	10,0	6,3	20,5	8,4	4.000/100
	10	BN-U 10	2,4	17,5	13,0	7,7	25,0	10,5	2.500/100
	12	BN-U 12	2,4	20,0	15,5	9,0	28,7	13,0	2.000/100
4÷6 (12÷10)	3,5	GN-U 3,5	3,6	7,5	8,5	3,9	18,8	3,7	3.000/100
	4	GN-U 4	3,6	7,5	8,0	4,4	18,8	4,3	3.000/100
	5	GN-U 5	3,6	9,5	8,0	4,4	18,8	5,3	2.500/100
	6	GN-U 6	3,6	10,0	11,0	5,5	22,9	6,4	2.500/100
	8	GN-U 8	3,6	13,5	12,0	8,0	26,4	8,4	2.000/100
	10	GN-U 10	3,6	15,5	13,0	8,0	27,4	10,5	2.000/100
	10	GN-U 10/1	3,6	17,5	13,8	7,7	28,0	10,5	2.000/100
	12	GN-U 12	3,6	21,0	15,1	9,5	31,0	13,0	1.000/100
	14	GN-U 14	3,6	23,0	16,1	10,5	33,0	15,0	1.000/100
	16	GN-U 16	3,6	26,0	17,1	11,5	35,0	17,0	1.000/100

COPPER TUBE CRIMPING LUGS

A-M

for copper conductors

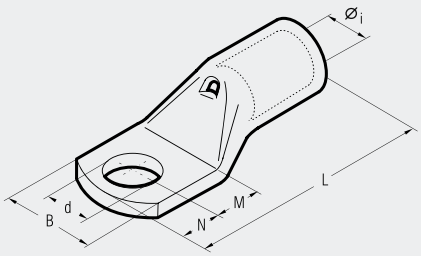


A-M series lugs are manufactured from electrolytic copper tube.
The dimensions of the tube are designed to obtain the most efficient electrical conductivity and mechanical strength to resist vibration and pull out.
Cembre lugs are annealed to guarantee optimum ductility which is an absolute necessity for connectors which will have to withstand the severe deformation arising when compressed and any bending of the palm during installation.
In applications subject to vibration, terminals still have to perform a reliable connection, annealing plays a vital role in avoiding cracking or breaks between the barrel and palm.
The presence of an inspection hole facilitates full insertion of the conductor, whilst the barrel length has been designed to allow easy and accurate positioning of the dies during the crimping operation.
Lugs are electrolytically tinplated to avoid oxidation.
A-M series lugs form an important part of Cembre crimping systems for power carrying conductors, details of the appropriate crimping tools and dies are shown opposite and in detail on pages 142 to 146, whilst our technicians are always available to provide any technical advice which may be required.
The enclosed table is only indicative of the range and many variations in stud fixing and palm lengths are also available.

Cond. Size sqmm (low stranded / flexible*)	Ø Stud mm	Ref.	Dimensions mm Øi	B	M	N	L	d	Quantity Box/Bag	Mechanical Tools: HN 1	HN 5	TN 70 SE	TN 120 SE	Hydraulic Tools: B 15	HT 45-E	HT 51	RH 50	B 51	B 55	HT 81-U	RHU 81	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D	RHU 52D
0,25÷1,5	3	A 03-M 3	1,8	6,0	4,5	3,5	16,0	3,2	5.000/100	●				●										
	3,5	A 03-M 3,5	1,8	6,5	4,5	3,5	16,0	3,7	5.000/100	●				●										
	4	A 03-M 4	1,8	6,5	5,0	4,0	17,0	4,3	5.000/100	●				●										
	5	A 03-M 5	1,8	7,5	5,5	4,5	18,0	5,3	5.000/100	●				●										
	6	A 03-M 6	1,8	9,0	6,0	5,0	19,0	6,4	5.000/100	●				●										
1,5÷2,5	3	A 06-M 3	2,4	6,0	4,5	3,5	17,0	3,2	4.000/100	●				●										
	3,5	A 06-M 3,5	2,4	6,5	4,5	3,5	17,0	3,7	4.000/100	●				●										
	4	A 06-M 4	2,4	7,5	5,0	4,0	18,0	4,3	4.000/100	●				●										
	5	A 06-M 5	2,4	8,5	5,5	4,5	19,0	5,3	4.000/100	●				●										
	6	A 06-M 6	2,4	9,0	6,0	5,0	20,0	6,4	4.000/100	●				●										
	8	A 06-M 8	2,4	12,0	9,0	8,0	26,0	8,4	2.500/100	●				●										
4÷6	3	A 1-M 3	3,6	7,5	4,5	3,5	20,5	3,2	2.000/100	●		●	●	●	●	●	●	●	●					
	3,5	A 1-M 3,5	3,6	7,5	4,5	3,5	20,5	3,7	2.000/100	●		●	●	●	●	●	●	●	●					
	4	A 1-M 4	3,6	8,0	5,0	4,0	21,5	4,3	2.000/100	●		●	●	●	●	●	●	●	●					
	5	A 1-M 5	3,6	9,0	6,5	6,0	25,0	5,3	2.000/100	●		●	●	●	●	●	●	●	●					
	6	A 1-M 6	3,6	11,0	7,0	6,0	25,5	6,4	2.000/100	●		●	●	●	●	●	●	●	●					
	8	A 1-M 8	3,6	14,0	9,0	8,0	29,5	8,4	1.500/100	●		●	●	●	●	●	●	●	●					
	10	A 1-M 10	3,6	16,5	11,0	10,0	33,5	10,5	1.000/100	●		●	●	●	●	●	●	●	●					
10	4	A 2-M 4	4,6	10,0	5,0	4,0	22,5	4,3	1.500/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	5	A 2-M 5	4,6	10,0	6,5	6,0	26,0	5,3	1.500/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	6	A 2-M 6	4,6	11,0	7,0	6,0	26,5	6,4	1.500/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	8	A 2-M 8	4,6	15,0	9,0	8,0	30,5	8,4	1.000/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	10	A 2-M 10	4,6	18,0	11,0	10,0	34,5	10,5	1.000/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	12	A 2-M 12	4,6	19,0	14,0	12,0	39,5	13,2	500/100		●	●	●		●	●	●	●	●	●	●	●	●	●
16	4	A 3-M 4	5,8	11,5	5,0	4,0	25,5	4,3	1.000/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	5	A 3-M 5	5,8	11,5	6,5	6,0	29,0	5,3	1.000/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	6	A 3-M 6	5,8	11,5	7,0	6,0	29,5	6,4	1.000/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	8	A 3-M 8	5,8	15,0	9,0	8,0	33,5	8,4	500/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	10	A 3-M 10	5,8	18,0	11,0	10,0	37,5	10,5	500/100		●	●	●		●	●	●	●	●	●	●	●	●	●
	12	A 3-M 12	5,8	20,0	14,0	12,0	42,5	13,2	500/100		●	●	●		●	●	●	●	●	●	●	●	●	●
25	4	A 5-M 4	7,0	14,0	5,0	4,0	28,0	4,3	1.000/100			●	●		●	●	●	●	●	●	●	●	●	●
	5	A 5-M 5	7,0	14,0	6,5	6,0	31,5	5,3	500/100			●	●		●	●	●	●	●	●	●	●	●	●
	6	A 5-M 6	7,0	14,0	7,0	6,0	32,0	6,4	500/100			●	●		●	●	●	●	●	●	●	●	●	●
	8	A 5-M 8	7,0	15,0	9,0	8,0	36,0	8,4	500/100			●	●		●	●	●	●	●	●	●	●	●	●
	10	A 5-M 10	7,0	18,0	11,0	10,0	40,0	10,5	500/100			●	●		●	●	●	●	●	●	●	●	●	●
	12	A 5-M 12	7,0	21,0	14,0	12,0	45,0	13,2	500/100			●	●		●	●	●	●	●	●	●	●	●	●
35 (25 35)	5	A 7-M 5	8,9	17,0	6,5	6,0	34,0	5,3	500/100			●	●		●	●	●	●	●	●	●	●	●	●
	6	A 7-M 6	8,9	17,0	7,0	6,0	34,5	6,4	500/100			●	●		●	●	●	●	●	●	●	●	●	●
	8	A 7-M 8	8,9	17,0	9,0	8,0	38,5	8,4	400/100			●	●		●	●	●	●	●	●	●	●	●	●
	10	A 7-M 10	8,9	19,0	11,0	10,0	42,5	10,5	400/100			●	●		●	●	●	●	●	●	●	●	●	●
	12	A 7-M 12	8,9	21,0	14,0	12,0	47,5	13,2	300/50			●	●		●	●	●	●	●	●	●	●	●	●
50 (35 50)	6	A 10-M 6	10,0	19,0	8,0	7,0	40,5	6,4	200/50			●	●		●	●	●	●	●	●	●	●	●	●
	8	A 10-M 8	10,0	19,0	9,0	8,0	42,5	8,4	200/50			●	●		●	●	●	●	●	●	●	●	●	●
	10	A 10-M 10	10,0	20,0	11,0	10,0	46,5	10,5	200/50			●	●		●	●	●	●	●	●	●	●	●	●
	12	A 10-M 12	10,0	21,0	14,0	12,0	51,5	13,2	200/50			●	●		●	●	●	●	●	●	●	●	●	●
	14	A 10-M 14	10,0	25,0	16,0	14,0	55,5	15,0	200/50			●	●		●	●	●	●	●	●	●	●	●	●
	16	A 10-M 16	10,0	26,0	18,0	16,0	59,5	17,0	200/50			●	●		●	●	●	●	●	●	●	●	●	●
70 (50 70)	6	A 14-M 6	11,3	21,0	8,0	7,0	44,0	6,4	200/50			●	●		●	●	●	●	●	●	●	●	●	●
	8	A 14-M 8	11,3	21,0	9,0	8,0	46,0	8,4	200/50			●	●		●	●	●	●	●	●	●	●	●	●
	10	A 14-M 10	11,3	21,0	11,0	10,0	50,0	10,5	200/50			●	●		●	●	●	●	●	●	●	●	●	●
	12	A 14-M 12	11,3	22,0	14,0	12,0	55,0	13,2	150/50			●	●		●	●	●	●	●	●	●	●	●	●
	14	A 14-M 14	11,3	25,0	16,0	14,0	59,0	15,0	100/50			●	●		●	●	●	●	●	●	●	●	●	●
	16	A 14-M 16	11,3	26,0	18,0	16,0	63,0	17,0	100/50			●	●		●	●	●	●	●	●	●	●	●	●

COPPER TUBE CRIMPING LUGS

for copper conductors

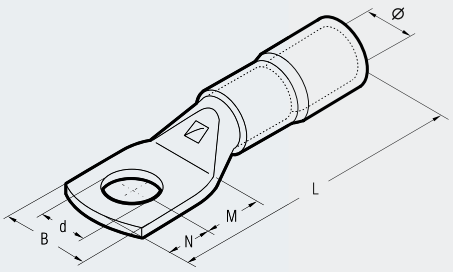


Cond. Size sqmm low stranded	Cond. Size sqmm flexible*	Ø Stud mm	Ref.	Dimensions mm Øi	B	M	N	L	d	Quantity Box/Bag	Mechanical Tools	Hydraulic Tools
95	70 95	6	A 19-M 6	13,5	25,0	8,0	7,0	50,5	6,4	100/25	TN 120 SE	HT 45-E HT 51 RH 50 B 51 B 55 HT 81-U RHU 81 HT 120 and tools and heads with 130 kN crimping force ECW-H3D RHU 520
		8	A 19-M 8	13,5	25,0	9,0	8,0	52,5	8,4	100/25		
		10	A 19-M 10	13,5	25,0	11,0	10,0	56,5	10,5	100/25		
		12	A 19-M 12	13,5	25,0	14,0	12,0	61,5	13,2	100/25		
		14	A 19-M 14	13,5	25,0	16,0	14,0	65,5	15,0	100/25		
		16	A 19-M 16	13,5	27,0	18,0	16,0	69,5	17,0	100/25		
		20	A 19-M 20	13,5	29,5	22,0	20,0	77,5	21,0	50/25		
120	95 120	8	A 24-M 8	15,2	28,5	9,0	8,0	54,0	8,4	100/25		
		10	A 24-M 10	15,2	28,5	11,0	10,0	58,0	10,5	100/25		
		12	A 24-M 12	15,2	28,5	14,0	12,0	63,0	13,2	100/25		
		14	A 24-M 14	15,2	28,5	16,0	14,0	67,0	15,0	50/25		
		16	A 24-M 16	15,2	28,5	18,0	16,0	71,0	17,0	50/25		
		20	A 24-M 20	15,2	30,0	22,0	20,0	79,0	21,0	50/25		
150	120 150	8	A 30-M 8	16,7	31,5	13,0	11,0	69,0	8,4	50/25		
		10	A 30-M 10	16,7	31,5	13,0	11,0	69,0	10,5	50/25		
		12	A 30-M 12	16,7	31,5	16,0	14,0	75,0	13,2	50/25		
		14	A 30-M 14	16,7	31,5	18,0	16,0	79,0	15,0	50/25		
		16	A 30-M 16	16,7	31,5	19,0	17,0	81,0	17,0	50/25		
		20	A 30-M 20	16,7	31,5	22,0	20,0	87,0	21,0	50/25		
185	150 185	8	A 37-M 8	19,2	35,5	13,0	11,0	76,0	8,4	50/25		
		10	A 37-M 10	19,2	35,5	13,0	11,0	76,0	10,5	40/20		
		12	A 37-M 12	19,2	35,5	16,0	14,0	82,0	13,2	40/20		
		14	A 37-M 14	19,2	35,5	18,0	16,0	86,0	15,0	30/15		
		16	A 37-M 16	19,2	35,5	19,0	17,0	88,0	17,0	30/15		
		20	A 37-M 20	19,2	35,5	22,0	20,0	94,0	21,0	30/15		
240	185 240	8	A 48-M 8	21,1	39,0	13,0	11,0	82,0	8,4	30/15		
		10	A 48-M 10	21,1	39,0	13,0	11,0	82,0	10,5	30/15		
		12	A 48-M 12	21,1	39,0	16,0	14,0	88,0	13,2	30/15		
		14	A 48-M 14	21,1	39,0	18,0	16,0	92,0	15,0	30/15		
		16	A 48-M 16	21,1	39,0	19,0	17,0	94,0	17,0	30/15		
		20	A 48-M 20	21,1	39,0	22,0	20,0	100,0	21,0	30/15		
300	240	10	A 60-M 10	23,7	44,0	20,0	11,0	96,0	10,5	20/10		
		12	A 60-M 12	23,7	44,0	20,0	14,0	99,0	13,2	20/10		
		14	A 60-M 14	23,7	44,0	22,0	16,0	103,0	15,0	20/10		
		16	A 60-M 16	23,7	44,0	22,0	19,0	106,0	17,0	20/10		
		20	A 60-M 20	23,7	44,0	24,0	23,0	112,0	21,0	20/10		
400	300	12	A 80-M 12	27,0	51,0	22,0	19,0	113,0	13,2	15/5		
		14	A 80-M 14	27,0	51,0	22,0	19,0	113,0	15,0	20/5		
		16	A 80-M 16	27,0	51,0	22,0	19,0	113,0	17,0	20/5		
		20	A 80-M 20	27,0	51,0	24,0	23,0	119,0	21,0	20/5		
500	400	16	A 100-M 16	30,3	56,5	22,0	19,0	117,0	17,0	15/5		
		20	A 100-M 20	30,3	56,5	24,0	23,0	123,0	21,0	15/5		
630	500	16	A 120-M 16	33,4	61,6	22,0	19,0	128,0	17,0	12/6		
		20	A 120-M 20	33,4	61,6	24,0	23,0	134,0	21,0	10/5		
800	630	16	A 160-M 16	38,0	72,0	24,0	19,0	141,0	17,0	6/3		
		20	A 160-M 20	38,0	72,0	24,0	23,0	145,0	21,0	6/3		
1000	800	16	A 200-M 16	44,0	80,0	24,0	19,0	158,0	17,0	6/2		
		20	A 200-M 20	44,0	80,0	24,0	23,0	162,0	21,0	6/2		

**Actual conductor section may require a larger lug eg for 120mm² size use A30-... lug.*

NYLON INSULATED COPPER TUBE LUGS

ANE-M

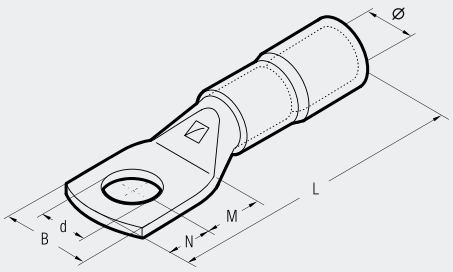


ANE-M series terminals are manufactured from electrolytic copper tube annealed and tin plated.
The interior of the Nylon insulation sleeve is funnel shaped so as to ensure complete and easy introduction of the conductor strands.
The Nylon insulated sleeve eliminates the need to insulate the terminal by either taping or using heat shrinkable tubes.
Furthermore the Nylon sleeve avoids the possibility of conductor breakage at the barrel entrance.
The items tabulated all feature black insulated sleeves, other coloured sleeves are available against specific request.
In order to achieve the best electrical and mechanical performance it is suggested that they are crimped using dies and tools specifically developed for this purpose by Cembre.

Conductor Size Flexible sqmm	Ø Stud mm	Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity Box/Bag	Mechanical Tools HNN 3	HNN 4	TNN 70	TNN 120	Hydraulic Tools B 15	B 51	RH 50	HT 51	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D
10	4	**ANE 2-M 4**	8,0	10,0	5,0	4,0	34,1	4,3	500/100										
	5	**ANE 2-M 5**	8,0	10,0	6,5	6,0	37,6	5,3	500/100										
	6	**ANE 2-M 6**	8,0	11,0	7,0	6,0	38,1	6,4	500/100										
	8	**ANE 2-M 8**	8,0	15,0	9,0	8,0	42,1	8,4	500/100										
	10	**ANE 2-M 10**	8,0	18,0	11,0	10,0	46,1	10,5	500/100										
	12	**ANE 2-M 12**	8,0	19,0	14,0	12,0	51,1	13,2	500/100										
16	4	**ANE 3-M 4**	9,2	11,5	5,0	4,0	38,6	4,3	500/100										
	5	**ANE 3-M 5**	9,2	11,5	6,5	6,0	42,1	5,3	500/100										
	6	**ANE 3-M 6**	9,2	11,5	7,0	6,0	42,6	6,4	500/100										
	8	**ANE 3-M 8**	9,2	15,0	9,0	8,0	46,6	8,4	500/100										
	10	**ANE 3-M 10**	9,2	18,0	11,0	10,0	50,6	10,5	400/100										
	12	**ANE 3-M 12**	9,2	20,0	14,0	12,0	55,6	13,2	300/100										
25	4	**ANE 5-M 4**	11,1	14,0	5,0	4,0	41,0	4,3	300/100										
	5	**ANE 5-M 5**	11,1	14,0	6,5	6,0	44,5	5,3	300/100										
	6	**ANE 5-M 6**	11,1	14,0	7,0	6,0	45,0	6,4	300/100										
	8	**ANE 5-M 8**	11,1	15,0	9,0	8,0	49,0	8,4	300/100										
	10	**ANE 5-M 10**	11,1	18,0	11,0	10,0	53,0	10,5	300/100										
	12	**ANE 5-M 12**	11,1	21,0	14,0	12,0	58,0	13,2	250/50										
35	6	**ANE 7-M 6**	13,6	17,0	7,0	6,0	50,0	6,4	200/100										
	8	**ANE 7-M 8**	13,6	17,0	9,0	8,0	54,0	8,4	200/100										
	10	**ANE 7-M 10**	13,6	19,0	11,0	10,0	58,0	10,5	200/100										
	12	**ANE 7-M 12**	13,6	21,0	14,0	12,0	63,0	13,2	200/100										
50	6	**ANE 10-M 6**	13,8	19,0	8,0	7,0	55,0	6,4	200/50										
	8	**ANE 10-M 8**	13,8	19,0	9,0	8,0	57,0	8,4	200/50										
	10	**ANE 10-M 10**	13,8	20,0	11,0	10,0	61,0	10,5	150/50										
	12	**ANE 10-M 12**	13,8	21,0	14,0	12,0	66,0	13,2	150/50										
70	6	**ANE 14-M 6**	15,8	21,0	8,0	7,0	61,0	6,4	100/25										
	8	**ANE 14-M 8**	15,8	21,0	9,0	8,0	63,0	8,0	100/25										
	10	**ANE 14-M 10**	15,8	21,0	11,0	10,0	67,0	10,5	100/25										
	12	**ANE 14-M 12**	15,8	22,0	14,0	12,0	72,0	13,2	100/25										
	14	**ANE 14-M 14**	15,8	25,0	16,0	14,0	76,0	15,0	100/25										

NYLON INSULATED COPPER TUBE LUGS

ANE-M

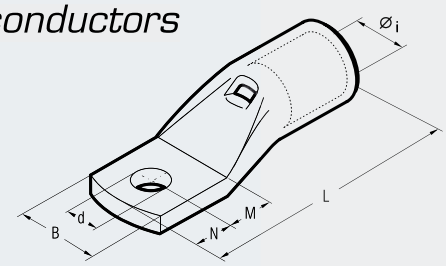


Conductor Size Flexible sqmm	Ø Stud mm	Ref.	Dimensions mm						Quantity Box/Bag	Mechanical Tools	Hydraulic Tools		
			Ø	B	M	N	L	d					
95	8	**ANE 19-M 8**	18,0	25,0	9,0	8,0	73,0	8,4	50/25	TNN 120	HT 51 RH 50 B 51 B 55	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D
	10	**ANE 19-M 10**	18,0	25,0	11,0	10,0	77,0	10,5	50/25				
	12	**ANE 19-M 12**	18,0	25,0	14,0	12,0	82,0	13,2	50/25				
	14	**ANE 19-M 14**	18,0	25,0	16,0	14,0	86,0	15,0	50/25				
	16	**ANE 19-M 16**	18,0	27,0	18,0	16,0	80,0	17,0	50/25				
120	10	**ANE 24-M 10**	20,0	28,5	11,0	10,0	77,7	10,5	50/25				
	12	**ANE 24-M 12**	20,0	28,5	14,0	12,0	86,5	13,2	50/25				
	14	**ANE 24-M 14**	20,0	28,5	16,0	14,0	88,5	15,0	50/25				
	16	**ANE 24-M 16**	20,0	28,5	18,0	16,0	90,5	17,0	50/25				
150	12	**ANE 30-M 12**	23,0	31,5	16,0	14,0	101,0	13,2	30/15				
	14	**ANE 30-M 14**	23,0	31,5	18,0	16,0	105,0	15,0	30/15				
	16	**ANE 30-M 16**	23,0	31,5	19,0	17,0	107,0	17,0	30/15				
	20	**ANE 30-M 20**	23,0	31,5	22,0	20,0	113,0	21,0	30/15				

RING TONGUE TERMINALS WITH CONTAINED PALM

A-M

for L.V. circuit breakers
for copper conductors

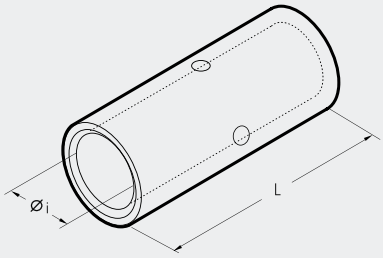


This range of lugs features contained palm width.
Our lugs have been specifically developed for application on L.V. circuit breakers with reduced space terminal blocks. In fact the contained palm width allows an immediate and easier installation. Our lugs are manufactured from electrolytic copper tube.
The specifically designed section of the barrel and the choice of principal dimensions are optimising the best combination of mechanical strength and electrical conductivity.
Our lugs are annealed to guarantee optimum ductility and are electrolytically tin-plated to avoid oxidation.
The barrel is provided with an internal taper to ease the introduction of the conductor; furthermore, its length grants a comfortable and correct positioning between dies, during crimping operations.
Each lug palm is marked with the Cembre logo and part number.

Conductor Size Flexible sqmm	Ø Stud mm	Ref.	Dimensions mm Øi	B	M	N	L	d	Quantity Box/Bag	Mechanical Tools: TN 70 SE	TN 120 SE	Hydraulic Tools: B 15	HT 45-E	HT 51	RH 50	B 51	B 55	HT 81-U	RHU 81	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D
10	5	**A 2-M 5/9**	4,6	9,0	6,5	6,0	26,0	5,3	*1000/100*												
16	5	**A 3-M 5/9**	5,8	9,0	6,5	6,0	29,0	5,3	*1000/100*												
25	5	**A 5-M 5/9**	7,0	9,0	6,5	6,0	31,5	5,3	*500/100*												
35	6	**A 7 B-M 6/11,5**	8,9	11,5	8,0	7,0	36,5	6,4	*400/100*												
50	6	**A 10 B-M 6/11,5**	10,0	11,5	8,0	7,0	40,5	6,4	*200/50*												
70	6	**A 14 B-M 6/11,5**	11,3	11,5	8,0	7,0	44,0	6,4	*200/50*												
95	8	**A 19 B-M 8/15,5**	13,5	15,5	9,0	8,0	52,5	8,4	*100/25*												
120	8	**A 24 B-M 8/19**	15,2	19,0	14,0	9,0	60,0	8,4	*100/25*												
	10	**A 24 B-M 10/19**	15,2	19,0	14,0	9,0	60,0	10,5	*100/25*												
150	8	**A 30 B-M 8/19**	16,7	19,0	18,0	9,0	70,0	8,4	*50/25*												
	10	**A 30 B-M 10/19**	16,7	19,0	18,0	9,0	70,0	10,5	*50/25*												
185	10	**A 37 B-M 10/24,5**	19,2	24,5	18,0	9,0	77,0	10,5	*50/25*												
240	10	**A 48-M 10/31**	21,1	31,0	13,0	9,0	80,0	10,5	*30/15*												
	12	**A 48-M 12/31**	21,1	31,0	16,0	12,0	86,0	13,2	*30/15*												
	16	**A 48-M 16/31**	21,1	31,0	19,0	17,0	94,0	17,0	*30/15*												
300	12	**A 60 B-M 12/31**	23,7	31,0	16,0	12,0	95,0	13,2	*20/10*												

THROUGH CONNECTORS

L-M

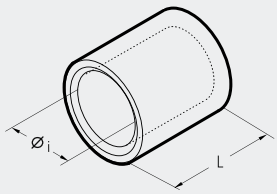


Conductor Size sqmm low stranded	Conductor Size sqmm Flexible	Ref.	Dimensions mm Øi	Dimensions mm L	Quantity Box/Bag	Mechanical Tools: HN 1	Mechanical Tools: HN 5	Mechanical Tools: TN 70 SE	Mechanical Tools: TN 120 SE	Hydraulic Tools: B 15	Hydraulic Tools: HT 45-E RH 50 B 51 B 55 HT 51	Hydraulic Tools: HT 81-U RHU 81 HT 81	Hydraulic Tools: HT 120 and tools and heads with 130 kN crimping force	Hydraulic Tools: ECW-H3D	Hydraulic Tools: RHU 520
0,25÷1,5	0,25÷1,5	**L 03-M**	1,8	15	*6.000/100*	●				●	●				
1,5÷2,5	1,5÷2,5	**L 06-M**	2,4	15	*4.000/100*	●				●	●				
4÷6	4÷6	**L 1-M**	3,6	22	*2.000/100*	●		●	●	●	●				
10	10	**L 2-M**	4,6	25	*1.000/100*	●	●	●	●	●	●				
16	16	**L 3-M**	5,8	27	*1.000/100*		●	●	●	●	●				
25	25	**L 5-M**	7,0	29	*500/100*			●	●	●	●				
35	25÷35	**L 7-M**	8,9	33	*400/100*			●	●	●	●				
50	35÷50	**L 10-M**	10,0	37	*200/50*			●	●	●	●				
70	50÷70	**L 14-M**	11,3	39	*200/50*			●	●	●	●				
95	70÷95	**L 19-M**	13,5	43	*100/25*				●	●	●				
120	95÷120	**L 24-M**	15,2	47	*100/25*				●	●	●				
150	120÷150	**L 30-M**	16,7	58	*50/25*					●	●				
185	150÷185	**L 37-M**	19,2	64	*50/25*						●	●	●	●	●
240	185÷240	**L 48-M**	21,1	75	*30/15*						●	●	●	●	●
300	240	**L 60-M**	23,7	90	*20/10*							●	●	●	●
400	300	**L 80-M**	27,0	94	*20/5*							●	●	●	●
500	400	**L 100-M**	30,3	98	*12/6*								●	●	●
600÷630	500	**L 120-M**	33,4	105	*12/6*								●	●	●
800	600	**L 160-M**	38,0	112	*9/3*								●	●	●
1000	800	**L 200-M**	44,0	120	*6/3*								●	●	●

L-M range of connectors are designed for jointing low voltage conductors.
Made of electrolytic copper tube having the same dimension as A-M series lugs: L-M connectors are annealed and electrolytically tin plated.
They feature an internal taper at both ends to ease the introduction of the conductor and a central stop to ensure correct positioning.

PARALLEL CONNECTORS

L-P



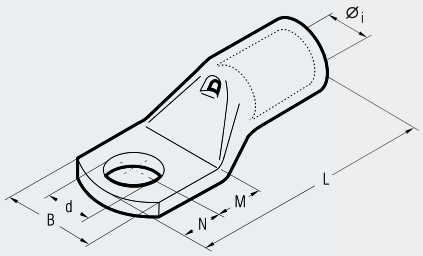
Total Conductor Size sqmm low stranded	Total Conductor Size sqmm Flexible	Ref.	Dimensions mm Øi	Dimensions mm L	Quantity Box/Bag	Mechanical Tools: HN 1	Mechanical Tools: HN 5	Mechanical Tools: TN 70 SE	Mechanical Tools: TN 120 SE	Hydraulic Tools: B 15	Hydraulic Tools: HT 45-E RH 50 B 51 B 55 HT 51	Hydraulic Tools: HT 81-U RHU 81 HT 81	Hydraulic Tools: HT 120 and tools and heads with 130 kN crimping force	Hydraulic Tools: ECW-H3D	Hydraulic Tools: RHU 520
0,25÷1,5	0,25÷1,5	**L 03-P**	1,8	6,0	*10.000/100*	●				●	●				
1,5÷2,5	1,5÷2,5	**L 06-P**	2,4	6,0	*5.000/100*	●				●	●				
4÷6	4÷6	**L 1-P**	3,6	9,0	*3.000/100*	●		●	●	●	●				
10	10	**L 2-P**	4,6	10,5	*3.000/100*	●	●	●	●	●	●				
16	16	**L 3-P**	5,8	11,5	*2.000/100*		●	●	●	●	●				
25	25	**L 5-P**	7,0	13,0	*1.500/100*			●	●	●	●				
35	25÷35	**L 7-P**	8,9	14,0	*500/100*			●	●	●	●				
50	35÷50	**L 10-P**	10,0	16,0	*500/100*			●	●	●	●				
70	50÷70	**L 14-P**	11,3	18,0	*500/100*			●	●	●	●				
95	70÷95	**L 19-P**	13,5	19,0	*300/50*				●	●	●				
120	95÷120	**L 24-P**	15,2	22,0	*200/50*				●	●	●				
150	120÷150	**L 30-P**	16,7	26,5	*100/50*					●	●				
185	150÷185	**L 37-P**	19,2	26,5	*100/50*						●	●	●	●	●
240	185÷240	**L 48-P**	21,1	34,0	*60/15*						●	●	●	●	●

Made of electrolytic copper tube, having the same dimensions as A-M series lugs, L-P connectors are annealed and electrolytically tin plated.
They feature an internal taper to ease the introduction of the conductor.

COPPER TUBE CRIMPING LUGS

A-M

for extra flexible copper conductors



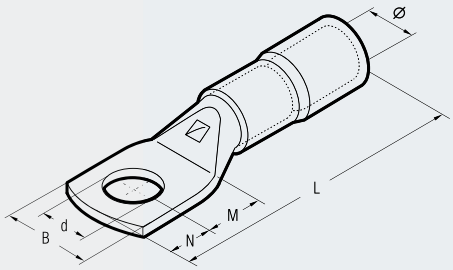
These terminals are particularly recommended for use with extra flexible conductors on for instance, welding machines.
A-M series lugs are designed to suit panel applications.
The dimensions of the tube are designed to obtain the most efficient electrical conductivity and mechanical strength to resist vibration and pull out.
Cembre lugs are annealed to guarantee optimum ductility and electrolytically tin plated to avoid oxidation.
The presence of an inspection hole facilitates full insertion of the conductor.

Conductor Size Extra Flexible sqmm	Ø Stud mm	Ref.	Dimensions mm						Quantity Box/Bag	Mechanical Tools		Hydraulic Tools														
			Øi	B	M	N	L	d		TN 70 SE	TN 120 SE	HT 45E	HT 51	RH 50	B 51	B 55	HT 81-U	RHU 81	HT 120 and tools and heads with 130 kN crimping force		ECW-H3D		RHU 520		
35	6	**A 9-M 6/15**	9,3	15,0	8,0	7,0	38,5	6,4	*400/100*																	
	8	**A 9-M 8**	9,3	17,0	9,0	8,0	40,5	8,4	*400/100*																	
	10	**A 9-M 10**	9,3	18,5	11,0	10,0	44,5	10,5	*400/100*																	
	12	**A 9-M 12**	9,3	21,0	14,0	12,0	49,5	13,2	*300/50*																	
50	6	**A 12-M 6/15**	11,0	15,0	8,0	7,0	40,5	6,4	*200/50*																	
	8	**A 12-M 8**	11,0	19,8	9,0	8,0	42,5	8,4	*200/50*																	
	10	**A 12-M 10**	11,0	19,8	11,0	10,0	46,5	10,5	*200/50*																	
	10	**A 12-M 10/19**	11,0	19,0	11,0	10,0	46,5	10,5	*200/50*																	
	12	**A 12-M 12**	11,0	22,0	14,0	12,0	51,5	13,2	*200/50*																	
70	6	**A 17-M 6**	13,0	23,0	8,0	7,0	45,0	6,4	*200/50*																	
	8	**A 17-M 8**	13,0	23,0	9,0	8,0	47,0	8,4	*150/50*																	
	10	**A 17-M 10**	13,0	23,0	11,0	10,0	51,0	10,5	*150/50*																	
	10	**A 17-M 10/19**	13,0	19,0	11,0	10,0	51,0	10,5	*200/50*																	
	12	**A 17-M 12**	13,0	23,0	14,0	12,0	56,0	13,2	*150/50*																	
	14	**A 17-M 14**	13,0	25,0	15,5	12,0	57,5	15,0	*150/25*																	
	16	**A 17-M 16**	13,0	27,0	16,5	13,5	60,0	17,0	*150/25*																	
95	8	**A 20-M 8**	15,0	27,0	9,0	8,0	50,0	8,4	*100/25*																	
	10	**A 20-M 10**	15,0	27,0	11,0	10,0	54,0	10,5	*100/25*																	
	12	**A 20-M 12**	15,0	27,0	14,0	12,0	59,0	13,2	*100/25*																	
	14	**A 20-M 14**	15,0	27,0	15,5	12,0	60,5	15,0	*100/25*																	
	16	**A 20-M 16**	15,0	27,0	16,5	13,5	63,0	17,0	*100/25*																	
120	8	**A 29-M 8**	16,5	30,0	9,0	8,0	53,5	8,4	*100/25*																	
	10	**A 29-M 10**	16,5	30,0	11,0	10,0	57,5	10,5	*100/25*																	
	12	**A 29-M 12**	16,5	30,0	14,0	12,0	62,5	13,2	*100/25*																	
	14	**A 29-M 14**	16,5	30,0	15,5	12,0	64,0	15,0	*100/25*																	
	16	**A 29-M 16**	16,5	30,0	16,5	13,5	66,5	17,0	*100/25*																	
	20	**A 29-M 20**	16,5	30,0	22,0	20,0	78,5	21,0	*75/25*																	
150	10	**A 35-M 10**	19,2	34,2	13,0	11,0	65,5	10,5	*50/25*																	
	12	**A 35-M 12**	19,2	34,2	16,0	14,0	71,5	13,2	*50/25*																	
	14	**A 35-M 14**	19,2	34,2	18,0	16,0	75,5	15,0	*50/25*																	
	16	**A 35-M 16**	19,2	34,2	19,0	17,0	77,5	17,0	*50/25*																	
	20	**A 35-M 20**	19,2	34,2	22,0	20,0	83,5	21,0	*50/25*																	
185	10	**A 40-M 10**	21,0	37,5	13,0	11,0	73,0	10,5	*50/25*																	
	12	**A 40-M 12**	21,0	37,5	16,0	14,0	79,0	13,2	*30/15*																	
	14	**A 40-M 14**	21,0	37,5	18,0	16,0	83,0	15,0	*50/25*																	
	16	**A 40-M 16**	21,0	37,5	19,0	17,0	85,0	17,0	*50/25*																	
	20	**A 40-M 20**	21,0	37,5	22,0	20,0	91,0	21,0	*50/25*																	

NYLON INSULATED COPPER TUBE LUGS

for extra flexible copper conductors

ANE-M



Conductor Size Extra Flexible sqmm	Ø Stud mm	Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity Box/Bag	Mechanical Tools TNN 70	Mechanical Tools TNN 120	Hydraulic Tools HT 51	Hydraulic Tools RH 50	Hydraulic Tools B 51	Hydraulic Tools B 55	Hydraulic Tools HT 120 and tools and heads with 130 kN crimping force	Hydraulic Tools ECW-H3D
35	6	**ANE 9-M 6/15**	13,6	15,0	8,0	7,0	54,0	6,4	200/50								
	8	**ANE 9-M 8**	13,6	17,0	9,0	8,0	56,0	8,4	200/50								
	10	**ANE 9-M 10**	13,6	18,5	11,0	10,0	60,0	10,5	150/50								
	12	**ANE 9-M 12**	13,6	21,0	14,0	12,0	65,0	13,2	150/50								
50	6	**ANE 12-M 6/15**	15,7	15,0	8,0	7,0	59,5	6,4	100/25								
	8	**ANE 12-M 8**	15,7	19,8	9,0	8,0	61,5	8,4	100/25								
	10	**ANE 12-M 10**	15,7	19,8	11,0	10,0	65,5	10,5	100/25								
	10	**ANE 12-M 10/19**	15,7	19,0	11,0	10,0	65,5	10,5	100/25								
	12	**ANE 12-M 12**	15,7	22,0	14,0	12,0	70,5	13,2	100/25								
70	6	**ANE 17-M 6**	17,9	23,0	8,0	7,0	63,8	6,4	100/25								
	8	**ANE 17-M 8**	17,9	23,0	9,0	8,0	65,8	8,4	100/25								
	10	**ANE 17-M 10**	17,9	23,0	11,0	10,0	69,8	10,5	50/25								
	10	**ANE 17-M 10/19**	17,9	19,0	11,0	10,0	69,8	10,5	100/25								
	12	**ANE 17-M 12**	17,9	23,0	14,0	12,0	74,8	13,2	50/25								
	14	**ANE 17-M 14**	17,9	25,0	15,5	12,0	76,3	15,0	50/25								
	16	**ANE 17-M 16**	17,9	27,0	16,5	13,5	78,8	17,0	50/25								
95	8	**ANE 20-M 8**	20,0	27,0	9,0	8,0	70,6	8,4	50/25								
	10	**ANE 20-M 10**	20,0	27,0	11,0	10,0	74,6	10,5	50/25								
	12	**ANE 20-M 12**	20,0	27,0	14,0	12,0	79,6	13,2	50/25								
	14	**ANE 20-M 14**	20,0	27,0	15,5	12,0	81,1	15,0	50/25								
	16	**ANE 20-M 16**	20,0	27,0	16,5	13,5	83,6	17,0	50/25								
120	10	**ANE 29-M 10**	22,4	30,0	11,0	10,0	81,5	10,5	50/25								
	12	**ANE 29-M 12**	22,4	30,0	14,0	12,0	86,5	13,2	50/25								
	14	**ANE 29-M 14**	22,4	30,0	15,5	12,0	88,5	15,0	50/25								
	16	**ANE 29-M 16**	22,4	30,0	16,5	13,5	90,5	17,0	50/25								
	20	**ANE 29-M 20**	22,4	30,0	22,0	20,0	102,5	21,0	30/15								
150	12	**ANE 35-M 12**	25,0	34,2	16,0	14,0	95,0	13,2	30/15								
	14	**ANE 35-M 14**	25,0	34,2	18,0	16,0	99,0	15,0	30/15								
	16	**ANE 35-M 16**	25,0	34,2	19,0	17,0	101,0	17,0	30/15								
	20	**ANE 35-M 20**	25,0	34,2	22,0	20,0	107,0	21,0	30/15								

These terminals are particularly recommended for use with extra flexible conductors on for instance, welding machines.

ANE-M series terminals are manufactured from electrolytic copper tube annealed and tin plated.

The interior of the Nylon insulation sleeve is funnel shaped so as to ensure complete and easy introduction of the conductor strands.

The Nylon insulated sleeve eliminates the need to insulate the terminal by either taping or using heat shrinkable tubes.

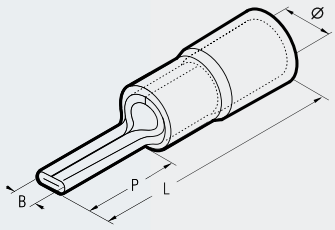
Furthermore the Nylon sleeve avoids the possibility of conductor breakage at the barrel entrance.

The items tabulated all feature black insulated sleeves, other coloured sleeves are available against specific request.

In order to achieve the best electrical and mechanical performance it is suggested that they are crimped using dies and tools specifically developed for this purpose by Cembre.

NYLON INSULATED PIN TERMINALS

ANE-P

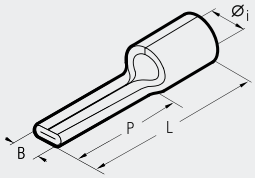


ANE-P series terminals are made from electrolytic copper, rolled, tin plated and brazed.
The interior of the Nylon insulation sleeve is funnel shaped so as to ensure complete and easy introduction of the conductor strands.
In order to achieve the best electrical and mechanical performance it is suggested that they are crimped using dies and tools specifically developed for this purpose by Cembre.

Conductor Size Flexible sqmm	Ref.	Dimensions mm				Quantity Box/Bag	Mechanical Tools				Hydraulic Tools				
		Ø	B	P	L		HNN 3	HNN 4	TNN 70	TNN 120	B 15	HT 51 RH 50 B 51	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D
10	**ANE 2-P 12**	8,0	4,3	14,5	35,1	*500/100*								
16	**ANE 3-P 14**	9,2	5,5	18,0	41,1	*500/100*								
25	**ANE 5-P 16**	11,1	7,0	20,3	45,0	*300/100*								
35	**ANE 7-P 20**	13,6	8,0	24,5	55,0	*200/50*								

UNINSULATED PIN CONNECTORS

A-P

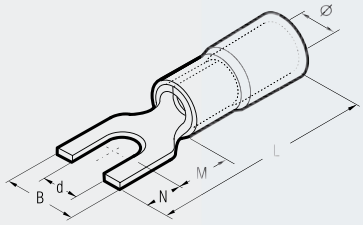


A-P series pin connectors are designed to terminate conductors into contact blocks.
They are manufactured from copper strip, rolled, brazed and tin plated.

Conductor Size sqmm	Ref.	Dimensions mm				Quantity Box/Bag	Mechanical Tools				Hydraulic Tools				
		Øi	B	P	L		HN 1	HN 5	TN 70 SE	TN 120 SE	B 15	HT 45-E	HT 51 RH 50 B 51 B 55	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D
10	**A 2-P 12**	4,8	4,3	14,5	23,5	*1.500/100*									
16	**A 3-P 14**	5,9	5,5	18,0	28,0	*1.500/100*									
25	**A 5-P 16**	7,0	7,0	20,3	32,0	*1.000/100*									
35	**A 7-P 20**	8,9	8,0	24,5	39,0	*500/100*									
50	**A 10-P 25**	10,0	9,5	26,0	45,0	*250/50*									
70	**A 14-P 30**	11,5	11,0	31,0	55,0	*200/50*									

NYLON INSULATED FORK TERMINALS

ANE-U

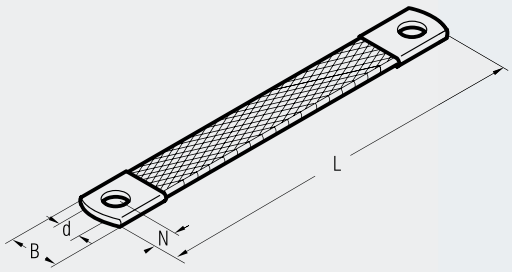


Conductor Size Flexible sqmm	Ø Stud mm	Ref.	Dimensions mm Ø	B	M	N	L	d	Quantity Box/Bag	Mechanical Tools HNN 3	HNN 4	TNN 70	TNN 120	Hydraulic Tools B 15	HT 51 RH 50 B 51	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D
10	4	**ANE 2-U 4**	8,0	9,8	7,5	7	35,1	4,3	*500/100*								
	5	**ANE 2-U 5**	8,0	11,5	7,5	7	35,1	5,3	*500/100*								
16	4	**ANE 3-U 4**	9,2	10,0	10,0	8	41,1	4,3	*500/100*								
	5	**ANE 3-U 5**	9,2	11,5	10,0	8	41,1	5,3	*500/100*								

ANE-U series terminals are made from electrolytic copper, rolled, tin plated and brazed. The interior of the Nylon insulated sleeve is funnel shaped so as to ensure complete and easy introduction of the conductor strands.
In order to achieve the best electrical and mechanical performance it is suggested that they are crimped using dies and tools specifically developed for this purpose by Cembre.

FLEXIBLE BRAIDS

FL



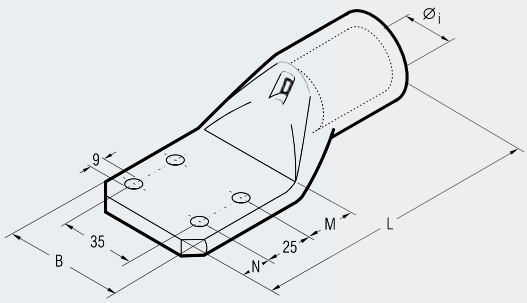
Size sqmm	Ø Stud mm	Ref.	Dimensions mm B	N	L	d	Quantity Box/Bag
10	8	**FL 10-150**	17	10	150	8,5	*300/50*
	8	**FL 10-200**	17	10	200	8,5	*150/50*
	8	**FL 10-250**	17	10	250	8,5	*50/50*
16	8	**FL 16-150**	17	10	150	8,5	*300/50*
	8	**FL 16-200**	17	10	200	8,5	*150/50*
	8	**FL 16-250**	17	10	250	8,5	*50/50*
	8	**FL 16-320**	17	10	320	8,5	*50/50*
	8	**FL 16-350**	17	10	350	8,5	*50/50*
	8	**FL 16-420**	17	10	420	8,5	*25/25*
	8	**FL 16-570**	17	10	570	8,5	*25/25*
	8	**FL 16-660**	17	10	660	8,5	*25/25*
25	8	**FL 25-150**	21	10	150	8,5	*200/50*
	8	**FL 25-200**	21	10	200	8,5	*100/50*
	8	**FL 25-250**	21	10	250	8,5	*50/50*
	8	**FL 25-300**	21	10	300	8,5	*50/50*

Flexible braids are manufactured from electrolytic copper wire.
Braids of different conductor sizes or lengths are available on request.
Standard finish - bright copper.

Flexible braids can be supplied tin plated, in this case add the suffix “ST” to reference.
E.g.:
- FL 10-150 (Bright copper)
- FL 10-150-ST (Tin plated)

COPPER TUBE LUGS 4-ESI FIXING

A-4ESI

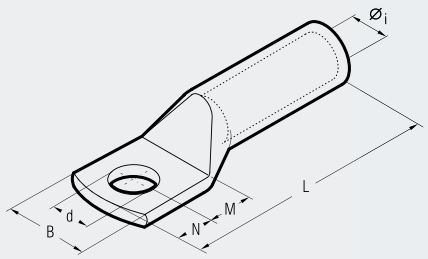


A-4ESI series lugs are made from high purity electrolytic copper tube, annealed and tin plated. The four hole stud fixing in accordance with E.A. specifications ensure compatibility with most transformer fixing arrangements.

Conductor Size sqmm	Ref.	Dimensions mm					Quantity Box/Bag	Hydraulic Tools				
		Øi	B	M	N	L						
185	**A 37-4ESI**	19,2	61	20	15	124	*20/10*	HT 51 RH 50 B 51 B 55	HT 81-U RHU 81	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D	RHU 520
240	**A 48-4ESI**	21,1	61	20	15	128	*20/10*					
300	**A 60-4ESI**	23,7	61	20	15	133	*20/10*					
400	**A 80-4ESI**	27,0	61	20	15	134	*15/5*					
500	**A 100-4ESI**	30,3	61	20	15	139	*10/5*					
630	**A 120-4ESI**	33,4	61	20	15	144	*10/5*					
800	**A 160-4ESI**	38,0	61	20	15	158	*8/4*					

HEAVY DUTY COPPER TUBE TERMINALS

2A-M



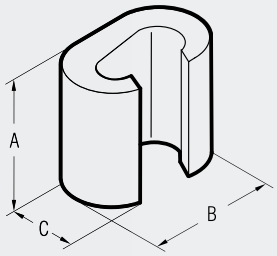
Conductor Size sqmm	Ø Stud mm	Ref.	Dimensions mm Øi	B	M	N	L	d	Quantity Box/Bag	Mechanical Tools HN 5	TN 70 SE	TN 120 SE	Hydraulic Tools B 15	HT 45-E	HT 51	RH 50	B 51	B 55	HT 81-U	RHU 81	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D	RHU 520
16	8	**2 A 3-M 8**	5,8	15,0	9	8	43,5	8,4	*600/100*	●	●	●	●	●	●	●	●	●	●	●	●	●	●
	10	**2 A 3-M10**	5,8	18,0	11	10	47,5	10,5	*500/100*														
25	8	**2 A 5-M 8**	7,0	15,0	9	8	51,0	8,4	*400/100*														
	10	**2 A 5-M 10**	7,0	18,0	11	10	55,0	10,5	*300/50*														
	12	**2 A 5-M 12**	7,0	21,0	14	12	60,0	13,2	*300/50*														
35	8	**2 A 7-M 8**	8,9	17,0	9	8	53,0	8,4	*250/50*														
	10	**2 A 7-M 10**	8,9	19,0	11	10	57,0	10,5	*250/50*														
	12	**2 A 7-M 12**	8,9	21,0	14	12	62,0	13,2	*200/50*														
50	10	**2 A 10-M 10**	10,0	20,0	11	10	63,0	10,5	*200/50*														
	12	**2 A 10-M 12**	10,0	21,0	14	12	68,0	13,2	*150/50*														
	14	**2 A 10-M 14**	10,0	25,0	16	14	72,0	15,0	*150/50*														
	16	**2 A 10-M 16**	10,0	26,0	18	16	76,0	17,0	*150/50*														
63 70	10	**2 A 14-M 10**	11,3	21,0	11	10	70,0	10,5	*100/50*														
	12	**2 A 14-M 12**	11,3	22,0	14	12	75,0	13,2	*100/50*														
	14	**2 A 14-M 14**	11,3	25,0	16	14	79,0	15,0	*100/50*														
	16	**2 A 14-M 16**	11,3	26,0	18	16	83,0	17,0	*100/50*														
95	10	**2 A 19-M 10**	13,5	25,0	11	10	76,5	10,5	*75/25*														
	12	**2 A 19-M 12**	13,5	25,0	14	12	81,5	13,2	*75/25*														
	14	**2 A 19-M 14**	13,5	25,0	16	14	85,5	15,0	*75/25*														
	16	**2 A 19-M 16**	13,5	27,0	18	16	90,5	17,0	*75/25*														
	20	**2 A 19-M 20**	13,5	29,5	22	20	97,5	21,0	*75/25*														
120 125	10	**2 A 24-M 10**	15,2	28,5	11	10	82,0	10,5	*50/25*														
	12	**2 A 24-M 12**	15,2	28,5	14	12	87,0	13,2	*50/25*														
	14	**2 A 24-M 14**	15,2	28,5	16	14	91,0	15,0	*50/25*														
	16	**2 A 24-M 16**	15,2	28,5	18	16	95,0	17,0	*50/25*														
	20	**2 A 24-M 20**	15,2	30,0	22	20	103,0	21,0	*50/25*														
150	10	**2 A 30-M 10**	16,7	31,5	13	11	92,0	10,5	*50/25*														
	12	**2 A 30-M 12**	16,7	31,5	16	14	98,0	13,2	*30/15*														
	14	**2 A 30-M 14**	16,7	31,5	18	16	102,0	15,0	*30/15*														
	16	**2 A 30-M 16**	16,7	31,5	19	17	104,0	17,0	*30/15*														
	20	**2 A 30-M 20**	16,7	31,5	22	20	110,0	21,0	*30/15*														
185	12	**2 A 37-M 12**	19,2	35,5	16	14	108,0	13,2	*30/15*														
	14	**2 A 37-M 14**	19,2	35,5	18	16	112,0	15,0	*30/15*														
	16	**2 A 37-M 16**	19,2	35,5	19	17	114,0	17,0	*30/15*														
	20	**2 A 37-M 20**	19,2	35,5	22	20	120,0	21,0	*30/15*														
240	12	**2 A 48-M 12**	21,1	39,0	16	14	109,0	13,2	*20/5*														
	14	**2 A 48-M 14**	21,1	39,0	18	16	113,0	15,0	*20/5*														
	16	**2 A 48-M 16**	21,1	39,0	19	17	115,0	17,0	*20/5*														
	20	**2 A 48-M 20**	21,1	39,0	22	20	121,0	21,0	*25/5*														
300	12	**2 A 60-M 12**	23,7	44,0	20	14	129,5	13,2	*20/5*														
	14	**2 A 60-M 14**	23,7	44,0	22	16	133,5	15,0	*20/5*														
	16	**2 A 60-M 16**	23,7	44,0	22	19	136,5	17,0	*20/5*														
	20	**2 A 60-M 20**	23,7	44,0	24	23	142,5	21,0	*20/5*														
400	12	**2 A 80-M 12**	27,0	51,0	22	19	140,0	13,2	*15/5*														
	14	**2 A 80-M 14**	27,0	51,0	22	19	140,0	15,0	*10/5*														
	16	**2 A 80-M 16**	27,0	51,0	22	19	140,0	17,0	*10/5*														
	20	**2 A 80-M 20**	27,0	51,0	24	23	146,0	21,0	*15/5*														
500	16	**2 A 100-M 16**	30,3	56,5	22	19	147,0	17,0	*10/5*														
	20	**2 A 100-M 20**	30,3	56,5	24	23	153,0	21,0	*10/5*														
600÷630	16	**2 A 120-M 16**	33,4	61,5	22	19	159,0	17,0	*20/5*														
	20	**2 A 120-M 20**	33,4	61,5	24	23	165,0	21,0	*20/5*														
800	20	**2 A 160-M 20**	38,0	72,0	24	23	187,0	21,0	*12/3*														
1000	20	**2 A 200-M 20**	44,0	80,0	24	23	202,0	21,0	*6/2*														

2A-M series are made from high purity copper tube, and are annealed.
They feature a double length barrel for enhanced electrical and mechanical performance in heavy duty applications.
The absence of an inspection hole prevents the entry of water or moisture into the crimped joint making these terminals suitable for outdoor applications.
The terminals are electrolytically tin plated to prevent atmospheric corrosion.
2A-2M series terminals with double stud hole palm are available against specific requirements.

SLEEVE CONNECTORS

C

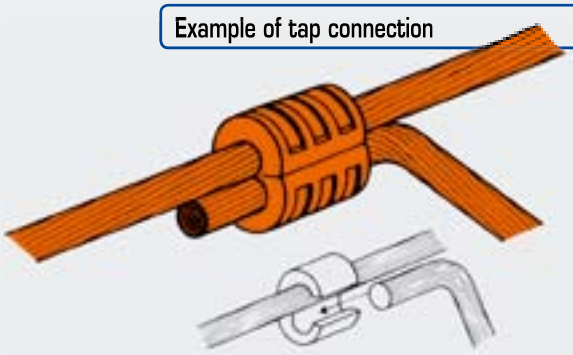
Tin plated version



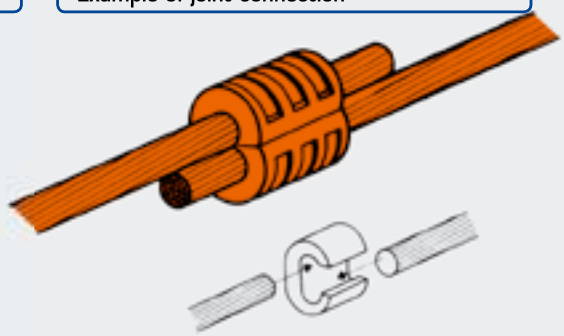
"C" connectors are manufactured from high purity copper profiles and are suitable for a variety of uses either to create an earthing network or tapping off from overhead distribution lines.
Each connector is marked as follows:
- Cembre trade mark
- Reference number
- Conductor size-Run
- Conductor size-Tap
- Number of crimps
- Die reference.

Conductor Size sqmm Run	Tap	Ref.	Dimensions mm A	B	C	Quantity Box/Bag	Mechanical Tools	Hydraulic Tools					
6÷2,5	6÷1,5	C 6-C 6 ST	9,0	9,8	6,4	1.000/100	HP4-C10	HT 45-E	B 51 B 55	RH 50	HT 51	HT 81-J RHU 81	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D
10	10÷1,5	C 10-C 10 ST	12,0	12,6	8,4	500/100								
16	16÷1,5	C 16-C 16 ST	17,0	19,4	12,0	500/100								
25÷16	10÷1,5	C 25-C 10 ST	17,0	19,8	13,0	400/50								
25	25÷16	C 25-C 25 ST	17,0	21,4	13,0	300/50								
40÷35	16÷1,5	C 35-C 16 ST	21,0	24,6	15,4	200/25								
40÷35	40÷25	C 35-C 35 ST	21,0	26,6	15,6	200/25								
50	25÷10													
50	25÷4	C 50-C 25 ST	25,0	32,9	21,0	200/25								
50	50÷35	C 50-C 50 ST	26,0	33,0	21,0	100/25								
70÷63	25÷1,5	C 70-C 25 N ST	21,0	26,4	17,5	100/25								
70÷50	40÷4	C 70-C 35 ST	28,0	33,0	21,0	100/25								
70÷50	70÷35	C 70-C 70 ST	28,0	34,0	21,0	100/25								
100÷95	40÷4	C 95-C 35 ST	29,0	40,6	26,0	50/25								
100÷95	70÷40	C 95-C 70 ST	29,0	41,0	26,0	50/25								
100÷95	100÷63	C 95-C 95 ST	29,0	41,0	26,0	50/25								
125÷110	125÷25	C 120-C 120 ST	30,0	45,0	28,0	50/25								
160÷150	125÷25	C 150-C 120 ST	31,0	45,0	28,0	50/25								
150	150÷63	C 150-C 150 ST	30,0	45,0	28,0	50/25								
185	100÷16	C 185-C 95 ST	31,0	45,0	28,0	50/25								
185÷120	185÷120	C 185-C 185 ST	22,6	68,0	34,0	30/15								
240÷150	120÷95	C 240-C 120 ST	22,6	68,0	34,0	30/15								

Example of tap connection

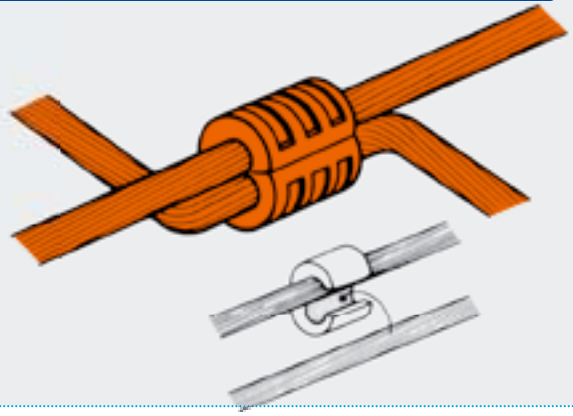


Example of joint connection



Example of joining two running conductors

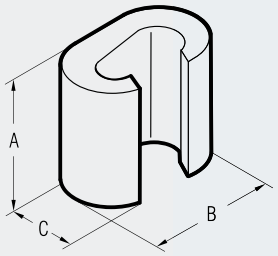
Conductor Size sqmm	Ref.
25-25	C 35-C 16 ST
35-35	C 35-C 35 ST
50-50	C 70-C 70 ST
63-63	C 95-C 70 ST
70-70	
95-95	C 150-C 120 ST
120-120	
125-125	C 150-C 150
120-120	C 185-C 95 ST
125-125	



SLEEVE CONNECTORS

Bright surface version

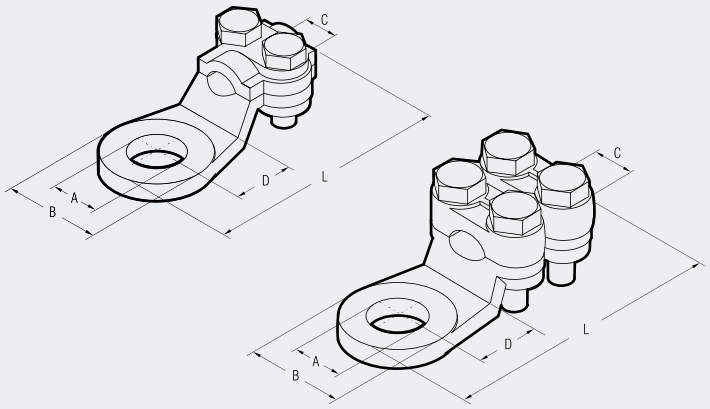
C



Conductor Size sqmm Run	Tap	Ref.	Dimensions mm A	B	C	*Quantity* *Box/Bag*	Mechanical Tools	Hydraulic Tools				
								HT 45-E	B 55 B 51 RH 50 HT 51	RHU 81 HT 81-J	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D
6÷2,5	6÷1,5	**C 6-C 6**	9,0	9,8	6,4	*1.000/100*	HP4-C10					
10	10÷1,5	**C 10-C 10**	12,0	12,6	8,4	*500/100*						
16	16÷1,5	**C 16-C 16**	17,0	19,4	12,0	*500/100*						
25÷16	10÷1,5	**C 25-C 10**	17,0	19,8	13,0	*400/50*						
25	25÷16	**C 25-C 25**	17,0	21,4	13,0	*300/50*						
40÷35	16÷1,5	**C 35-C 16**	21,0	24,6	15,4	*200/25*						
40÷35	40÷25	**C 35-C 35**	21,0	26,6	15,6	*200/25*						
50	25÷10											
50	25÷4	**C 50-C 25**	25,0	32,9	21,0	*200/25*						
50	50÷35	**C 50-C 50**	26,0	33,0	21,0	*100/25*						
70÷63	25÷1,5	**C 70-C 25 N**	21,0	26,4	17,5	*100/25*						
70÷50	40÷4	**C 70-C 35**	28,0	33,0	21,0	*100/25*						
70÷50	70÷35	**C 70-C 70**	28,0	34,0	21,0	*100/25*						
100÷95	40÷4	**C 95-C 35**	29,0	40,6	26,0	*50/25*						
100÷95	70÷40	**C 95-C 70**	29,0	41,0	26,0	*50/25*						
100÷95	100÷63	**C 95-C 95**	29,0	41,0	26,0	*50/25*						
125÷110	125÷25	**C 120-C 120**	30,0	45,0	28,0	*50/25*						
160÷150	125÷25	**C 150-C 120**	31,0	45,0	28,0	*50/25*						
150	150÷63	**C 150-C 150**	30,0	45,0	28,0	*50/25*						
185	100÷16	**C 185-C 95**	31,0	45,0	28,0	*50/25*						
185÷120	185÷120	**C 185-C 185**	22,6	68,0	34,0	*30/15*						
240÷150	120÷95	**C 240-C 120**	22,6	68,0	34,0	*30/15*						

Featuring same characteristics of tin plated version, (see opposite page).

MECHANICAL FIXING LUGS



Material:
Brass OT 58 UNI 5705 nickel-plated.
Zinc plated steel bolts.

2 bolt fixing lugs Ø A standard

Conductor Size sqmm	Ref.	A bolt	Dimensions mm				Quantity
			B	C	D	L	
16	**2155**	M8	18,0	4,5	12,5	40	*100*
25	**2156**	M8	19,5	6,0	13,0	43	*100*
35	**2157**	M12	23,0	7,0	15,0	49	*50*

4 bolt fixing lugs Ø A standard

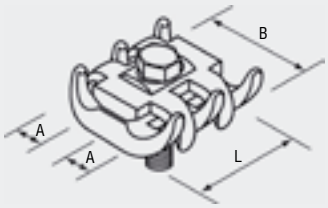
Conductor Size sqmm	Ref.	A bolt	Dimensions mm				Quantity
			B	C	D	L	
50	**2158**	M12	23,5	8	16,0	57	*50*
75	**2160**	M12	28,0	10	20,0	65	*25*
100	**2161**	M12	31,0	13	17,0	66	*25*
125	**2162**	M15	33,0	14	18,0	71	*25*
150	**2163**	M14	34,0	16	19,5	75	*25*
175	**2164**	M15	36,0	16	21,0	78	*25*
200	**2165**	M16	38,5	18	23,0	84	*10*
300	**2167**	M20	46,0	23	28,0	103	*5*

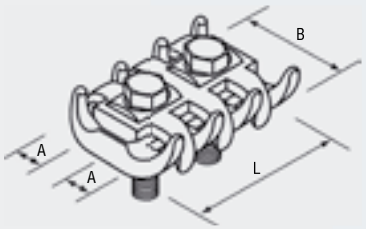
2 bolt fixing lugs Ø A large

Conductor Size sqmm	Ref.	A bolt	Dimensions mm				Quantity
			B	C	D	L	
16	**2171**	M10	18,0	4,5	12,5	40	*100*
25	**2172**	M10	19,5	6,0	13,0	43	*100*
35	**2173**	M14	23,0	7,0	15,0	49	*50*
50	**2174**	M14	25,0	8,0	17,0	56	*50*

4 bolt fixing lugs Ø A large

Conductor Size sqmm	Ref.	A bolt	Dimensions mm				Quantity
			B	C	D	L	
75	**2176**	M16	28	10	20	65	*25*





Single bolt fixing

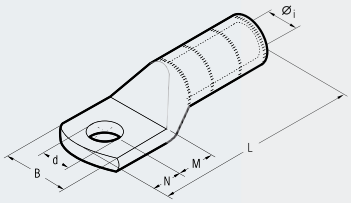
Conductor Size sqmm	Ref.	Ø A for cable mm	Dimensions mm		Quantity
			B	L	
6÷16	**2323**	3÷ 5	24	20	*50*
16÷50	**2326**	5÷ 8	30	25	*50*
35÷70	**2329**	7÷12	40	30	*25*

2 bolt fixing

Conductor Size sqmm	Ref.	Ø A for cable mm	Dimensions mm		Quantity
			B	L	
6÷16	**2333**	3÷ 5	27	32	*50*
16÷50	**2336**	5÷ 8	32	40	*50*
35÷70	**2339**	7÷12	40	44	*25*
50÷95	**2342**	8÷14	48	48	*10*
70÷150	**2344**	12÷16	51	53	*10*
150÷300	**2346**	18÷22	70	70	*5*

Material:
Brass OT 58 UNI 5705.
Zinc plated steel bolts.
Zinc plated steel nut.

CA-M
2A-M



Series CA-M and 2A-M terminals are designed for high voltage applications up to 33 kV.
They are manufactured from high purity copper tube, annealed and tin plated.
The extended barrel enhances both electrical and mechanical performance. The absence of an inspection hole prevents moisture entry into the crimped joint and makes these terminals suitable for outdoor applications.

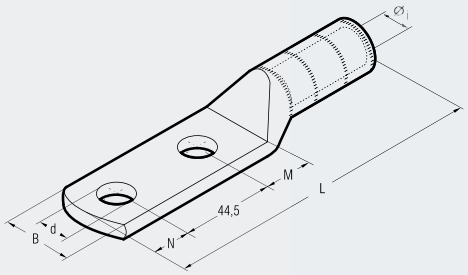
Conductor Size (sqmm) & Format	Ø Stud mm	Ref.	Dimensions mm Øi	B	M	N	L	d	Quantity Box/Bag	Hydraulic Tools
25 R/BR/BS*	8	**CA 25-M 8**	6,8	14,0	9	8	65,0	8,4	*300/50*	HT 81-U RHU 81 / HT 120 and tools and heads with 130 kN crimping force / ECW-H3D / RHU 520
	10	**CA 25-M 10**	6,8	18,0	13	11	72,0	10,5	*200/50*	
	12	**CA 25-M 12**	6,8	21,0	16	14	78,0	13,2	*200/50*	
30 RC/S ÷ 40 S	12	**CA 40 S-M 12**	8,2	21,0	16	14	79,0	13,2	*150/50*	
	16	**CA 40 S-M 16**	8,2	26,0	19	17	85,0	17,0	*100/50*	
35 BR/BS*	10	**CA 35-M 10**	8,25	21,0	13	11	73,0	10,5	*150/50*	
	12	**CA 35-M 12**	8,25	21,0	16	14	79,0	13,2	*150/50*	
	16	**CA 35-M 16**	8,25	26,0	19	17	85,0	17,0	*150/50*	
50 RC	12	**CA 50 R-M 12**	8,7	20,5	16	14	79,0	13,2	*150/50*	
50 S	12	**CA 50 S-M 12**	9,5	21,0	16	14	79,0	13,2	*150/50*	
	16	**CA 50 S-M 16**	9,5	26,0	19	17	85,0	17,0	*100/50*	
50 BR/BS*	10	**CA 50-M 10**	9,5	21,0	13	11	73,0	10,5	*150/50*	
	12	**CA 50-M 12**	9,5	21,0	16	14	79,0	13,2	*150/50*	
	14	**CA 50-M 14**	9,5	25,0	18	16	83,0	15,0	*100/50*	
	16	**CA 50-M 16**	9,5	26,0	19	17	85,0	17,0	*100/50*	
63 S ÷ 70 S	12	**CA 70 S-M 12**	11,0	28,0	16	14	81,2	13,2	*50/25*	
	16	**CA 70 S-M 16**	11,0	30,0	19	17	87,2	17,0	*50/25*	
70 BR/BS*	10	**CA 70 S-M 10**	11,0	26,0	13	11	75,2	10,5	*50/25*	
	12	**CA 70 S-M 12**	11,0	28,0	16	14	81,2	13,2	*50/25*	
	14	**CA 70 S-M 14**	11,0	28,0	18	16	85,2	15,0	*50/25*	
	16	**CA 70 S-M 16**	11,0	30,0	19	17	87,2	17,0	*50/25*	
80 S ÷ 95 RC	12	**CA 95 R-M 12**	12,0	28,0	16	14	91,0	13,2	*50/25*	
	14	**CA 95 R-M 14**	12,0	29,0	18	16	95,0	15,0	*50/25*	
95 S ÷ 100 S	12	**CA 95 S-M 12**	13,5	28,0	16	14	91,0	13,2	*50/25*	
	14	**CA 95 S-M 14**	13,5	29,0	18	16	94,5	15,0	*50/25*	
	16	**CA 95 S-M 16**	13,5	30,0	20	17	97,0	17,0	*50/25*	
95 BR/BS*	10	**CA 95-M 10**	13,5	28,0	13	11	85,0	10,5	*50/25*	
	12	**CA 95-M 12**	13,5	28,0	16	14	91,0	13,2	*50/25*	
	16	**CA 95-M 16**	13,5	30,0	20	17	97,0	17,0	*50/25*	
120 RC/S ÷ 150 RC	12	**CA 150 R-M 12**	15,0	31,0	16	14	97,0	13,2	*30/15*	
	14	**CA 150 R-M 14**	15,0	31,0	18	16	101,0	15,0	*30/15*	
120 BR/BS*	12	**CA 120-M 12**	15,0	31,0	16	14	97,0	13,2	*30/15*	
	16	**CA 120-M 16**	15,0	31,0	19	17	103,0	17,0	*30/15*	
150 S ÷ 160 RC	12	**CA 150 S-M 12**	16,5	32,0	16	14	97,0	13,2	*30/15*	
	14	**CA 150 S-M 14**	16,5	32,0	18	16	101,0	15,0	*30/15*	
150 BR/BS*	12	**CA 150-M 12**	16,5	32,0	16	14	97,0	13,2	*30/15*	
	16	**CA 150-M 16**	16,5	32,0	19	17	103,0	17,0	*30/15*	
160 S ÷ 200 RC	14	**CA 200 R-M 14**	17,0	32,5	18	16	101,0	15,0	*30/15*	
185 BR/BS*	12	**CA 185-M 12**	18,0	33,5	16	14	97,0	13,2	*30/15*	
	16	**CA 185-M 16**	18,0	33,5	19	17	103,0	17,0	*30/15*	
200 S ÷ 240 RC	14	**CA 240 R-M 14**	19,2	43,0	18	16	107,0	15,0	*15/5*	
240 S ÷ 315 RC	14	**CA 315 R-M 14**	21,5	43,0	18	16	105,0	15,0	*15/5*	
240 BR/BS*	12	**CA 240-M 12**	20,5	42,0	16	14	103,0	13,2	*15/5*	
	16	**CA 240-M 16**	20,5	42,0	19	17	109,0	17,0	*15/5*	
	20	**CA 240-M 20**	20,5	42,0	22	20	115,0	21,0	*15/5*	
300 BR/BS*	12	**CA 300-M 12**	23,0	43,5	16	14	109,5	13,2	*15/5*	
	16	**CA 300-M 16**	23,0	43,5	19	17	115,5	17,0	*15/5*	
	20	**CA 300-M 20**	23,0	43,5	22	20	121,5	21,0	*15/5*	
315 S	14	**CA 315 S-M 14**	23,7	44,0	18	16	105,0	15,0	*15/5*	
400 R	14	**2 A 80-M 14**	27,0	51,0	22	19	140,0	15,0	*15/5*	
	16	**2 A 80-M 16**	27,0	51,0	22	19	140,0	17,0	*15/5*	
	20	**2 A 80-M 20**	27,0	51,0	24	23	146,0	21,0	*15/5*	
500 R	16	**2 A 100-M 16**	30,3	56,5	22	19	147,0	17,0	*10/5*	
	20	**2 A 100-M 20**	30,3	56,5	24	23	153,0	21,0	*10/5*	
600 R ÷ 630 R	16	**2 A 120-M 16**	33,4	61,5	22	19	159,0	17,0	*20/5*	
	20	**2 A 120-M 20**	33,4	61,5	24	23	165,0	21,0	*20/5*	

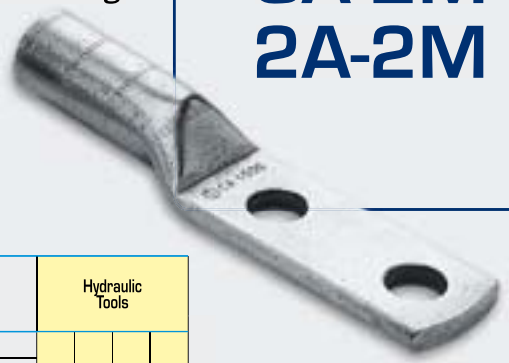
Conductor Format: R = Round, RC = Round Compact, S = Sector, BR = IEC228 (BS6360) Round, BS = IEC228 (BS6360) Sector*
** = Pre-rounding required, consult Cembre for appropriate die set*

HIGH VOLTAGE TERMINALS

CA-2M
2A-2M

two hole fixing



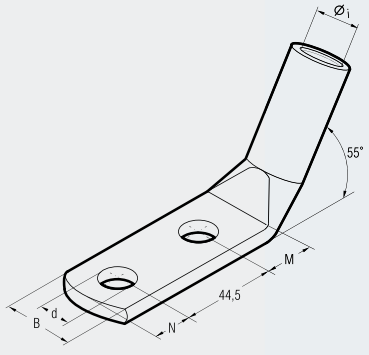


Conductor Size (sqmm) & Format	Ø Stud mm	Ref.	Dimensions mm						Quantity Box/Bag	Hydraulic Tools			
			Øi	B	M	N	L	d					
25 R	8	**CA 25-2 M 8**	6,8	14,0	10	11	113,5	8,4	*200/50*	HT 81-U RHU 81	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D	RHU 520
	12	**CA 25-2 M 12**	6,8	21,0	16	14	122,5	13,2	*150/50*				
25 BR/BS*	8	**CA 25-2 M 8**	6,8	14,0	10	11	113,5	8,4	*200/50*				
	10	**CA 25-2 M 10**	6,8	18,0	13	11	116,5	10,5	*150/50*				
	12	**CA 25-2 M 12**	6,8	21,0	16	14	122,5	13,2	*150/50*				
30 RC/S ÷ 40 S	12	**CA 40 S-2 M 12**	8,2	21,5	16	14	123,5	13,2	*100/50*				
35 BR/BS*	12	**CA 35-2 M 12**	8,25	21,5	16	14	123,5	13,2	*100/50*				
50 RC	12	**CA 50 R-2 M 12**	8,7	20,5	16	14	123,5	13,2	*100/50*				
50 S	12	**CA 50 S-2 M 12**	9,5	21,0	16	14	123,5	13,2	*100/50*				
50 BR/BS*	12	**CA 50-2 M 12**	9,5	21,0	16	14	123,5	13,2	*100/50*				
63 S ÷ 70 S	12	**CA 70 S-2 M 12**	11,0	27,0	16	14	127,7	13,2	*50/25*				
70 BR/BS*	12	**CA 70 S-2 M 12**	11,0	27,0	16	14	127,7	13,2	*50/25*				
80 S ÷ 95 RC	14	**CA 95 R-2 M 14**	12,0	28,0	18	16	139,5	15,0	*30/15*				
95 S ÷ 100 S	14	**CA 95 S-2 M 14**	13,5	29,0	18	16	139,5	15,0	*30/15*				
95 BR/BS*	12	**CA 95-2 M 12**	13,5	28,0	16	14	135,5	13,2	*30/15*				
120 RC/S ÷ 150 RC	14	**CA 150 R-2 M 14**	15,0	31,0	18	16	145,5	15,0	*30/15*				
120 BR/BS*	12	**CA 120-2 M 12**	15,0	31,0	16	14	141,5	13,2	*30/15*				
150 S ÷ 160 RC	14	**CA 150 S-2 M 14**	16,5	32,0	18	16	145,5	15,0	*30/15*				
150 BR/BS*	12	**CA 150-2 M 12**	16,5	32,0	16	14	141,5	13,2	*30/15*				
160 S ÷ 200 RC	14	**CA 200 R-2 M 14**	17,0	32,5	18	16	145,0	15,0	*30/15*				
185 BR/BS*	12	**CA 185-2 M 12**	18,0	32,5	16	14	141,5	13,2	*30/15*				
200 S ÷ 240 RC	14	**CA 240 R-2 M 14**	19,2	43,0	18	16	151,5	15,0	*15/5*				
240 S ÷ 315 RC	14	**CA 315 R-2 M 14**	21,5	43,0	18	16	149,5	15,0	*20/5*				
240 BR/BS*	12	**CA 240-2 M 12**	20,5	43,0	16	14	147,5	13,2	*15/5*				
300 BR/BS*	12	**CA 300-2 M 12**	23,0	43,0	16	14	145,5	13,2	*20/5*				
315 S	14	**CA 315 S-2 M 14**	23,7	44,0	18	16	149,5	15,0	*20/5*				
400 R	12	**2 A 80-2 M 12**	27,0	51,0	20	14	177,5	13,2	*15/5*				
	14	**2 A 80-2 M 14**	27,0	51,0	22	16	181,5	15,0	*15/5*				
	16	**2 A 80-2 M 16**	27,0	51,0	22	19	184,5	17,0	*15/5*				
500 R	14	**2 A 100-2 M 14**	30,3	56,5	22	16	182,5	15,0	*10/5*				
	16	**2 A 100-2 M 16**	30,3	56,5	22	19	185,5	17,0	*10/5*				
600 R ÷ 630 R	14	**2 A 120-2 M 14**	33,4	61,5	22	16	200,5	15,0	*15/5*				
	16	**2 A 120-2 M 16**	33,4	61,5	22	19	202,5	17,0	*15/5*				

Conductor Format: R = Round, RC = Round Compact, S = Sector, BR = IEC228 (BS6360) Round, BS = IEC228 (BS6360) Sector*
** = Pre-rounding required, consult Cembre for appropriate die set*

CA-2M and 2A-2M Copper Tube Terminal Lugs are designed for high voltage applications up to 33kV. Manufactured from high purity copper tube, annealed and tin-plated. The extended barrel enhances electrical and mechanical performance.
The absence of an inspection hole prevents moisture entry into the crimped joint.
Featuring an extended palm with two fixing holes at 44.5mm centres.

2A-2M/55°



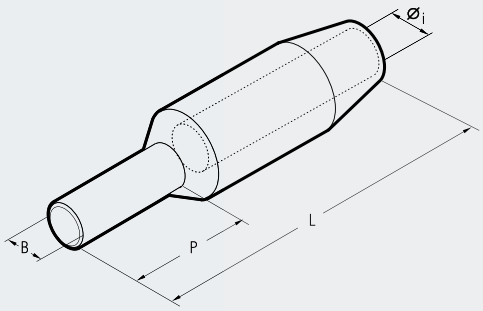
Conductor Size (sqmm) & Format	Ø Stud mm	Ref.	Dimensions mm					Quantity Box/Bag	Hydraulic Tools		
			Øi	B	M	N	d				
400 R	14	**2 A 80 - 2 M 14/55°**	27,0	51,0	22	16	15	*10/5*	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D	RHU 520
600 R ÷ 630 R	14	**2 A 120 - 2 M 14/55°**	33,4	61,5	22	16	15	*15/3*			

Conductor Format: R = Round

The 2A-2M/55° Copper Tube Terminal Lugs have the same characteristics as the CA-2M and 2A-2M ranges, with the additional feature of the palm bent at 55°.

HIGH VOLTAGE STALK CONNECTORS

MT-C



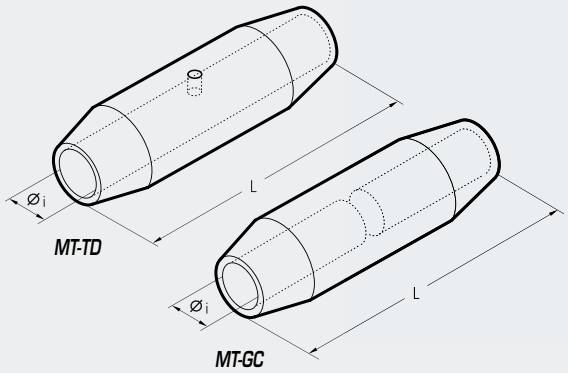
MT-C series connectors are designed for high voltage applications up to 33 kV. They are manufactured from high purity copper, annealed and tin plated.
The extended barrel enhances both electrical and mechanical performance.
The stalk or pin makes these connectors ideal for terminating conductors into contact blocks.

Conductor Size (sqmm) & Format	Ref.	Dimensions mm				Quantity Box/Bag	Hydraulic Tools			
		Øi	B	P	L		HT 81-U RHU 81	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D	RHU 520
25 R	MT 25-C 8	6,8	8	35	80	90/3				
30 RC/S ÷ 40 S	MT 40 S-C 8	8,2	8	35	80	90/3				
	MT 40 S-C 10	8,2	10	35	80	90/3				
	MT 40 S-C 14-80	8,2	14	80	123	30/3				
35 BR/BS*	MT 35-C 8	8,2	8	35	80	90/3				
	MT 35-C 10	8,2	10	35	80	90/3				
	MT 35-C 14-80	8,2	14	80	123	30/3				
50 RC	MT 50 R-C 8	8,8	8	35	80	90/3				
	MT 50 R-C 10	8,8	10	35	80	90/3				
50 S	MT 50 S-C 8	9,5	8	35	80	90/3				
	MT 50 S-C 10	9,5	10	35	80	90/3				
	MT 50 S-C 14-80	9,5	14	80	123	30/3				
50 BR/BS*	MT 50-C 8	9,5	8	35	80	90/3				
	MT 50-C 10	9,2	10	35	80	90/3				
	MT 50-C 14-80	9,5	14	80	123	90/3				
63 S ÷ 70 S	MT 70 S-C 10	11,2	10	35	90	30/3				
70 BR/BS*	MT 70-C 10	11,2	10	35	90	30/3				
80 S ÷ 95 RC	MT 95 R-C 10	12,0	10	45	110	60/3				
	MT 95 R-C 12	12,0	12	45	110	60/3				
95 S ÷ 100 S	MT 95 S-C 10	13,5	10	45	110	60/3				
	MT 95 S-C 12	13,5	12	45	110	60/3				
	MT 95 S-C 14-80	13,5	14	80	145	60/3				
95 BR/BS*	MT 95-C 10	13,5	10	45	110	60/3				
	MT 95-C 12	13,5	12	45	110	60/3				
	MT 95-C 14-80	13,5	14	80	145	60/3				
120 RC/S ÷ 150 RC	MT 150 R-C 12	15,0	12	45	110	60/3				
	MT 150 R-C 16	15,0	16	45	110	30/3				
120 BR/BS*	MT 120-C 12	15,0	12	45	110	60/3				
	MT 120-C 16	15,0	16	45	110	60/3				
150 S ÷ 160 RC	MT 150 S-C 12	16,5	12	45	110	60/3				
	MT 150 S-C 14-80	16,5	14	80	145	45/3				
	MT 150 S-C 16	16,5	16	45	110	60/3				
150 BR/BS*	MT 150-C 10	16,5	10	45	110	60/3				
	MT 150-C 12	16,5	12	45	110	60/3				
	MT 150-C 14-80	16,5	14	80	145	45/3				
	MT 150-C 16	16,5	16	45	110	60/3				
160 S ÷ 200 RC	MT 200 R-C 10	17,0	10	45	110	30/3				
	MT 200 R-C 16	17,0	16	45	110	30/3				
185 BR/BS*	MT 185-C 10	18,0	10	45	110	30/3				
	MT 185-C 16	18,0	16	45	110	30/3				
200 S ÷ 240 RC	MT 240 R-C 12	19,5	12	50	115	30/3				
	MT 240 R-C 16	19,5	16	50	115	30/3				
240 S ÷ 315 RC	MT 315 R-C 16	21,5	16	50	115	30/3				
240 BR/BS*	MT 240-C 12	20,5	12	45	110	30/3				
	MT 240-C 16	20,5	16	50	115	30/3				
300 BR/BS*	MT 300-C 16	23,0	16	50	115	30/3				
315 S	MT 315 S-C 16	24,0	16	60	130	30/3				

Conductor Format: R = Round, RC = Round Compact, S = Sector, BR = IEC228 (BS6360) Round, BS = IEC228 (BS6360) Sector*
** = Pre-rounding required, consult Cembre for appropriate die set*

HIGH VOLTAGE COPPER THROUGH CONNECTORS

MT-TD
MT-GC

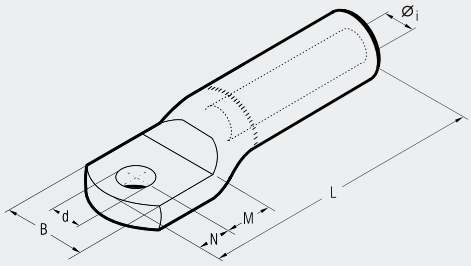


Conductor Size (sqmm) & Format	Ref.	Ref.	Dimensions mm		Quantity Box/Bag	Hydraulic Tools			
			Øi	L		HT 81-U RHU 81	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D	RHU 520
25 R/BR/BS*	**MT 25-TD**	**MT 25-GC**	6,8	60	*90/3*	●	●	●	●
30 RC/S ÷ 40 S	**MT 40 S-TD**	**MT 40 S-GC**	8,2	60	*90/3*	●	●	●	●
30 BR/BS*	**MT 35-TD**	**MT 35-GC**	8,2	60	*90/3*	●	●	●	●
50 RC	**MT 50 R-TD**	**MT 50 R-GC**	8,7	60	*90/3*	●	●	●	●
50 S	**MT 50 S-TD**	**MT 50 S-GC**	9,5	60	*90/3*	●	●	●	●
50 BR/BS*	**MT 50-TD**	**MT 50-GC**	9,5	60	*90/3*	●	●	●	●
63 S ÷ 70 S	**MT 70 S-TD**	**MT 70 S-GC**	11,0	70	*30/3*	●	●	●	●
70 BR/BS*	**MT 70-TD**	**MT 70-GC**	11,0	70	*30/3*	●	●	●	●
80 S ÷ 95 RC	**MT 95 R-TD**	**MT 95 R-GC**	12,0	80	*30/3*	●	●	●	●
95 S ÷ 100 S	**MT 95 S-TD**	**MT 95 S-GC**	13,5	80	*30/3*	●	●	●	●
95 BR/BS*	**MT 95-TD**	**MT 95-GC**	13,5	80	*30/3*	●	●	●	●
120 RC/S ÷ 150 RC	**MT 150 R-TD**	**MT 150 R-GC**	15,0	80	*30/3*	●	●	●	●
120 BR/BS*	**MT 120-TD**	**MT 120-GC**	15,0	80	*30/3*	●	●	●	●
150 S ÷ 160 RC	**MT 150 S-TD**	**MT 150 S-GC**	16,5	80	*21/3*	●	●	●	●
150 BR/BS*	**MT 150-TD**	**MT 150-GC**	16,5	80	*30/3*	●	●	●	●
160 S ÷ 200 RC	**MT 200 R-TD**	**MT 200 R-GC**	17,0	100	*30/3*	●	●	●	●
185 BR/BS*	**MT 185-TD**	**MT 185-GC**	18,0	100	*30/3*	●	●	●	●
200 S ÷ 240 RC	**MT 240 R-TD**	**MT 240 R-GC**	19,2	100	*30/3*		●	●	●
240 S ÷ 315 RC	**MT 315 R-TD**	**MT 315 R-GC**	21,5	100	*30/3*		●	●	●
240 BR/BS*	**MT 240-TD**	**MT 240-GC**	20,5	100	*30/3*		●	●	●
300 BR/BS*	**MT 300-TD**	**MT 300-GC**	23,0	100	*30/3*		●	●	●
315 S	**MT 315 S-TD**	**MT 315 S-GC**	23,7	100	*30/3*		●	●	●
400 BR/BS*	**MT 400-TD**	**MT 400-GC**	27,0	120	*15/3*		●	●	●
500 R	**MT 500-TD**		30,3	118	*15/3*			●	●
600 R ÷ 630 R	**MT 630-TD**		33,4	130	*9/3*			●	●

Conductor Format: R = Round, RC = Round Compact, S = Sector, BR = IEC228 (BS6360) Round, BS = IEC228 (BS6360) Sector*
** = Pre-rounding required, consult Cembre for appropriate die set*

MT-TD and MT-GC series connectors are designed to join conductors in high voltage applications up to 33 kV.
They are manufactured from high purity copper, annealed and tin plated.
MT-GC series feature a solid stop which forms a barrier between the two conductors being joined, this prevents the migration of oils or greases, which may be present, in one cable contaminating the other cable.
MT-TD connectors are unblocked and are suitable for joining cables of the same type.

AA-M



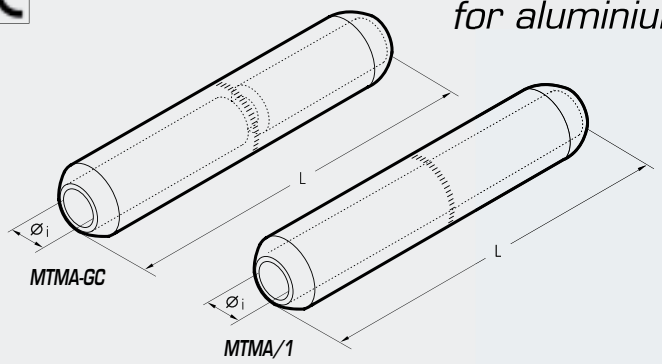
AA-M series terminals are made from aluminium of a purity equal to or greater than 99,5%.
They are designed to accept a variety of conductor forms especially low stranded compacted conductors.
Non circular conductors may require pre-rounding prior to introduction to the terminal.
Barrels are capped and filled with grease so as to avoid oxidation of the aluminium.

Conductor Size sqmm	Ø Stud mm	Ref.	Dimensions mm						Quantity Box/Bag	Hydraulic Tools
			Øi	B	M	N	L	d		
16	8	**AA 16-M 8**	5,5	21	13	11	77,0	8,4	*60/3*	HT 131-UC RHU 131-C B 131-UC
25	8	**AA 25-M 8**	6,5	21	13	11	77,0	8,4	*60/3*	
35	8	**AA 35-M 8**	8,0	23	13	11	77,5	8,4	*60/3*	
	10	**AA 35-M 10**	8,0	23	13	11	77,5	10,5	*60/3*	
50	12	**AA 50-M 12**	9,0	26	16	14	91,0	13,2	*60/3*	
	14	**AA 50-M 14**	9,0	26	18	16	95,0	15,0	*60/3*	
70	12	**AA 70-M 12**	11,0	27	16	14	91,0	13,2	*45/3*	
	14	**AA 70-M 14**	11,0	27	18	16	95,0	15,0	*45/3*	
95	12	**AA 95-M 12**	12,5	27	16	14	91,0	13,2	*45/3*	
	14	**AA 95-M 14**	12,5	27	18	16	95,0	15,0	*45/3*	
120	12	**AA 120-M 12**	13,7	35	16	14	115,0	13,2	*30/3*	
	14	**AA 120-M 14**	13,7	35	18	16	119,0	15,0	*30/3*	
150	12	**AA 150-M 12**	15,5	34	16	14	115,0	13,2	*30/3*	
	14	**AA 150-M 14**	15,5	34	18	16	119,0	15,0	*30/3*	
185	12	**AA 185-M 12**	17,0	42	20	14	122,0	13,2	*18/3*	
	14	**AA 185-M 14**	17,0	42	22	16	126,0	15,0	*18/3*	
240	12	**AA 240-M 12**	19,5	44	20	14	122,0	13,2	*15/3*	
	14	**AA 240-M 14**	19,5	44	22	16	126,0	15,0	*15/3*	
300	12	**AA 300-34-M 12**	22,5	47	22	14	130,0	13,2	*15/3*	

THROUGH CONNECTORS

for aluminium conductors

MTMA-GC
MTMA/1



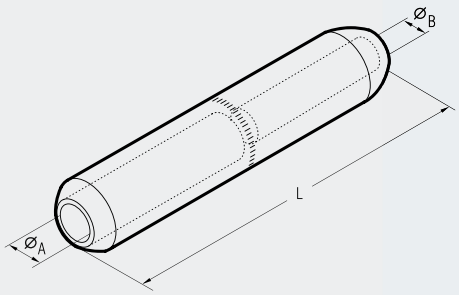
Conductor Size sqmm	Ref.	Ref.	Dimensions mm Øi	Dimensions mm L	Quantity Box/Bag	Hydraulic Tools
10	MTMA 10-GC		4,3	90,5	60/3	HT 131-UC RHU 131-C B 131-UC
16	MTMA 16-GC	MTMA 16/1	5,5	90,5	60/3	
25	MTMA 25-GC	MTMA 25/1	6,5	90,5	60/3	
35	MTMA 35-GC	MTMA 35/1	8,0	90,5	60/3	
50	MTMA 50-GC	MTMA 50/1	9,0	106,5	30/3	
70	MTMA 70-GC	MTMA 70/1	11,0	106,5	30/3	
95	MTMA 95-GC		12,5	110,0	30/3	
		MTMA 95/1	12,5	106,5	30/3	
120	MTMA 120-GC	MTMA 120/1	13,7	133,0	30/3	
150	MTMA 150-GC		15,5	135,0	30/3	
		MTMA 150/1	15,5	133,5	30/3	
185	MTMA 185-GC	MTMA 185/1	17,0	143,5	15/3	
240	MTMA 240-GC	MTMA 240/1	19,5	143,5	15/3	
300	MTMAD 300-GC		22,5	144,5	15/3	
		MTMAD 300/1	22,5	135,0	50	

MTMA-GC series through connectors are made from aluminium of a purity equal to or greater than 99,5%. They feature a solid stop which creates a barrier between the two sides of conductors to be joined.
Barrels are capped and filled with grease so as to avoid oxidation of the connector.
MTMA/1 series through connectors are unblocked and are suitable for joining cables of the same type.

REDUCER THROUGH CONNECTORS

for aluminium conductors

MTMA-GC



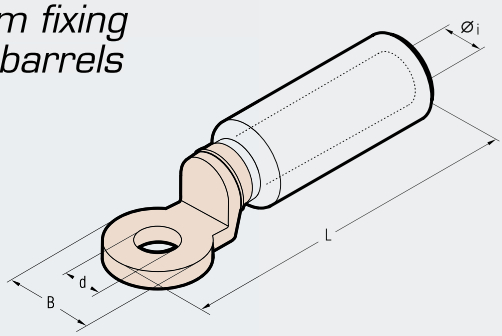
Conductor Size sqmm Side A Al	Side B Al/Cu	Ref.	Dimensions mm ØA	Dimensions mm ØB	Dimensions mm L	Quantity Box/Bag	Hydraulic Tools
16	10	MTMA 16-10-GC	5,5	4,3	90,5	60/3	HT 131-UC RHU 131-C B 131-UC
25	10	MTMA 25-10-GC	6,5	4,3	90,5	60/3	
	16	MTMA 25-16-GC	6,5	5,5	90,5	60/3	
50	25	MTMA 50-25-GC	9,0	6,5	106,5	30/3	
	35	MTMA 50-35-GC	9,0	8,0	106,5	30/3	
70	35	MTMA 70-35-GC	11,0	8,0	106,5	30/3	
	50	MTMA 70-50-GC	11,0	9,0	106,5	30/3	
95	50	MTMA 95-50-GC	12,5	9,0	109,4	30/3	
	70	MTMA 95-70-GC	12,5	11,0	106,5	30/3	
120	70	MTMA 120-70-GC	13,7	11,0	133,0	30/3	
	95	MTMA 120-95-GC	13,7	12,5	133,0	30/3	
150	70	MTMA 150-70-GC	15,5	11,0	133,0	30/3	
	95	MTMA 150-95-GC	15,5	12,5	134,4	30/3	
	120	MTMA 150-120-GC	15,5	13,7	133,0	30/3	
185	120	MTMA 185-120-GC	17,0	13,7	143,5	15/3	
	150	MTMA 185-150-GC	17,0	15,5	143,5	15/3	
240	150	MTMA 240-150-GC	19,5	15,5	145,6	15/3	
	185	MTMA 240-185-GC	19,5	17,0	143,5	15/3	
300	185	MTMAD 300-185-GC	22,5	17,0	144,5	15/3	
	240	MTMAD 300-240-GC	22,5	19,5	144,5	15/3	

Reducer connectors are manufactured to the same construction as series MTMA-GC.
If used to join an aluminium conductor to a copper conductor care should be taken to ensure that the joint is sealed against outside elements which would cause oxidation.

BIMETALLIC CONNECTORS

CAA-M

copper palm fixing
aluminium barrels



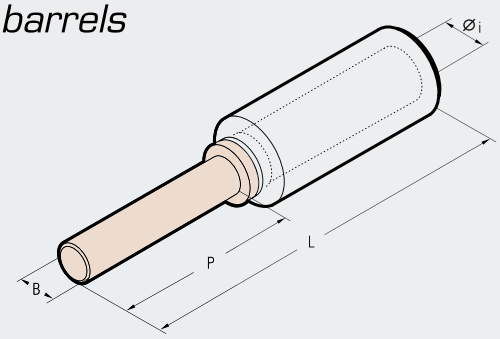
The barrel of series CAA-M connectors are made from aluminium of a purity equal to or greater than 99,5%. The barrel is friction welded to the palm thus achieving the best possible transition between the copper palm and aluminium barrel.
Barrels are capped and filled with grease so as to avoid oxidation of the aluminium.

Conductor Size sqmm	Ø Stud mm	Ref.	Dimensions mm				Quantity Box/Bag	Hydraulic Tools
			Øi	B	L	d		
10	12	**CAA 10-M 12**	4,3	24	87	13	*90/3*	HT 131-UC RHU 131-C B 131-UC
16	12	**CAA 16-M 12**	5,5	24	87	13	*90/3*	
25	12	**CAA 25-M 12**	6,5	24	87	13	*90/3*	
35	12	**CAA 35-M 12**	8,0	24	87	13	*90/3*	
50	12	**CAA 50-M 12**	9,0	24	87	13	*60/3*	
70	12	**CAA 70-M 12**	11,0	24	87	13	*60/3*	
95	12	**CAA 95-M 12**	12,5	24	87	13	*60/3*	
120	12	**CAA 120-M 12**	13,7	31	111	13	*30/3*	
150	12	**CAA 150-M 12**	15,5	31	111	13	*30/3*	
185	12	**CAA 185-M 12**	17,0	35	116	13	*24/3*	
240	12	**CAA 240-M 12**	19,5	35	116	13	*18/3*	
300	12	**CAA 300-34-M 12**	22,5	35	120	13	*15/3*	

BIMETALLIC CONNECTORS

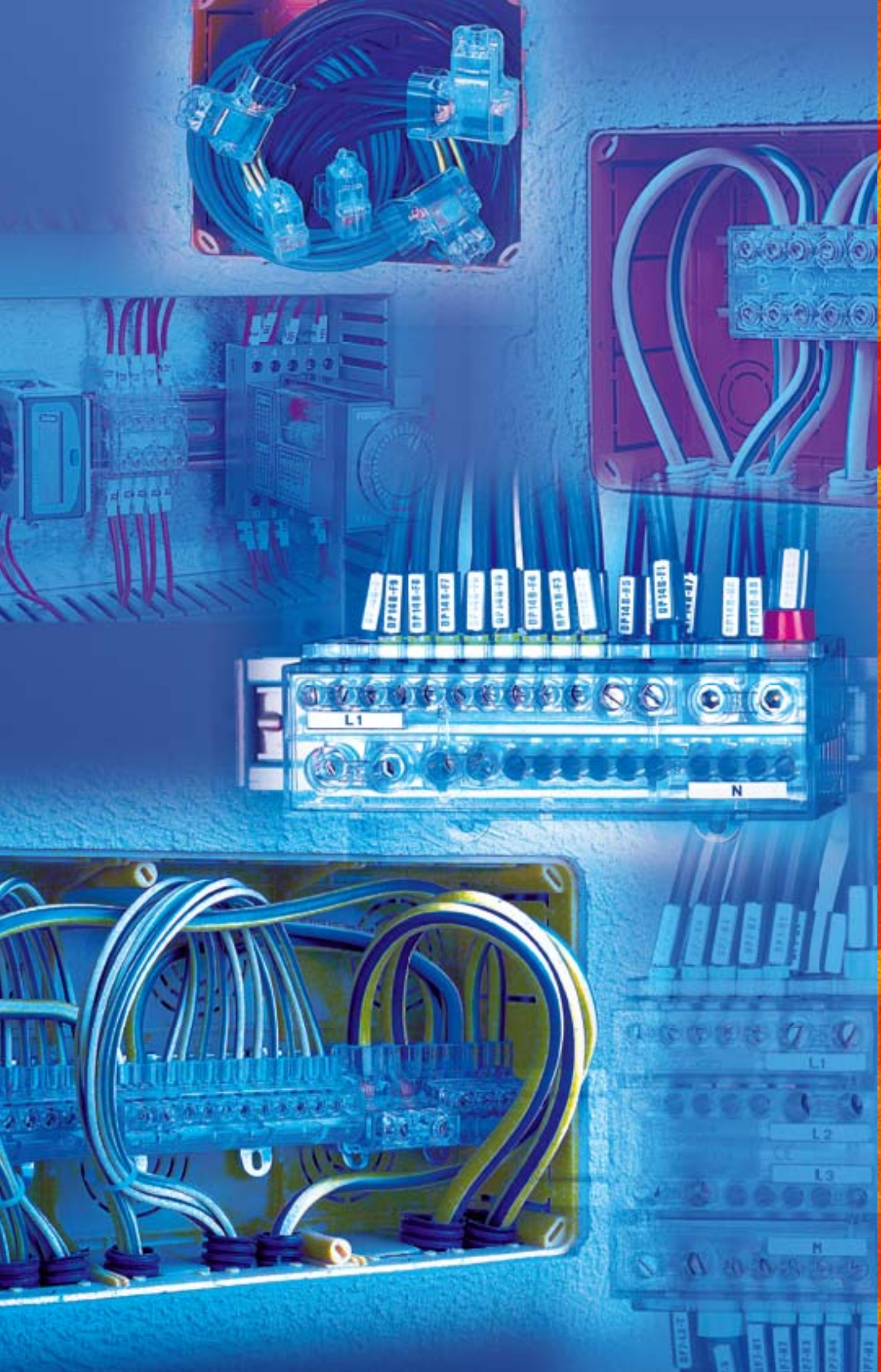
MTA-C

copper pin
aluminium barrels



The barrel of series MTA-C connectors are made from aluminium of a purity equal to or greater than 99,5%. The barrel is friction welded to the pin thus achieving the best possible transition between the copper pin and aluminium barrel.
Barrels are capped and filled with grease so as to avoid oxidation of the aluminium.

Conductor Size sqmm	Ref.	Dimensions mm				Quantity Box/Bag	Hydraulic Tools
		Øi	B	P	L		
16	**MTA 16-C**	5,5	8	30	82	*90/3*	HT 131-UC RHU 131-C B 131-UC
25	**MTA 25-C**	6,5	8	30	82	*90/3*	
35	**MTA 35-C**	8,0	8	30	82	*90/3*	
50	**MTA 50-C**	9,0	12	45	97	*60/3*	
70	**MTA 70-C**	11,0	12	45	97	*60/3*	
95	**MTA 95-C**	12,5	12	45	97	*60/3*	
120	**MTA 120-C**	13,7	14	55	125	*30/3*	
150	**MTA 150-C**	15,5	14	55	125	*30/3*	
185	**MTA 185-C**	17,0	14	55	125	*24/3*	
240	**MTA 240-C**	19,5	14	55	125	*24/3*	



TERMINAL BLOCKS

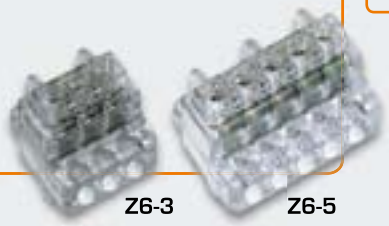
SINGLE POLE TERMINAL BLOCKS

type ZETApiù®

Z6

indirect clamping

nominal section 6 sqmm



Z6-3 Z6-5

Z6-6 Z6-10

The "Z...D" version has been designed for mounting on DIN rails

3, 5, 6 and 10 way, single pole terminal blocks for conductor section 1 to 6 sqmm.
Self contained and robust, they are quick and easy to install for both industrial and domestic use.
The indirect clamping of the "ZETApiù" terminal blocks guarantees a low and stable contact resistance.
Indirect clamping eliminates damage to the conductor strands.
The easy-entry receptacles also grant a fast and reliable insertion of the cable.

Ref.	No. of Ways	Connecting Capacity sqmm	Nominal Voltage V	Maximum Operating Temperature °C	Insulation Specification	Self Extinguishing Specification	Dimensions mm	Weight g	Quantity
Z6-3	3	*(3 way)* 1÷6	450	85	IP 20	V-0 (UL 94)	23x23xh27,5	15	*30*
Z6-3D							23x40xh36,5	18,5	*10*
Z6-5	5	*(5 way)* 1÷6	450	85	IP 20	V-0 (UL 94)	35x23xh27,5	23	*20*
Z6-5D							35x40xh36,5	26,5	*10*
Z6-6	6	*(6 way)* 1÷6	450	85	IP 20	V-0 (UL 94)	23x43xh28,5	26	*15*
Z6-6D							23x53xh34	31	*10*
Z6-10	10	*(10 way)* 1÷6	450	85	IP 20	V-0 (UL 94)	35x43xh28,5	41	*10*
Z6-10D							35x53xh33	46	*15*

D= Version with clamp for DIN rail

Technical features:

- ***Self-extinguishing polycarbonate body***
- ***Tempered steel clamps***
- ***Electrolyticaly tin plated copper connection plate***

SINGLE POLE TERMINAL BLOCKS

type ZETApiù®

Z16

indirect clamping

nominal section 16 sqmm

Z16-3 Z16-4

Z16-5N Z16-8 Z16-12

3, 4, 5, 8 and 12 way, single pole terminal blocks.
Ideal for use as an equipotential bonding connector for both industrial and domestic use.

Ref.	No. of Ways	Connecting Capacity sqmm	Nominal Voltage V	Maximum Operating Temperature °C	Insulation Specification	Self Extinguishing Specification	Dimensions mm	Weight g	Quantity
Z16-3	3	16	450	85	IP 20	V-0 (UL 94)	38x31,3xh38	52	*20*
Z16-3D							38x50xh44	55,5	*15*
Z16-4	4	16	450	85	IP 20	V-0 (UL 94)	27x54xh37	50	*15*
Z16-4D							27x58xh43	54	*10*
Z16-5N	5	16	450	85	IP 20	V-0 (UL 94)	61x31,5xh38	64,5	*10*
Z16-5ND							61x50xh44	68	*4*
Z16-8	8 *(2÷6)*	*(2 way)* 16 + *(6 way)* 6	450	85	IP 20	V-0 (UL 94)	35,5x50xh36,5	50	*15*
Z16-8D							35,5x57xh42	56	*10*
Z16-12	12 *(2÷10)*	*(2 way)* 16 + *(10 way)* 6	450	85	IP 20	V-0 (UL 94)	104,5x32,5xh36,5	115	*8*
Z16-12D							104,5x50xh42	125	*5*

D= Version with clamp for DIN rail

type ZETApiù®

SINGLE POLE TERMINAL BLOCKS

indirect clamping

nominal section 35 sqmm

Z35

Z35-3

Z35-4

Z35-6

Ref.	No. of Ways	Connecting Capacity sqmm	Nominal Voltage V	Maximum Operating Temperature °C	Insulation Specification	Self Extinguishing Specification	Dimensions mm	Weight g	*Quantity*
Z35-3	3	35	450	85	IP 20	V-0 (UL 94)	53x48,5xh47	110	*10*
Z35-3D							53x54xh56	114	*5*
Z35-4	4	35	450	85	IP 20	V-0 (UL 94)	37x85xh42	129	*5*
Z35-4D							37x85xh48	133	*5*
Z35-6	6 (2+4)	*(2 way)* 35 + *(4 way)* 16	450	85	IP 20	V-0 (UL 94)	83x41xh43	130	*8*
Z35-6D							83x49xh52	140	*5*

D= Version with clamp for DIN rail

3, 4 and 6 way, single pole terminal blocks. Ideal for use as an equipotential bonding connector for both industrial and domestic use.

type ZETApiù®

SINGLE POLE TERMINAL BLOCKS

indirect clamping

for earthing applications ⏚

Z35
Z50

Z50-10D

Z35T-11

Z35-26D

Ref.	No. of Ways	Connecting Capacity sqmm	Maximum Operating Temperature °C	Self Extinguishing Specification	Dimensions mm	Weight g	*Quantity*
Z35T-11	11 (1+10)	*(1 way)* 35 + *(10 way)* 6	85	V-0 (UL 94)	58x43xh42	70	*10*
Z35-26D	26 (2+24)	*(2 way)* 35 + *(24 way)* 10	85	V-0 (UL 94)	151x50xh50	379	*4*
Z50-10D	10 (2+8)	*(2 way)* 50 + *(8 way)* 25	85	V-0 (UL 94)	77,5x55xh49	320	*6*

D= Version with clamp for DIN rail

10, 11 and 26 way, single pole terminal blocks.
Ideal for use as an equipotential bonding connector for both industrial and domestic use.

CONNECTING CAPACITY OF TERMINAL BLOCKS

TERMINAL BLOCKS TYPE "ZETApiù"

TYPE	NOMINAL SECTION	No. OF WAYS X NOMINAL SECTION	CONNECTING CAPACITY OF EACH WAY* No. of Conductors x Section	MARKINGS
Z6-3 Z6-3D	6 mm²	3 x 6 mm²	1 x 6 mm² R/F 1 x 4 mm² R/F 1÷2 x 2,5 mm² R/F 1÷2 x 1,5 mm² R/F 1÷4 x 1 mm² R/F	CE, 6 sqmm 450 V T 85°C, TÜV,
Z6-5 Z6-5D	6 mm²	5 x 6 mm²		
Z6-6 Z6-6D	6 mm²	6 x 6 mm²		CE, 6 sqmm 450 V T 85°C
Z6-10 Z6-10D	6 mm²	10 x 6 mm²		
Z16-3 Z16-3D	16 mm²	3 x 16 mm²	1 x 16 mm² R/F 1 x 10 mm² R/F 1÷2 x 6 mm² R/F 1÷3 x 4 mm² R/F 1÷4 x 2,5 mm² R/F 1÷8 x 1,5 mm² R/F	CE, 16 sqmm 450 V T 85°C, TÜV,
Z16-4 Z16-4D	16 mm²	4 x 16 mm²	1 x 16 mm² F 1 x 10 mm² F 1÷2 x 6 mm² F 1÷3 x 4 mm² F 1÷4 x 2,5 mm² F 1÷8 x 1,5 mm² F	CE, 16 sqmm 450 V T 85°C
Z16-5N Z16-5ND	16 mm²	5 x 16 mm²	1 x 16 mm² R/F 1 x 10 mm² R/F 1÷2 x 6 mm² R/F 1÷3 x 4 mm² R/F 1÷4 x 2,5 mm² R/F 1÷8 x 1,5 mm² R/F	CE, 16 sqmm 450 V T 85°C
Z16-8 Z16-8D	16 mm²/6 mm²	2 x 16 mm²	1 x 16 mm² R/F 1 x 10 mm² R/F 1÷2 x 6 mm² R/F 1÷3 x 4 mm² R/F 1÷4 x 2,5 mm² R/F 1÷8 x 1,5 mm² R/F	CE, 16÷6 sqmm 450 V T 85°C
		6 x 6 mm²	1 x 6 mm² R/F 1 x 4 mm² R/F 1÷2 x 2,5 mm² R/F 1÷2 x 1,5 mm² R/F 1÷4 x 1 mm² R/F	
Z16-12 Z16-12D	16 mm²/6 mm²	2 x 16 mm²	1 x 16 mm² F 1 x 10 mm² F 1÷2 x 6 mm² F 1÷3 x 4 mm² F 1÷4 x 2,5 mm² F	CE, 16÷6 sqmm 450 V T 85°C
		10 x 6 mm²	1 x 6 mm² F 1 x 4 mm² F 1÷2 x 2,5 mm² F 1÷2 x 1,5 mm² F 1÷4 x 1 mm² F	

**Various cable sizes may be connected to the terminal block provided that the sum of cable sections is less than the nominal section.*

R = Rigid cable F = Flexible cable

CONNECTING CAPACITY OF TERMINAL BLOCKS

TERMINAL BLOCKS TYPE "ZETApiù"

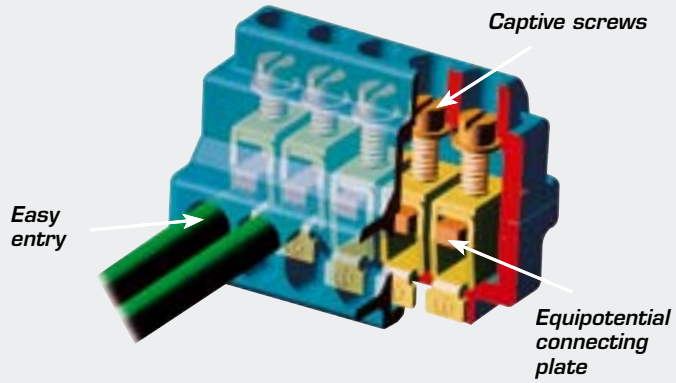
TYPE	NOMINAL SECTION	No. OF WAYS X NOMINAL SECTION	CONNECTING CAPACITY OF EACH WAY* No. of Conductors x Section	MARKINGS
Z35-3 Z35-3D	35 mm²	3 x 35 mm²	1 x 35 mm² R/F 1 x 25 mm² R/F 1÷2 x 16 mm² R/F 1÷3 x 10 mm² R/F 1÷5 x 6 mm² R/F	CE, 35 sqmm 450 V T 85°C
Z35-4 Z35-4D	35 mm²	4 x 35 mm²	1 x 35 mm² F 1 x 25 mm² F 1÷2 x 16 mm² F 1÷3 x 10 mm² F 1÷6 x 6 mm² F	CE, 35 sqmm 450 V T 85°C
Z35-6 Z35-6D	35 mm²/16 mm²	2 x 35 mm²	1 x 35 mm² R/F 1 x 25 mm² R/F 1÷2 x 16 mm² R/F 1÷3 x 10 mm² R/F 1÷6 x 6 mm² F	CE, 35÷16 sqmm 450 V T 85°C, LR, RINA
		4 x 16 mm²	1 x 16 mm² R/F 1 x 10 mm² R/F 1÷2 x 6 mm² R/F 1÷3 x 4 mm² R/F 1÷5 x 2,5 mm² F	
Z35T-11	35 mm²/6 mm²	1 x 35 mm²	1 x 35 mm² R/F 1 x 25 mm² R/F 1 x 16 mm² R/F 1 x 10 mm² R/F	CE, 35÷6 sqmm T 85°C
		10 x 6 mm²	1 x 6 mm² R/F 1 x 4 mm² R/F 1÷2 x 2,5 mm² R/F 1÷2 x 1,5 mm² R/F 1÷4 x 1 mm² R/F	
Z35-26D	35 mm²/10 mm²	2 x 35 mm²	1 x 35 mm² R/F 1 x 25 mm² R/F 1÷2 x 16 mm² R/F 1÷3 x 10 mm² R/F 1÷6 x 6 mm² R/F	CE, 35÷10 sqmm T 85°C, LR, RINA
		24 x 10 mm²	1 x 10 mm² R/F 1 x 6 mm² R/F 1÷2 x 4 mm² R/F 1÷4 x 2,5 mm² R/F	
Z50-10D	50 mm²/25 mm²	2 x 50 mm²	1 x 50 mm² R/F 1 x 35 mm² R/F 1÷2 x 25 mm² R/F 1÷4 x 16 mm² R/F	CE, **, 50÷25 sqmm T 85°C
		8 x 25 mm²	1 x 25 mm² R/F 1÷2 x 16 mm² R/F 1÷3 x 10 mm² R/F 1÷6 x 6 mm² R/F 1÷9 x 4 mm² R/F	

*Various cable sizes may be connected to the terminal block provided that the sum of cable sections is less than the nominal section.

R = Rigid cable F = Flexible cable

MARKINGS:

- CE *Directives 2006/95/CE*
- *EN 60998-1: 1993-08 + A1:2001 and EN 60998-2-1: 1993-08 Norms*
- *Lloyd's Register of Shipping type approval*
- *Registro Italiano Navale type approval*
- ** *EN 60947-7-1: 2002 and EN 60947-7-2: 2002 Norms*



POWER DISTRIBUTION BLOCK

type ZETAblock®

Z-DP

indirect clamping

FOUR POLE 100 A

Z 25-DP7-100

TWO POLE 125 A

Z 35-DP14B-125

Z 50-DP12-160

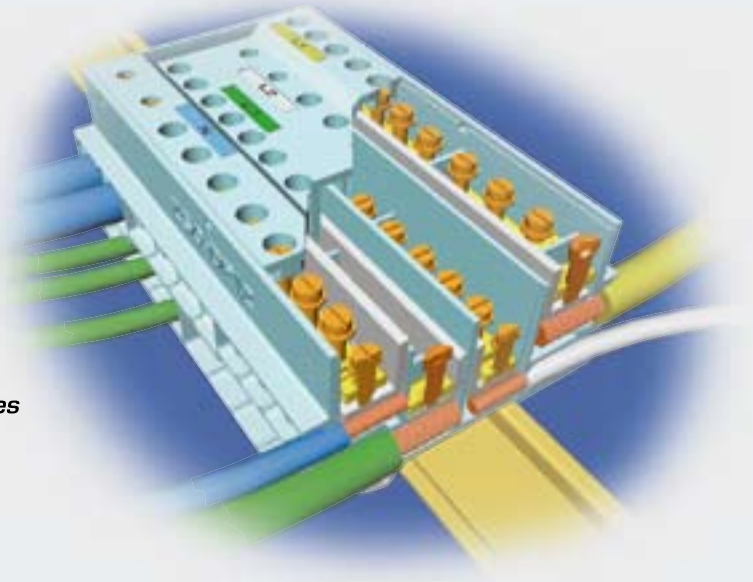
FOUR POLE 125 A

Z 35-DP14-125

FOUR POLE 160 A

100, 125 and 160A, 2–4 pole distribution blocks with 7, 14 and 12 ways per pole respectively.
Accepting a wide cable CSA range (1 - 50 sqmm) and of compact size, ZETAblocks are ideal for control cabinets and distribution panels.
The lateral arrangement of terminals on upper and lower faces (Z35-DP14B one face only), simplifies connection and promotes tidy, homogeneous cable routing to assist subsequent wiring operations.
Easy entry apertures provide quick, effective cable insertion while the indirect clamping feature eliminates damage to cable strands and assures a low, stable contact resistance.

Ref.	No. of poles	No. of Ways per pole	Nominal CSA for each pole sqmm	Maximum operating voltage Ui	Impulse voltage Uimp	Maximum operating current In	Allowable short duration fault current Icw	Maximum allowed peak fault current Ipk	Self Extinguishing Specification	Dimensions mm	Weight g	Qty
Z 25-DP7-100	4	7 (2+5)	(2 way) 25 + (5 way) 6	800 V	8 kV	100 A	3 kA	18 kA	V-0 (UL 94)	70x84xh45	290	2
Z 35-DP14-125	4	14 (2+2+10)	(2 way) 35 + (2 way) 16 + (10 way) 6	800 V	8 kV	125 A	4,2 kA	18 kA	V-0 (UL 94)	137x83xh46	700	1
Z 35-DP14B-125	2	14 (2+2+10)	(2 way) 35 + (2 way) 16 + (10 way) 6	800 V	8 kV	125 A	4,2 kA	18 kA	V-0 (UL 94)	137x44xh46	360	2
Z 50-DP12-160	4	12 (2+4+6)	(2 way) 50 + (4 way) 25 + (6 way) 16	800 V	8 kV	160 A	6 kA	18 kA	V-0 (UL 94)	150x84xh48	780	1



Technical features:

- ***Self extinguishing antishock polycarbonate body***
- ***Tempered steel captive clamping screws and plates***
- ***Electrolyticaly tin plated copper connection plate***

type ZETA*block*®

POWER DISTRIBUTION BLOCK

indirect clamping

Z-DP

CONNECTING CAPACITY OF POWER DISTRIBUTION BLOCK

POWER DISTRIBUTION BLOCK TYPE "ZETA*block*"

TYPE	NOMINAL SECTION	No. OF WAYS x NOMINAL SECTION	CONNECTING CAPACITY OF EACH WAY No. of Conductors x Section	MARKINGS
Z25-DP7-100	25²/6²	2 x 25²	1 x 25² F 1 x 16² F 1÷2 x 10² F	CE 25÷6 sqmm
		5 x 6²	1 x 6² F 1 x 4² F 1÷2 x 2,5² F 1÷2 x 1,5² F 1÷4 x 1² F	
Z35-DP14-125 Z35-DP14B-125	35²/16²/6²	2 x 35²	1 x 35² F 1 x 25² F 1÷2 x 16² F 1÷3 x 10² F	CE 35÷16÷6 sqmm
		2 x 16²	1 x 16² F 1 x 10² F 1÷2 x 6² F 1÷3 x 4² F 1÷4 x 2,5² F	
		10 x 6²	1 x 6² F 1 x 4² F 1÷2 x 2,5² F 1÷2 x 1,5² F 1÷4 x 1² F	
Z50-DP12-160	50²/25²/16²	2 x 50²	1 x 50² F 1 x 35² F 1÷2 x 25² F	CE 50÷25÷16 sqmm
		4 x 25²	1 x 25² F 1 x 16² F 1÷2 x 10² F	
		6 x 16²	1 x 16² F 1 x 10² F 1÷2 x 6² F	

F = Flexible cable

MARKINGS: CE *Directives 2006/95/CE*

EN 60947-7-1: 2002 and EN 60947-7-2: 2002 Norms

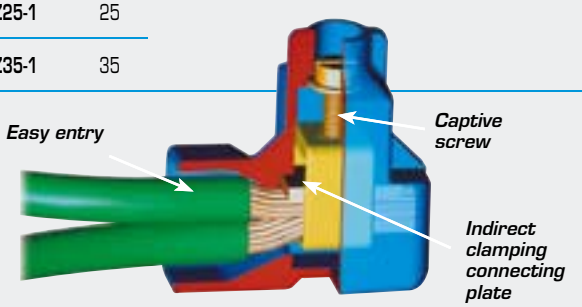
ONE WAY TERMINAL BLOCKS

type ZETAmini®

Z-1

indirect clamping

Ref.	Connecting Capacity sqmm	Nominal Voltage V	Maximum Operating Temperature °C	Insulation Specification	Self Extinguishing Specification	Dimensions mm	Weight g	*Quantity Box/Bag*
Z2,5-1	2,5	450	85	IP 20	V-0 (UL 94)	7,6x20xh23,5	3	*500/25*
Z6-1	6					11,5x28xh29	6	*250/25*
Z10-1	10					15,6x32xh32,5	11	*100/10*
Z16-1	16					18x34xh38	15	*100/10*
Z25-1	25					20,8x42,5xh43,5	29	*50/10*
Z35-1	35					25x45xh51,5	37	*40/10*



Technical features:

- ***Self-extinguishing polycarbonate body***
- ***Electrolytically zinc plated, tempered steel clamp and screw***
- ***Electrolytically tin plated steel connection plate***

One way, single pole terminal blocks for conductors sections from 0.5 to 35 sqmm. Self contained and robust, they are ideal for the fast and safe installation for industrial and domestic applications.

The indirect clamping of the "ZETAmini" terminal blocks guarantees a low and stable contact resistance.

The easy-entry receptacle also grants a fast and reliable insertion of the cable.

CONNECTING CAPACITY OF TERMINAL BLOCKS

TERMINAL BLOCKS TYPE "ZETAmini"

TYPE	NOMINAL SECTION	CONNECTING CAPACITY * No. of Conductors x Section		MARKINGS
Z2,5-1	2,5 mm²	2 x 2,5 mm² *R/F* 2÷3 x 1,5 mm² *R/F* 2÷5 x 1,0 mm² *R/F*	2÷6 x 0,75 mm² *R/F* 2÷10 x 0,5 mm² *R/F* 2÷18 x Ø0,4÷0,6 *mm* communication type wire	CE, EN, LR, RINA
Z6-1	6 mm²	2 x 6 mm² *R/F* 2÷3 x 4 mm² *R/F* 2÷4 x 2,5 mm² *R/F* 2÷6 x 1,5 mm² *R/F* 2÷6 x 1 mm² *R/F*	2÷10 x 0,75 mm² *R/F* 2÷12 x 0,5 mm² *R/F* (1 x 6 mm² *F*) + (4 x 1,5 mm² *F*) (1 x 6 mm² *F*) + (2 x 2,5 mm² *F*)	CE, EN, LR, RINA
Z10-1	10 mm²	2 x 10 mm² *R/F* 2÷3 x 6 mm² *R/F* 2÷5 x 4 mm² *R/F* 2÷8 x 2,5 mm² *R/F* (1 x 6 mm² *F*) + (1 x 4 mm² *F*) + (2 x 2,5 mm² *F*) + (3 x 1,5 mm² *F*)	2÷12 x 1,5 mm² *R/F* 2÷20 x 1 mm² *R/F* 2÷25 x 0,75 mm² *R/F*	CE, EN, LR, RINA
Z16-1	16 mm²	2 x 16 mm² *R/F* 2÷3 x 10 mm² *R/F* 2÷5 x 6 mm² *R/F*	2÷8 x 4 mm² *R/F* 2÷12 x 2,5 mm² *R/F* 2÷18 x 1,5 mm² *R/F*	CE, EN, LR, RINA
Z25-1	25 mm²	2 x 25 mm² *R/F* 2÷3 x 16 mm² *R/F* 2÷4 x 10 mm² *R/F*	2÷8 x 6 mm² *R/F* 2÷11 x 4 mm² *R/F* 4÷16 x 2,5 mm² *R/F*	CE, EN, LR, RINA
Z35-1	35 mm²	2 x 35 mm² *R/F* 2÷3 x 25 mm² *R/F* 2÷4 x 16 mm² *R/F* 2÷7 x 10 mm² *R/F*	2÷11 x 6 mm² *R/F* 4÷17 x 4 mm² *R/F* 5÷28 x 2,5 mm² *R/F*	CE, EN, LR, RINA

**Various cable sizes may be connected to the terminal block provided that the sum of cable sections is less than twice the nominal section.*

R = Rigid cable *F = Flexible cable*

MARKINGS:

CE *Directives 2006/95/CE*

EN 60998-1: 1993-08 + A1:2001 and 60998-2-1: 1993-08 Norms

Lloyd's Register of Shipping type approval

Registro Italiano Navale type approval

CABLE GLANDS AND ACCESSORIES

MAXIblock® CABLE GLANDS

1900

Polyamide PA6.6

MAXIblock® *standard*

Material: POLYAMIDE PA6.6
self-extinguishing class V2 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Sealing ring: NEOPRENE® 50 sh A
Protection: IP 68
Colour: RAL 7035 light grey,
RAL 9005 black, RAL 7001 dark grey

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity
1900.M12	M12X1,5	12,5	3,5- 7	15	8	18-22	100
1900.M16	M16X1,5	16,5	5 -10	19	8	22-27	100
1900.M20	M20X1,5	20,5	7 -13	25	9	24-30	100
1900.M25	M25X1,5	25,5	10 -17	30	10	28-39	50
1900.M32	M32X1,5	32,5	13 -21	36	10	33-44	25
1900.M40	M40X1,5	40,5	19 -28	46	10	36-45	15
1900.M50	M50X1,5	50,5	27 -35	55	12	43-52	10
1900.M63	M63X1,5	63,5	34 -45	66	12	45-55	5

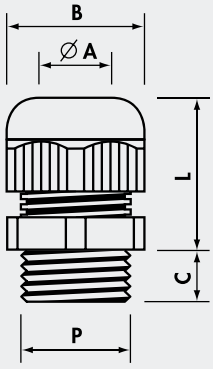
Add to Ref: N for Black, G for Dark Grey

MAXIblock® *reduced cable entry*

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity
1910.M12	M12X1,5	12,5	**2- 5**	15	8	18-22	100
1910.M16	M16X1,5	16,5	**3- 7**	19	8	22-27	100
1910.M20	M20X1,5	20,5	**5-10**	25	9	24-30	100
1910.M25	M25X1,5	25,5	**7-13**	30	10	28-39	50
1910.M32	M32X1,5	32,5	**8-14**	36	10	33-44	25
1910.M40	M40X1,5	40,5	**15-23**	46	10	36-45	15
1910.M50	M50X1,5	50,5	**21-29**	55	12	43-52	10
1910.M63	M63X1,5	63,5	**27-39**	66	12	45-55	5

Add to Ref: N for Black, G for Dark Grey



MAXIblock® *extended thread*

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity
1901.M12	M12X1,5	12,5	3,5- 7	15	**15**	18-22	100
1901.M16	M16X1,5	16,5	5 -10	19	**15**	22-27	100
1901.M20	M20X1,5	20,5	7 -13	25	**15**	24-30	50
1901.M25	M25X1,5	25,5	10 -17	30	**15**	30-41	50
1901.M32	M32X1,5	32,5	13 -21	36	**15**	33-44	25
1901.M40	M40X1,5	40,5	19 -28	46	**18**	36-45	15
1901.M50	M50X1,5	50,5	27 -35	55	**18**	43-52	10
1901.M63	M63X1,5	63,5	34 -45	66	**18**	45-55	5

Add to Ref: N for Black, G for Dark Grey

MAXIblock® *standard factory fitted with locknuts with collar*

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref.	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity Box/Bag
1900.M12/X	M12X1,5	12,5	3,5- 7	15	8	18-22	100/10
1900.M16/X	M16X1,5	16,5	5 -10	19	8	22-27	100/10
1900.M20/X	M20X1,5	20,5	7 -13	25	9	24-30	50/10
1900.M25/X	M25X1,5	25,5	10 -17	30	10	28-39	30/10
1900.M32/X	M32X1,5	32,5	13 -21	36	10	33-44	20/10

Light Grey only

Technical data pages 161 to 164

1900

MAXIblock® standard

Polyamide PA6.6

Pg thread DIN 40 430

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity
1900.07	Pg 7	12,5	3,5- 7	15	8	18-22	100
1900.09	Pg 9	15,5	5 - 8	19	8	22-26	100
1900.11	Pg11	19	5 -10	22	8	23-28	100
1900.13	Pg13,5	20,5	7 -12	24	9	24-29	100
1900.16	Pg16	22,5	10 -14	27	10	26-31	50
1900.21	Pg21	29	13 -18	33	12	30-35	50
1900.29	Pg29	37	18 -25	42	12	33-39	25
1900.36	Pg36	47	20 -32	53	14	42-49	10
1900.42	Pg42	54	28 -38	60	14	42-50	5
1900.48	Pg48	60	37 -45	66	15	42-50	5

Add to Ref: N for Black, G for Dark Grey

Material: POLYAMIDE PA6.6
self-extinguishing class V2 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Sealing ring: NEOPRENE® 50 sh A
Protection: IP 68
Colour: RAL 7035 light grey,
RAL 9005 black, RAL 7001 dark grey

MAXIblock® reduced cable entry

Pg thread DIN 40 430

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity
1910.07	Pg 7	12,5	**2- 5**	15	8	18-22	100
1910.09	Pg 9	15,5	**2- 6**	19	8	22-26	100
1910.11	Pg11	19	**4- 7**	22	8	23-28	100
1910.13	Pg13,5	20,5	**5-10**	24	9	24-29	100
1910.16	Pg16	22,5	**6-12**	27	10	26-31	50
1910.21	Pg21	29	**9-15**	33	12	30-35	50
1910.29	Pg29	37	**12-20**	42	12	33-39	25

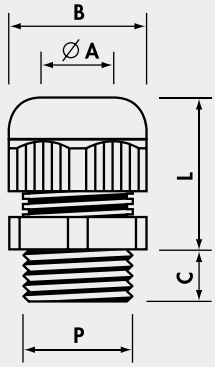
Add to Ref: N for Black

MAXIblock® extended thread

Pg thread DIN 40 430

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity
1901.09	Pg 9	15,5	5- 8	19	**15**	22-26	100
1901.11	Pg11	19	5-10	22	**15**	23-28	100
1901.13	Pg13,5	20,5	7-12	24	**15**	24-29	100
1901.16	Pg16	22,5	10-14	27	**15**	26-31	50
1901.21	Pg21	29	13-18	33	**15**	30-35	50
1901.29	Pg29	37	18-25	42	**15**	33-39	25
1901.36	Pg36	47	20-32	53	**18**	42-49	10

Add to Ref: N for Black



MAXIblock® standard factory fitted with locknuts with collar

Pg thread DIN 40 430

Ref.	P	Fixing Hole (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity Box/Bag
1900.09/X	Pg 9	15,5	5- 8	19	8	22-26	100/10
1900.11/X	Pg11	19	5-10	22	8	23-28	100/10
1900.13/X	Pg13,5	20,5	7-12	24	9	24-29	50/10
1900.16/X	Pg16	22,5	10-14	27	10	26-31	30/10
1900.21/X	Pg21	29	13-18	33	12	30-35	20/10

Light Grey only

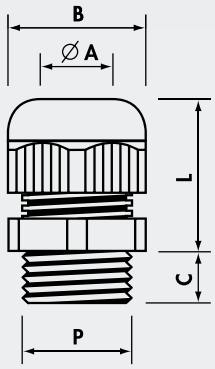
Technical data pages 161 to 164

MAXIblock® CABLE GLANDS

1900

Polyamide PA6.6

Material: POLYAMIDE PA6.6
self-extinguishing class V2 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Sealing ring: NEOPRENE® 50 sh A
Protection: IP 68
Colour: RAL 7035 light grey,
RAL 9005 black



MAXIblock® *standard*

BSP thread ISO 228/1

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	*Quantity*
1900.14	G1/4"	13,5	3- 6,5	15	8	18-22	100
1900.38	G3/8"	17	4- 8	19	8	22-26	100
1900.12	G1/2"	21,5	7-12	24	10	24-29	100
1900.34	G3/4"	27	13-18	33	12	30-35	50

Add to Ref: N for Black

MAXIblock® *specials*

Pg thread DIN 40 430

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	*Quantity*
○*1920.09	Pg 9	15,5	5- 8	19	8	22-26	100
○*1921.09	Pg 9	15,5	5- 8	19	15	22-26	100
△ 1902.13N	Pg13,5	20,5	7-12	24	10	24-29	100
○ 1920.36	Pg36	47	20-32	53	14	42-49	25
○ 1921.36	Pg36	47	20-32	53	18	42-49	25

* Add to Ref: N for Black

△ Add to Ref: N for Black

○ PVC sealing ring

MAXIblock® *Pg derivatives*

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref.	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	*Quantity*
1940.M25N	M25X1,5	25,5	13-18	33	12	30-35	25

Black only

Technical data pages 161 to 164

CABLE GLANDS WITH INCREASED SAFETY

4900

Polyamide PA6.6

Material: POLYAMIDE PA6.6
Safety level: EEx e II according to EN 50014 and EN 50019
Areas of utilisation: 1 & 2, 21 & 22
Temperature range: –25°C to +90°C (continuous)
–25°C to +110°C (short period)

CE Ex II 2 G D

Certificate No LOM 01ATEX2038X

Sealing ring: NEOPRENE®
Protection: IP 65
Colour: RAL 9005 black, RAL 5015 blue

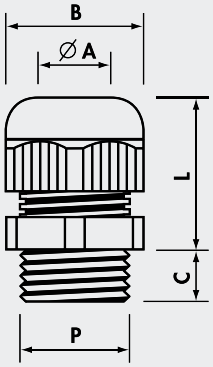
Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Black	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity
4900.M16N	M16X1,5	16,5	6 -10,5	22	8	23-28	100
4900.M20N	M20X1,5	20,5	7 -12	24	10	24-29	100
4900.M25N	M25X1,5	25,5	13 -18	33	11	30-35	50

Pg thread DIN 40 430

Ref. Black	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L min-max (mm)	Quantity
4900.07N	Pg 7	12,5	4- 6,5	15	8	18-22	100
4900.09N	Pg 9	15,5	6- 8	19	8	22-26	100
4900.11N	Pg11	19	6-10,5	22	8	23-28	100
4900.13N	Pg13,5	20,5	7-12	24	8	24-29	100
4900.16N	Pg16	22,5	10-14	27	10	26-31	50
4900.21N	Pg21	29	13-18	33	11	30-35	50
4900.29N	Pg29	37	20-25	42	11	33-39	25

In Ref: change N to B for Blue



RUTASEAL GROMMETS

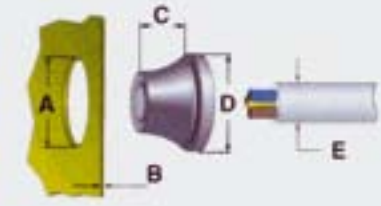
RS

CE

Material: EPDM
halogen-free and chemical resistant
Temperature range: –40°C to +110°C
Protection: IP 67
Colour: RAL 7001 light grey
Application:
IP67 sealing of cables and conduits in Metric and Pg threaded entries through material thickness 0,5-4 mm

Ref.	Fits Threaded Entry	Dimensions A (mm)	B (mm)	C (mm)	D (mm)	E (mm)	Quantity Box/Bag
RS0407.M12	M12	12,5	0,5 - 2	5,6	20,0	4 - 7	2.000/50
RS0509.M16	M16	16,5	1 - 4	11,0	21,0	5 - 9	2.000/50
RS0813.M20	M20/Pg13,5	20,5	1 - 4	13,4	25,5	8 - 12	3.000/50
RS1117.M25	M25	25,5	1 - 4	15,3	30,5	11 - 16	2.000/50
RS1520.M32	M32	32,5	1 - 4	18,6	38,5	15 - 20	1.000/25
RS1928.M40	M40	40,5	1 - 4	21,7	48,5	19 - 28	600/25
RS2735.M50	M50	50,5	1 - 4	25,0	60,5	27 - 35	250/10

Ref.	Fits Threaded Entry	Dimensions A (mm)	B (mm)	C (mm)	D (mm)	E (mm)	Quantity Box/Bag
RS0305.07	Pg 7	12,5	0,5 - 2	5,4	20,0	3 - 5	2.000/50
RS0507.09	Pg 9	16,0	1 - 4	10,3	21,0	5 - 7	2.000/50
RS0710.11	Pg11	19,0	1 - 4	12,7	24,0	7 - 10	3.000/50
RS1014.16	Pg16	23,0	1 - 4	14,7	28,0	10 - 14	2.000/50
RS1420.21	Pg21	29,0	1 - 4	17,6	35,0	14 - 20	1.000/25
RS2026.29	Pg29	38,0	1 - 4	20,0	46,0	20 - 26	600/25
RS2635.36	Pg36	48,0	1 - 4	23,9	58,0	26 - 35	250/10



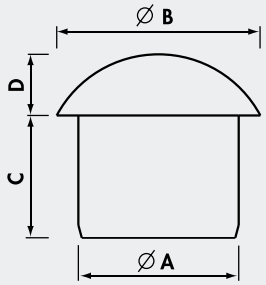
Technical data pages 161 to 164

INTERNAL PLUGS FOR CABLE GLANDS

TCP

Polyamide PA6.6

Material: POLYAMIDE PA6.6
self-extinguishing class V2 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Colour: RAL 9005 black
Application:
Blanking the cable entry of MAXIblock® and MAXIbrass® cable glands and maintaining IP 68.



Plugs

Ref.	Suitable for MAXIblock®	Suitable for MAXIbrass®	Ø A (mm)	Ø B (mm)	C (mm)	D (mm)	Quantity Box/Bag
TCP5	M12R + Pg7R	M12R	4,5	8,5	10,8	4,5	3.000/100
TCP10	Pg9R	Pg9R	6	12	12	4,5	2.000/100
TCP12	M12 + Pg7 M16R + Pg11R	M12 M16R + Pg11R	6,8	12	12	4,5	1.000/100
TCP15	Pg9	Pg9	8	11	11,5	5	1.500/100
TCP18	M16 + Pg11	M16 + Pg11	9,5	12,5	13	5	1.500/100
TCP20	M20R Pg13,5 + Pg13,5R Pg16R	M20R Pg13 + Pg13,5R Pg16R	10	15	14	6	800/100
TCP25	M20 + Pg16	M20 + Pg16	12,5	17	15	8	400/100
TCP30	M25R + M32R Pg21R	M25R + M32R Pg21R	12,5	22,5	18	9	300/100
TCP35	M25 + Pg21	M25 + Pg21	16	19,5	18	8	300/100
TCP40	M32	M32	19	22,5	19	9	150/50
TCP45	M40R + Pg29	M40R	22	30	20	10	100/50
TCP50	M40 + M50R	M40 + M50R	27,5	38	25	12	50/25
TCP55	Pg36	-	31,5	36,5	23,5	12	50/25
TCP60	M50	M50	34,5	40	23,5	12	50/25
TCP65	M63R + Pg42	M63R	37,5	48	26,5	12	30/15
TCP70	M63 + Pg48	M63	43	48	26,5	12	30/15

R: reduced cable entry

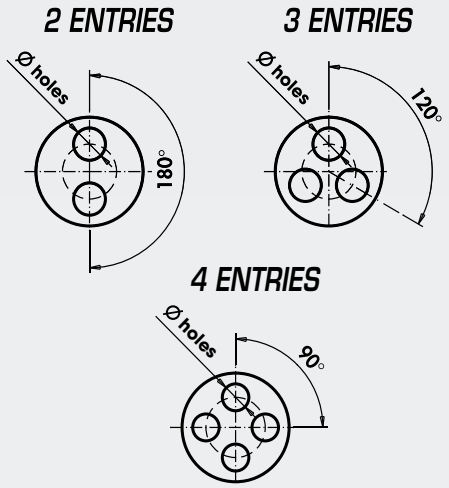
MULTI-ENTRY SEALS & PLUGS FOR CABLE GLANDS

36A TGM

Material: NEOPRENE® 70 sh A
Temperature range:
–40°C to +130°C
Protection: IP 68
Colour: black
Application:
IP68 sealing of multiple cables entering MAXIblock® or MAXIbrass® cable glands.

Multi-entry seals

Ref.	Suitable for MAXIblock®	Suitable for MAXIbrass®	n° entries	∅ Dia entry (mm)	Quantity Box/Bag
36A3M1623	M16 + Pg11	M16 + Pg11	2	3	1.500/100
36A3M1624	M16 + Pg11	M16 + Pg11	2	4	1.000/100
36A3M16322	M16 + Pg11	M16 + Pg11	3	2,2	1.500/100
36A3M2025	M20 + Pg13,5	M20 + Pg13,5 + Pg16	2	5	500/100
36A3M2034	M20 + Pg13,5	M20 + Pg13,5 + Pg16	3	4	500/100
36A3M2526	M25	M25 + Pg21	2	6	300/50
36A3M2536	M25	M25 + Pg21	3	6	300/50
36A3M2537	M25	M25 + Pg21	3	7	300/50
36A3M2545	M25	M25 + Pg21	4	5	300/50
36A3M2554	M25	M25 + Pg21	5	4	300/50
36A3M3248	M32	M32	4	8	150/50
36A3M4078	M40	M40	7	8	100/100
36A3M40106	M40	M40	10	6	100/100
36A3M5088	M50	M50	8	8	50/50
36C201629	Pg16	-	2	3+9	400/50

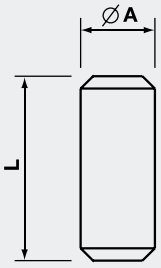


Material: POLYAMIDE PA6.6
Temperature range:
–20°C to +90°C (continuous)
Colour: RAL 7035 light grey

Application:
Plugging unused entries in multi-entry seals and maintaining IP68.

Multi-entry seal plugs

Ref.	Suitable for Seal	∅ A (mm)	L (mm)	Quantity Box/Bag
TGM38	36A3M1623	3	8	5.000/100
TGM48	36A3M1624 + 36A3M2034 + 36A3M2554	4	8	5.000/100
TGM58	36A3M2025	5	8	5.000/100
TGM513	36A3M2545	5	13	2.500/50
TGM613	36A3M2526 + 36A3M2536 + 36A3M40106	6	13	2.000/50
TGM713	36A3M2537	7	13	2.000/50
TGM817	36A3M3248 + 36A3M5088 + 36A3M4078	8	17	100

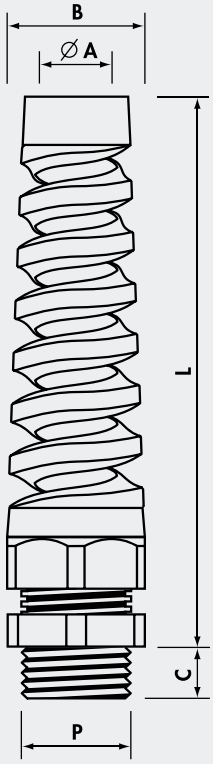


spiralblock® CABLE GLANDS

1500

Polyamide PA6.6

Material: POLYAMIDE PA6.6
self-extinguishing class V2 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Sealing ring: NEOPRENE® 50 sh A
Protection: IP 68
Colour: RAL 7035 light grey,
RAL 9005 black



spiralblock® standard

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L (mm)	Quantity
1500.M12	M12X1,5	12,5	3,5- 7	15	8	57	100
1500.M16	M16X1,5	16,5	5 -10	19	8	79	50
1500.M20	M20X1,5	20,5	7 -13	25	9	90	25
1500.M25	M25X1,5	25,5	10 -17	30	10	120	20
1500.M32	M32X1,5	32,5	13 -21	36	10	140	10

Add to Ref: N for Black

spiralblock® standard

Pg thread DIN 40 430

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L (mm)	Quantity
1500.07	Pg 7	12,5	3,5- 7	15	8	57	100
1500.09	Pg 9	15,5	5 - 8	19	8	68	100
1500.11	Pg11	19	5 -10	22	8	80	50
1500.13	Pg13,5	20,5	7 -12	24	10	90	50
1500.16	Pg16	22,5	10 -14	27	10	100	25
1500.21	Pg21	29	13 -18	33	12	112	20

Add to Ref: N for Black

spiralblock® standard

BSP thread ISO 228/1

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L (mm)	Quantity
1500.14	G1/4"	13,5	3- 6,5	15	8	57	100
1500.38	G3/8"	17	4- 8	19	9	68	100
1500.12	G1/2"	21,5	7-12	24	10	90	50
1500.34	G3/4"	27	13-18	33	12	112	20

Add to Ref: N for Black

spiralblock® Pg derivatives

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L (mm)	Quantity
1540.M25	M25X1,5	25,5	13-18	33	12	112	20

Add to Ref: N for Black

Technical data pages 161 to 164

COMPRESSION CABLE GLANDS

Polyamide PA6

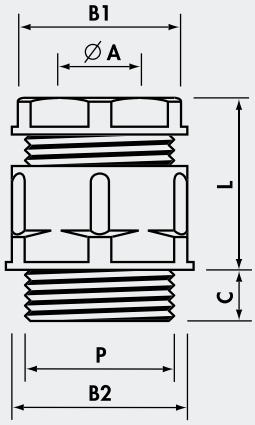
1700
1400

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B1 Spanner (mm)	B2 Spanner (mm)	C (mm)	L min-max (mm)	*Quantity Box/Bag*
1709	Pg 7	12,5	5,5- 7	15	16	8	16-20	300/100
* **1700**	Pg 9	15,5	6,5- 8,5	17	20	8	19-22	200/100
* **1701**	Pg11	19	8 -10	19	22	8	21-25	100/100
* **1702**	Pg13,5	20,5	8 -11	21	24	9	22-26	100/100
1703	Pg16	22,5	11 -14	23	27	10	24-33	50/50
1704	Pg21	29	14,5-18	30	33	11	25-32	50/25
1705	Pg29	37	19 -26	40	42	11	27-32	20/10
1706	Pg36	47	30 -34	50	53	14	33-42	10/10
1707	Pg42	54	30 -38	55	60	13	37-48	10/5
1708	Pg48	60	38 -44	60	65	14,5	37-48	5/5

***Add to Ref: N for Black**

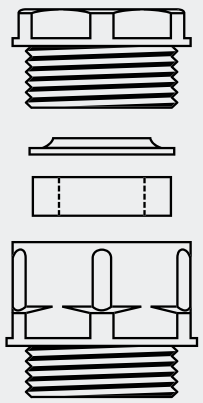
Material: POLYAMIDE PA6
self-extinguishing class V0 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Sealing ring: PVC 50 sh A
Protection: IP 54
Colour: RAL 7035 light grey,
RAL 9005 black



BSP thread ISO 228/1

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B1 Spanner (mm)	B2 Spanner (mm)	C (mm)	L min-max (mm)	*Quantity Box/Bag*
1400	G1/4"	13,5	5,5- 7	15	16	8	16-20	300/100
* **1401**	G3/8"	17	6,5- 8,5	17	20	8	19-22	200/100
* **1401B**	G3/8"	17	8 -10	19	22	8	18-24	100/100
* **1401C**	G3/8"	17	10 -12	22	24	9	22-26	100/100
* **1402**	G1/2"	21,5	8 -11	21	24	9	22-26	100/100
1403	G5/8"	23,5	11 -14	23	27	10	24-33	50/50
1404	G3/4"	27	14,5-18	30	33	11	25-32	50/25
1405	G1"	34	17 -22	34	38	11,5	27-35	20/10
1407	G1"1/2	48	30 -34	50	53	14	33-42	10/10
1408	G2"	60	38 -44	60	65	14,5	37-48	5/5

***Add to Ref: N for Black**



Metric thread M 1,5 pitch CEI EN 60423

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B1 Spanner (mm)	B2 Spanner (mm)	C (mm)	L min-max (mm)	*Quantity*
1730M20	M20X1,5	20,5	8-11	21	24	9	22-26	100

Add to Ref: N for Black

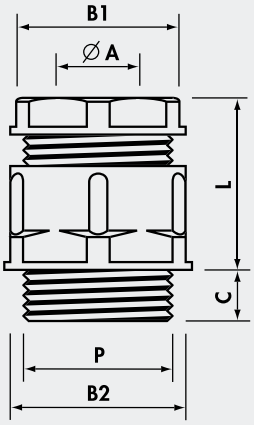
Technical data pages 161 to 164

COMPRESSION CABLE GLANDS

1700T

Polyamide PA6

Material: POLYAMIDE PA6
self-extinguishing class V0 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Protection: IP 54
Colour: RAL 7035 light grey,
RAL 9005 black



Compression cable glands

special Internal blanking disc: PVC 50 sh

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B1 Spanner (mm)	B2 Spanner (mm)	C (mm)	L min-max (mm)	*Quantity Box/Bag*
* 1700T	Pg 9	15,5	6,5- 8,5	17	20	8	19-22	200/100
* 1701T	Pg11	19	8 -10	19	22	8	21-25	100/100
* 1702T	Pg13,5	20,5	8 -11	21	24	9	22-26	100/100
1703T	Pg16	22,5	11 -14	23	27	10	24-33	50/50

*Add to Ref: N for Black

Compression cable gland - reduced cable entry

Sealing ring: CHLOROPRENE, concentric, multi-sector

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B1 Spanner (mm)	B2 Spanner (mm)	C (mm)	L min-max (mm)	*Quantity*
1702CONC	Pg13,5	20,5	**5,5-13**	21	24	9	22-26	100

Add to Ref: N for Black

ENTRY BUSHES AND PLUGS

Polyamide PA6

1700

Material: POLYAMIDE PA6
self-extinguishing class V0 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Colour: RAL 7035 light grey,
RAL 9005 black

Entry bushes

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Light Grey	P	∅A (mm)	B Spanner (mm)	C (mm)	L (mm)	*Quantity Box/Bag*
* **1700.2**	Pg 9	10	16	9	14	600/100
* **1701.2**	Pg11	11,5	19	10	15	300/100
* **1702.2**	Pg13,5	13,5	21	11	16,5	300/100
1703.2	Pg16	16	23	12,5	18,5	200/100
1704.2	Pg21	22	30	12	17,5	100/50
1705.2	Pg29	27	40	15	22	50/50

BSP thread ISO 228/1

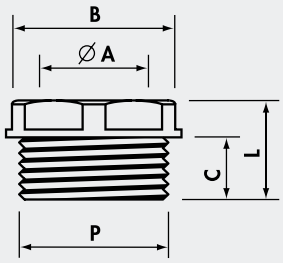
* **1830**	G1/4"	8,5	15	8,5	13,5	800/100
* **1831**	G3/8"	11,5	17	9	14	300/100
* **1832**	G1/2"	13	21	11	16,5	300/100

Metric thread M 1,5 pitch CEI EN 60423

△**1835G**	M16X1,5	11,5	17	9	14	100/100
* **1836**	M20X1,5	13,5	21	11	16,5	300/100

* Add to Ref: N for Black

△ Dark Grey only



Blind entry bushes

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Light Grey	P	∅A (mm)	B Spanner (mm)	C (mm)	L (mm)	*Quantity Box/Bag*
* **1702.5**	Pg13,5	–	21	11	17	300/100
1703.5	Pg16	–	23	12,5	18,5	200/100

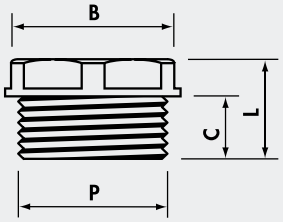
BSP thread ISO 228/1

* **1861**	G3/8"	–	17	9	14	600/100
* **1862**	G1/2"	–	21	11	16,5	200/100

Metric thread M 1,5 pitch CEI EN 60423

* **1866**	M20X1,5	–	21	11	17	100

*Add to Ref: N for Black



Entry plug

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Light Grey	P	∅A (mm)	B Spanner (mm)	C (mm)	L (mm)	*Quantity*
1855	Pg21	–	–	11	19	100

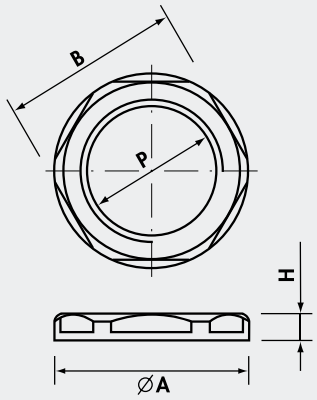
Material:
POLYETHYLENE low density
Temperature range:
–40°C to +70°C (continuous)
Colour: RAL 7035 grey

LOCKNUTS WITH COLLAR

Polyamide PA6 or PA6.6

1143
1142
1141

Material: POLYAMIDE PA6 or 6.6
self-extinguishing class V2 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Colour: RAL 7035 light grey,
RAL 9005 black,
RAL 7001 dark grey



Metric thread M 1,5 pitch CEI EN 60423

Ref. Light Grey	P	Ø A (mm)	B Spanner (mm)	H (mm)	Quantity
1143M12	M12X1,5	18,5	17	5	100
1143M16	M16X1,5	24	22	5	100
1143M20	M20X1,5	29	27	6	100
1143M25	M25X1,5	35,5	32	6	100
1143M32	M32X1,5	45	41	7	50
1143M40	M40X1,5	55	50	7	30
1143M50	M50X1,5	65	60	8	30
1143M63	M63X1,5	82	75	8	15

Add to Ref: N for Black, G for Dark Grey

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Light Grey	P	Ø A (mm)	B Spanner (mm)	H (mm)	Quantity
1142007	Pg 7	21	19	5	100
1142009	Pg 9	24	22	5	100
1142011	Pg11	26	24	5	100
1142013	Pg13,5	29	27	6	100
1142016	Pg16	33	30	6	100
1142021	Pg21	39	36	7	50
1142029	Pg29	50	46	7	50
1142036	Pg36	66	60	8	30
1142042	Pg42	73	65	8	25
1142048	Pg48	78	70	8	20

Add to Ref: N for Black, G for Dark Grey

BSP thread ISO 228/1

Ref. Light Grey	P	Ø A (mm)	B Spanner (mm)	H (mm)	Quantity
1141012	G1/2"	29	27	6	100
1141112	G1"1/2	66	60	8	30
1141200	G2"	78	70	8	20

Add to Ref: N for Black

LOCKNUTS WITHOUT COLLAR

Polyamide PA6 or PA6.6

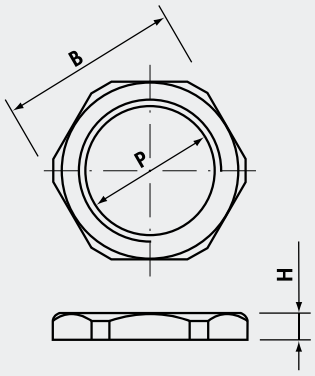
1112
1710
1410

Metric thread M 1,5 pitch CEI EN 60423

Ref. Light Grey	P	B Spanner (mm)	H (mm)	Quantity
1112	M12X1,5	17	5	100
1116	M16X1,5	22	5	100
1120	M20X1,5	27	6	100
1125	M25X1,5	32	6	100
1132	M32X1,5	41	7	50
1140	M40X1,5	50	7	30
1150	M50X1,5	60	8	30
1163	M63X1,5	75	8	15

Add to Ref: N for Black

Material: POLYAMIDE PA6 or 6.6
self-extinguishing class V2 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Colour: RAL 7035 light grey,
RAL 9005 black



Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Light Grey	P	B Spanner (mm)	H (mm)	Quantity
* **1719E17**	Pg 7	17	5	100
1719	Pg 7	19	5	100
1710	Pg 9	22	5	100
1711	Pg11	24	5	100
1712	Pg13,5	27	6	100
1713	Pg16	30	6	100
△*1714E34	Pg21	34	7	100
1714	Pg21	36	7	100
1715	Pg29	46	7,5	50

Add to Ref: N for Black

△ Light Grey only

* Not DIN 46 320

BSP thread ISO 228/1

Ref. Light Grey	P	B Spanner (mm)	H (mm)	Quantity
1410	G1/4"	19	5	100
1411	G3/8"	23	6	100
1412	G1/2"	27	6	100
1413	G5/8"	30	6	100
1414	G3/4"	34	7	100
1415	G1"	40	7	50

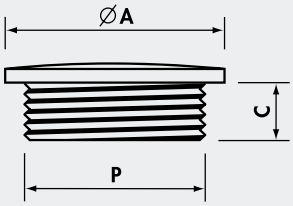
Add to Ref: N for Black

ENTRY PLUGS

Polyamide PA6

1053
1052

Material: POLYAMIDE PA6
reinforced with fibreglass
self-extinguishing class V0 (UL 94)
Temperature range:
–20°C to +90°C (continuous)
Protection: IP 54
Colour: RAL 7035 light grey,
RAL 9005 black



Metric thread M 1,5 pitch CEI EN 60423

Ref. Light Grey	P	∅ A (mm)	C (mm)	*Quantity*
1053M12	M12X1,5	15	6	100
1053M16	M16X1,5	20	6	100
1053M20	M20X1,5	25	7	100
1053M25	M25X1,5	30	7	100
1053M32	M32X1,5	37	9	50
1053M40	M40X1,5	47	9	30
1053M50	M50X1,5	58	10	20
1053M63	M63X1,5	72	12	10

Add to Ref: N for Black

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Light Grey	P	∅ A (mm)	C (mm)	*Quantity*
1052007	Pg 7	15	6	100
1052009	Pg 9	19	6	100
1052011	Pg11	22	7	100
1052013	Pg13,5	25	7	100
1052016	Pg16	27	7	100
1052021	Pg21	33	9	50
1052029	Pg29	44	9	50
1052036	Pg36	55	10	20
1052042	Pg42	62	10	10
1052048	Pg48	69	12	10

Add to Ref: N for Black

1700P
1253
1840

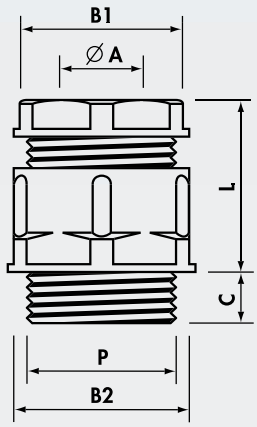
Polystyrene PS

Material: POLYSTYRENE PS
Temperature range:
–20°C to +60°C (continuous)
Colour: RAL 7035 light grey,
RAL 9005 black

Cable Glands

Sealing ring: PVC 50 sh A - Protection: IP 54

Pg thread DIN 40 430 - Dimensions DIN 46 320



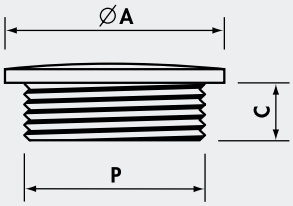
Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B1 Spanner (mm)	B2 Spanner (mm)	C (mm)	L min-max (mm)	*Quantity* Box/Bag
1700P	Pg9	15,5	7 - 8,5	17	20	8	19-22	200/100
* 1701P	Pg11	19	8 -10	19	22	8	21-25	100/100
* 1702P	Pg13,5	20,5	8 -11	21	24	9	22-26	100/100
1703P	Pg16	22,5	11 -14	24	27	10	24-33	50/50
1704P	Pg21	29	14,5-18	30	33	11	25-32	50/25

*Add to Ref: N for Black

Entry plugs

Protection: IP 54

Metric thread M 1,5 pitch CEI EN 60423



Ref. Light Grey	P	Ø A (mm)	C (mm)	*Quantity*
1253M12	M12X1,5	15	6	100
1253M16	M16X1,5	20	6	100
1253M20	M20X1,5	25	7	100
1253M25	M25X1,5	30	7	100
1253M32	M32X1,5	37	9	50
1253M40	M40X1,5	47	9	30
1253M50	M50X1,5	58	10	20
1253M63	M63X1,5	72	12	10

Add to Ref: N for Black

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Light Grey	P	Ø A (mm)	C (mm)	*Quantity*
1840	Pg 7	15	6	100
1841	Pg 9	19	6	100
1842	Pg11	22	7	100
1843	Pg13,5	25	7	100
1844	Pg16	27	7	100
1845	Pg21	33	9	50
1846	Pg29	44	9	50
1847	Pg36	55	10	20
1848	Pg42	62	10	10
1849	Pg48	69	12	10

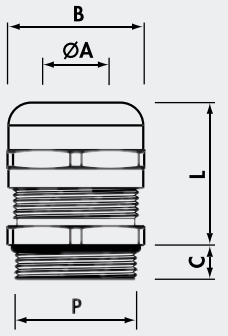
Add to Ref: N for Black

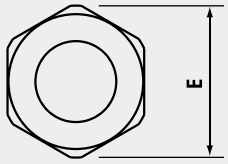
MAXIbrass® CABLE GLANDS

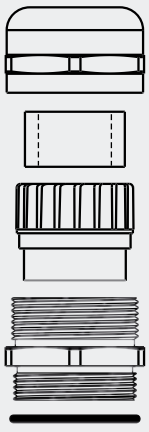
2900

Nickel Plated Brass

Material:
NICKEL PLATED BRASS
(CuZn 40 Pb 3)
Sealing-ring: NEOPRENE®
Cable grip insert:
POLYAMIDE PA6.6
O-Ring: NITRILE 70 sh A
(factory fitted)
Protection: IP 68
Temperature range:
-25°C to +100°C (continuous)







MAXIbrass® standard

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	E (mm)	C (mm)	L min-max (mm)	Quantity
2900.M12N	M12X1,5	12,5	3 - 7	16	18	6,5	16-20	100
2900.M16N	M16X1,5	16,5	4,5-10	20	23	7,0	20-25	100
2900.M20N	M20X1,5	20,5	7 -13	24	27	8,0	20-27	50
2900.M25N	M25X1,5	25,5	10 -17	29	32	8,0	25-31	50
2900.M32N	M32X1,5	32,5	11 -21	36	40	9,0	27-34	25
2900.M40N	M40X1,5	40,5	19 -28	45	50	9,0	34-42	10
2900.M50N	M50X1,5	50,5	26 -35	54	60	10,0	35-43	8
2900.M63N	M63X1,5	63,5	34 -45	67	74	15,0	40-52	5

MAXIbrass® reduced cable entry

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	E (mm)	C (mm)	L min-max (mm)	Quantity
2910.M12N	M12X1,5	12,5	**1 - 5**	16	18	6,5	16-20	100
2910.M16N	M16X1,5	16,5	**2,5- 7**	20	23	7,0	20-25	100
2910.M20N	M20X1,5	20,5	**5 -10**	24	27	8,0	20-27	50
2910.M25N	M25X1,5	25,5	**6 -13**	29	32	8,0	25-31	50
2910.M32N	M32X1,5	32,5	**7 -14**	36	40	9,0	27-34	25
2910.M40N	M40X1,5	40,5	**13 -23**	45	50	9,0	34-42	10
2910.M50N	M50X1,5	50,5	**20 -29**	54	60	10,0	35-43	8
2910.M63N	M63X1,5	63,5	**27 -39**	67	74	15,0	40-52	5

MAXIbrass® extended thread

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	E (mm)	C (mm)	L min-max (mm)	Quantity
2901.M12N	M12X1,5	12,5	3 - 7	16	18	**12**	16-20	100
2901.M16N	M16X1,5	16,5	4,5-10	20	23	**12**	20-25	100
2901.M20N	M20X1,5	20,5	7 -13	24	27	**12**	20-27	50
2901.M25N	M25X1,5	25,5	10 -17	29	32	**12**	25-31	50
2901.M32N	M32X1,5	32,5	11 -21	36	40	**15**	27-34	25
2901.M40N	M40X1,5	40,5	19 -28	45	50	**15**	34-42	10
2901.M50N	M50X1,5	50,5	26 -35	54	60	**15**	35-43	8

MAXIbrass® extended thread and reduced cable entry

Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	E (mm)	C (mm)	L min-max (mm)	Quantity
2911.M12N	M12X1,5	12,5	**1 - 5**	16	18	**12**	16-20	100
2911.M16N	M16X1,5	16,5	**2,5- 7**	20	23	**12**	20-25	100
2911.M20N	M20X1,5	20,5	**5 -10**	24	27	**12**	20-27	50
2911.M25N	M25X1,5	25,5	**6 -13**	29	32	**12**	25-31	50
2911.M32N	M32X1,5	32,5	**7 -14**	36	40	**15**	27-34	25
2911.M40N	M40X1,5	40,5	**13 -23**	45	50	**15**	34-42	10
2911.M50N	M50X1,5	50,5	**20 -29**	54	60	**15**	35-43	8

Technical data pages 161 to 164

MAXIbrass® CABLE GLANDS

Nickel Plated Brass

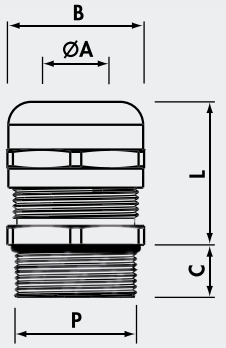
2900

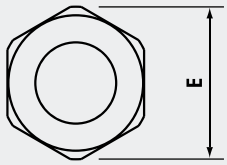
Material:
NICKEL PLATED BRASS (CuZn 40 Pb 3)
Sealing-ring: NEOPRENE®
Cable grip insert: POLYAMIDE PA6.6
O-Ring: NITRILE 70 sh A (factory fitted)
Protection: IP 68
Temperature range:
-25°C to +100°C (continuous)

MAXIbrass® standard

Pg thread DIN 40 430

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	E (mm)	C (mm)	L min-max (mm)	Quantity
2900.09N	Pg 9	15,5	4 - 8	17	19	6,0	17-23	100
2900.11N	Pg11	19,0	4,5-10	20	23	6,0	20-25	100
2900.13N	Pg13,5	20,5	5 -12	22	25	6,5	20-26	50
2900.16N	Pg16	22,5	7 -13	24	27	6,5	20-27	50
2900.21N	Pg21	29,0	10 -17	30	33	7,0	24-30	50

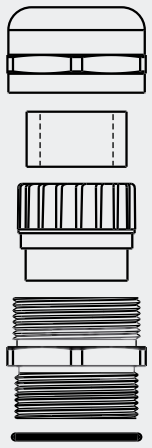




MAXIbrass® reduced cable entry

Pg thread DIN 40 430

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	E (mm)	C (mm)	L min-max (mm)	Quantity
2910.09N	PG 9	15,5	**2 - 6**	17	19	6,0	17-23	100
2910.11N	Pg11	19,0	**2,5- 7**	20	23	6,0	20-25	100
2910.13N	Pg13,5	20,5	**4 -10**	22	25	6,5	20-26	50
2910.16N	Pg16	22,5	**5 -10**	24	27	6,5	20-27	50
2910.21N	Pg21	29,0	**6 -13**	30	33	7,0	24-30	50



MAXIbrass® extra extended thread

Pg thread DIN 40 430

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	E (mm)	C (mm)	L min-max (mm)	Quantity
2902.13N	Pg13,5	20,5	5 - 12	22	25	**15**	20-26	50

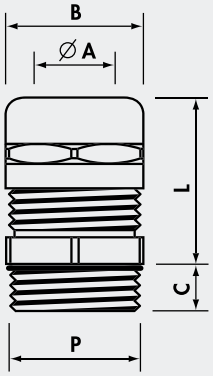
Technical data pages 161 to 164

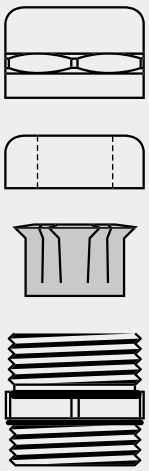
COMPRESSION CABLE GLANDS

2082
20E2

Nickel Plated Brass

Material: NICKEL PLATED BRASS (CuZn 40 Pb 3)
Sealing-ring: NEOPRENE®
Cable grip insert: POLYCARBONATE
O-Ring: NITRILE 70 sh A (factory fitted)
Protection: IP 68
Temperature range:
-25°C to +120°C (continuous),
for Pg36, Pg42 and Pg48
-30°C to +95°C (continuous)





Pg thread DIN 40 430

Ref. Nickel Plated Brass	P	Fixing Hole ∅ (mm)	∅ A min-max (mm)	B Spanner (mm)	C (mm)	L (mm)	Quantity
208200711N	Pg 7	12,5	3 - 6	14	5	19	50
208200911N	Pg 9	15,5	5 - 8	17	6	19	50
208201111N	Pg11	19	6 -10	20	6	20	50
208201311N	Pg13,5	20,5	8 -12	22	6,5	21,5	50
208201611N	Pg16	22,5	9,5-14	24	6,5	23,5	50
208202111N	Pg21	29	11,5-18	30	7	28	20
208202911N	Pg29	37	15 -24	40	8	35	20
208203611N	Pg36	47	23 -30	50	9	41	10
208204211N	Pg42	54	26 -35	58	10	47	5
208204811N	Pg48	60	35 -40	64	10	49	5

extended thread

Pg thread DIN 40 430

Ref. Nickel Plated Brass	P	Fixing Hole ∅ (mm)	∅ A min-max (mm)	B Spanner (mm)	C (mm)	L (mm)	Quantity
20E200711N	Pg 7	12,5	3 - 6	14	**15**	19	50
20E200911N	Pg 9	15,5	5 - 8	17	**15**	19	50
20E201111N	Pg11	19	6 -10	20	**15**	20	50
20E201311N	Pg13,5	20,5	8 -12	22	**15**	21,5	50
20E201611N	Pg16	22,5	9,5-14	24	**15**	23,5	50
20E202111N	Pg21	29	11,5-18	30	**15**	28	20
20E202911N	Pg29	37	15 -24	40	**15**	35	20
20E203611N	Pg36	47	23 -30	50	**18**	41	10
20E204211N	Pg42	54	26 -35	58	**18**	47	5
20E204811N	Pg48	60	35 -40	64	**18**	49	5

Technical data pages 161 to 164

EMC CABLE GLANDS

Nickel Plated Brass

20M3

EMC Cable glands

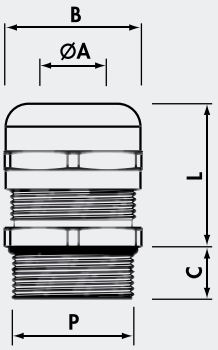
Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B Spanner (mm)	C (mm)	L (mm)	*Quantity Box/Bag*
20M3M1261N	M12X1,5	12,5	3 - 6,5	14	5	22	300/100
20M3M1661N	M16X1,5	16,5	5,5-10	17	5,5	24,5	200/100
20M3M2061N	M20X1,5	20,5	8 -13	22	6	27	100/50
20M3M2561N	M25X1,5	25,5	11 -18	30	7	31	50/25
20M3M3261N	M32X1,5	32,5	15 -21	34	8	33	30/10
20M3M4061N	M40X1,5	40,5	19 -27	44	8	40	20/10
20M3M5061N	M50X1,5	50,5	26 -35	55	9	48	10/5
20M3M6361N	M63X1,5	63,5	39 -48	66	10	50	5/5

Material: NICKEL PLATED BRASS (CuZn 40 Pb 3)
Sealing-ring: Cloroprene (CR)
Cable grip insert: PA 6
O-Ring: (NBR) (factory fitted)
Protection: IP 68, 5 bar
Temperature range:
-30°C to +120°C (continuous)

EMC Cable glands and locknuts are designed to work together in electrical or electronic applications where a metallic cable shielding must be equipotential with a metallic enclosure, in accordance with the EMC directive. Offering IP68 ingress protection at 5 bar pressure, EMC Cable glands will maintain shielding from electromagnetic disturbance in undergound applications.

EMC locknuts have serrated teeth to maintain electrical contact through paint or surface coatings, a feature which also enhances vibration resistance.



EMC LOCKNUTS

Nickel Plated Brass

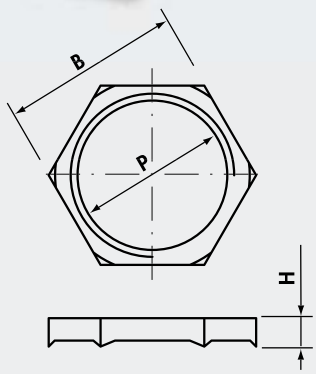
20N3

EMC Locknuts

Material: NICKEL PLATED BRASS (CuZn 40 Pb 3)

Metric thread M 1,5 pitch CEI EN 60423

Ref. Nickel Plated Brass	P	B Spanner (mm)	H (mm)	*Quantity Box/Bag*
20N3M12N	M12X1,5	15	4,1	1000/100
20N3M16N	M16X1,5	19	4,2	1000/100
20N3M20N	M20X1,5	24	4,2	600/100
20N3M25N	M25X1,5	30	4,8	400/100
20N3M32N	M32X1,5	36	5,4	200/100
20N3M40N	M40X1,5	46	6,2	100/50
20N3M50N	M50X1,5	60	7,0	50/50
20N3M63N	M63X1,5	70	7,0	50/25



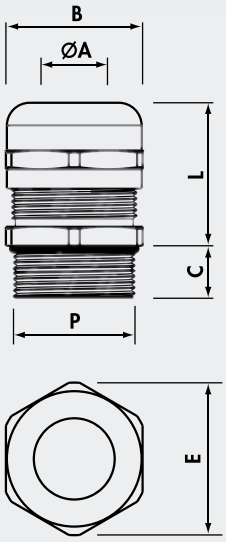
Technical data pages 161 to 164

MAXI*inox* CABLE GLANDS

7900

Stainless Steel

Material: STAINLESS STEEL
Sealing-ring: NEOPRENE®
Cable grip insert:
POLYAMIDE PA6.6
O-Ring: NITRILE 70 sh A
(factory fitted)
Protection: IP 68
Temperature range:
-25°C to +100°C (continuous)



MAXI*inox*

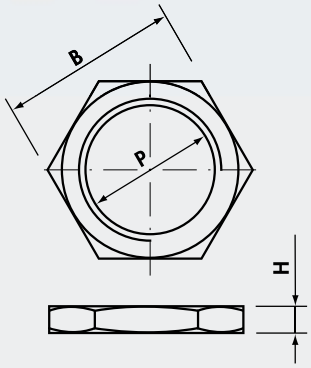
Pg thread DIN 40 430

Ref. Stainless Steel	P	Fixing Hole (mm)	Ø A min-max (mm)	B Spanner (mm)	E (mm)	C (mm)	L min-max (mm)	Quantity
7900.11	Pg11	19,0	4,5-10	20	23	6,0	20-25	100
7900.13	Pg13,5	20,5	5 -12	22	25	6,5	20-26	50
7900.16	Pg16	22,5	7 -13	24	27	6,5	20-27	50
7900.21	Pg21	29,0	10 -17	30	33	7,0	24-30	50

MAXI*inox* LOCKNUTS

7032

Stainless Steel



Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Stainless Steel	P	B Spanner (mm)	H (mm)	Quantity
7032011	Pg11	22	3	100
7032013	Pg13,5	22	3	100
7032016	Pg16	27	3	100
7032021	Pg21	32	3,5	100

COMPRESSION CABLE GLANDS

Brass

2003
2002
2001

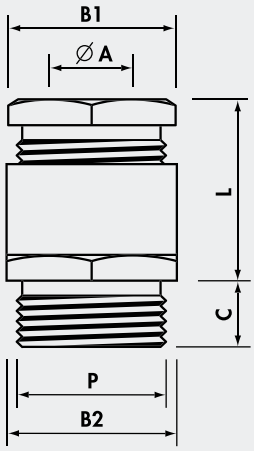
Metric thread M 1,5 pitch CEI EN 60423 CEI EN 50262

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B1 Spanner Head (mm)	B2 Spanner Body (mm)	C (mm)	L (mm)	*Quantity Box/Bag*
2003M1221N	M12X1,5	12,5	4- 6	13	14	5	13-16	500/100
2003M1621N	M16X1,5	16,5	8-10	15	17	5	14-17	200/100
2003M2021N	M20X1,5	20,5	10-12	20	22	6	16-19	150/50
2003M2521N	M25X1,5	25,5	17-19	28	30	7	19-23	50/50
2003M3221N	M32X1,5	32,5	26-28	37	39	8	21-25	100/50
2003M4021N	M40X1,5	40,5	33-35	47	50	8	24-30	20/20
2003M5021N	M50X1,5	50,5	39-41	54	57	9	28-34	10/5
2003M6321N	M63X1,5	63,5	43-45	60	66/68	10	30-36	10/5

Material: Metric & Pg threads
NICKEL PLATED BRASS (CuZn 40 Pb 3)
BSP thread - PLAIN BRASS
Protection: IP 54
Sealing ring:
Metric thread - RUBBER 55sh A
Pg thread - RUBBER 55 sh A
BSP thread - PVC 50 sh A

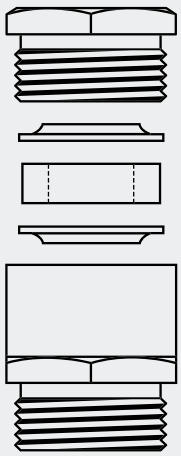
Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Nickel Plated Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B1 Spanner Head (mm)	B2 Spanner Body (mm)	C (mm)	L (mm)	*Quantity Box/Bag*
200200721N	Pg 7	12,5	5- 7	13	14	5	13-16	100/100
200200921N	Pg 9	15,5	8-10	15	17	6	14-17	300/100
200201121N	Pg11	19	8-10	18	20	6	14-18	100/50
200201321N	Pg13,5	20,5	10-12	20	22	6,5	16-19	100/50
200201621N	Pg16	22,5	12-14	22	24	6,5	17-20	50/50
200202121N	Pg21	29	17-19	28	30	7	19-23	50/50
200202921N	Pg29	37	26-28	37	40	8	21-25	15/15
200203621N	Pg36	47	33-35	47	50	9	24-30	10/10
200204221N	Pg42	54	39-41	54	57	10	28-34	10/10
200204821N	Pg48	60	43-45	60	64	10	30-36	10/10



BSP thread ISO 228/1

Ref. Brass	P	Fixing Hole Ø (mm)	Ø A min-max (mm)	B1 Spanner Head (mm)	B2 Spanner Body (mm)	C (mm)	L (mm)	*Quantity Box/Bag*
200101441	G1/4"	13,5	5,5- 7	13	15	6,5	14-17	400/100
207101441	G1/4"	13,5	5,5- 7	13	Ø15	6,5	14-17	400/100
200103841	G3/8"	17	6,5- 8,5	17	19	7,5	15-19	200/100
200101241	G1/2"	21,5	8 -11	21	23	8	17-23	100/100
200105841	G5/8"	23,5	11 -14	23	25	8,5	20-24	100/50
200103441	G3/4"	27	14,5-17,5	27	29	9	20-26	50/50
200110041	G1"	34	18 -22	34	36	10	23-28	25/25
200111841	G1"1/8	38	21 -26	38	40	10,5	23-28	25/25
200111441	G1"1/4	42	28 -32	42	45	11,5	25-31	20/20
200111241	G1"1/2	48	32 -36	48	50	11,5	28-35	20/20
200120041	G2"	60	38 -42	60	64	13,5	31-37	10/10
• **200121221**	G2"1/2	76	44 -57	80	80	20	32-37	5/5
• **200130021**	G3"	89	67 -69	95	95	20	42-52	5/5



Add to Ref: N for NICKEL PLATED BRASS
• Sealing ring: CLOROPRENE

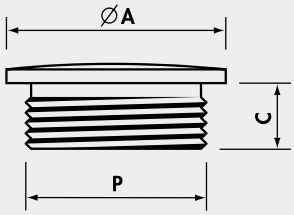
Technical data pages 161 to 164

ENTRY PLUGS AND BUSHES

2053
2052
2021

Brass

Material: Entry plugs - NICKEL PLATED BRASS (CuZn 40 Pb 3)
Entry bushes - PLAIN BRASS
Protection: Entry plugs - IP 54



Entry plugs

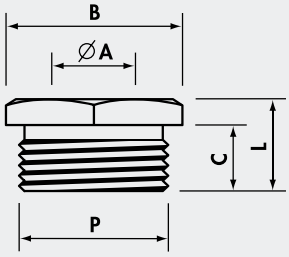
Metric thread M 1,5 pitch CEI EN 60423

Ref. Nickel Plated Brass	P	∅ A (mm)	C (mm)	*Quantity Box/Bag*
2053M12N	M12X1,5	14	5	1.500/100
2053M16N	M16X1,5	18	5	1.000/100
2053M20N	M20X1,5	22	6,5	500/100
2053M25N	M25X1,5	28	7	200/100
2053M32N	M32X1,5	35	8	150/50
2053M40N	M40X1,5	44	8,5	100/50
2053M50N	M50X1,5	54	9	50/25
2053M63N	M63X1,5	67	10	25/25

Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Nickel Plated Brass	P	∅ A (mm)	C (mm)	*Quantity Box/Bag*
2052007N	Pg 7	14	5	1.500/100
2052009N	Pg 9	17	6	1.000/100
2052011N	Pg11	20	6	500/100
2052013N	Pg13,5	22	6,5	500/100
2052016N	Pg16	24	6,5	500/100
2052021N	Pg21	30	7	200/50
2052029N	Pg29	39	8	100/25
2052036N	Pg36	50	9	50/50
2052042N	Pg42	57	10	25/25
2052048N	Pg48	64	10	25/25

Entry bushes



BSP thread ISO 228/1

Ref. Brass	P	∅ A (mm)	B Spanner (mm)	C (mm)	L (mm)	*Quantity Box/Bag*
2021014	G1/4"	10	13	6	8,5	1.000/100
2021038	G3/8"	12	17	7,5	10,5	800/100
2021012	G1/2"	16	21	9,5	13	400/100
2021058	G5/8"	18	23	10	13,5	250/50
2021034	G3/4"	21	27	10	14	200/50
2021100	G1"	26,5	34	11	15,5	100/50
2021118	G1"1/8	31	38	12	16,5	100/25
2021114	G1"1/4	35	42	13	18	50/25
2021112	G1"1/2	41,5	48	13	18,5	50/25
2021200	G2"	51,5	60	13,5	19,5	25/25

Add to Ref: N for NICKEL PLATED BRASS

LOCKNUTS

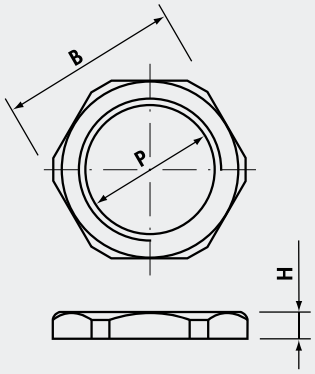
Brass

2033
2032
2031

Material: Metric & Pg threads
NICKEL PLATED BRASS (CuZn 40 Pb 3)
BSP thread - PLAIN BRASS

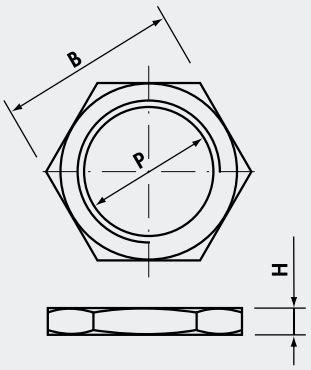
Metric thread M 1,5 pitch CEI EN 60423

Ref. Nickel Plated Brass	P	B Spanner (mm)	H (mm)	*Quantity Box/Bag*
2033M12N	M12X1,5	15	2,8	2.000/100
2033M16N	M16X1,5	19	2,8	1.000/100
2033M20N	M20X1,5	24	3	1.000/100
2033M25N	M25X1,5	29	3,5	500/100
2033M32N	M32X1,5	36	4	400/100
2033M40N	M40X1,5	46	4,5	150/50
2033M50N	M50X1,5	55	5	100/50
2033M63N	M63X1,5	70	5,5	50/50



Pg thread DIN 40 430 - Dimensions DIN 46 320

Ref. Nickel Plated Brass	P	B Spanner (mm)	H (mm)	*Quantity Box/Bag*
2032007N	Pg 7	15	2,8	2.400/100
2032009N	Pg 9	18	2,8	2.000/100
2032011N	Pg11	21	3	1.600/100
2032013N	Pg13,5	23	3	1.000/100
2032016N	Pg16	26	3	600/100
2032021N	Pg21	32	3,5	500/100
2032029N	Pg29	41	4	100/50
2032036N	Pg36	51	5	100/10
2032042N	Pg42	60	5	50/10
2032048N	Pg48	64	5,5	50/10



BSP thread ISO 228/1

Ref. Plain Brass	P	B Spanner (mm)	H (mm)	*Quantity Box/Bag*
2031014	G1/4"	15	3	2.400/100
2031038	G3/8"	19	3	2.000/100
2031012	G1/2"	24	3,5	1.000/100
2031058	G5/8"	26	4	500/50
2031034	G3/4"	30	4	500/50
2031100	G1"	37	4	250/25
2031118	G1"1/8	41	4,5	200/25
2031114	G1"1/4	45	4,5	200/20
2031112	G1"1/2	52	5,5	100/20
2031200	G2"	64	7	50/10
2031212	G2"1/2	80	7	20/5
2031300	G3"	95	8	20/5

Add to Ref: N for NICKEL PLATED BRASS

ENTRY THREAD ADAPTERS

2093
2043
20A4

Nickel Plated Brass

Material: NICKEL PLATED BRASS (CuZn 40 Pb 3)

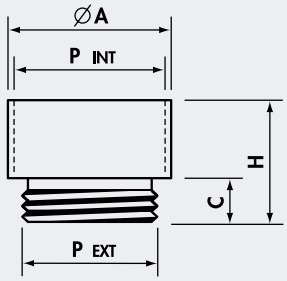


Fig. 1

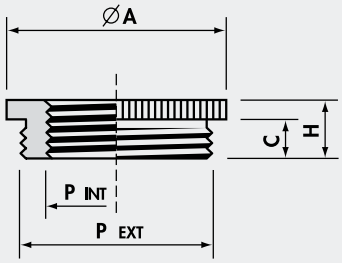


Fig. 2

Entry thread enlargers

Metric thread M 1,5 pitch CEI EN 60423

Ref.	P EXT	P INT	Ø A (mm)	C (mm)	H (mm)	Quantity Box/Bag
20931216N	M12X1,5	M16X1,5	18	5	15,5	500/100
20931620N	M16X1,5	M20X1,5	22	5	17,5	300/100
20932025N	M20X1,5	M25X1,5	27	6	20	150/50
20932532N	M25X1,5	M32X1,5	34	7	22,5	100/50
20932540N	M25X1,5	M40X1,5	42	7	23,5	50/50
20933240N	M32X1,5	M40X1,5	42	8	24,5	50/50
20933250N	M32X1,5	M50X1,5	52	8	27,5	25/25
20934050N	M40X1,5	M50X1,5	52	8	27,5	25/25
20935063N	M50X1,5	M63X1,5	66	9	31	20/10

Entry thread reducers

Metric thread M 1,5 pitch CEI EN 60423

Ref.	P EXT	P INT	Ø A (mm)	C (mm)	H (mm)	Quantity Box/Bag
20431612N	M16X1,5	M12X1,5	18	5	7,5	1.000/100
20432012N	M20X1,5	M12X1,5	22	6	9	600/100
20432016N	M20X1,5	M16X1,5	22	6	9	500/100
20432512N	M25X1,5	M12X1,5	27	7	10	300/50
20432516N	M25X1,5	M16X1,5	27	7	10	300/50
20432520N	M25X1,5	M20X1,5	27	7	10	300/100
20433220N	M32X1,5	M20X1,5	34	8	11	100/25
20433225N	M32X1,5	M25X1,5	34	8	11	200/50
20434025N	M40X1,5	M25X1,5	43	8	11,5	100/25
20434032N	M40X1,5	M32X1,5	43	8	11,5	100/25
20435032N	M50X1,5	M32X1,5	53	9	12,5	50/10
20435040N	M50X1,5	M40X1,5	53	9	12,5	50/25
20436340N	M63X1,5	M40X1,5	66	10	14	30/10
20436350N	M63X1,5	M50X1,5	66	10	14	30/10

Entry thread converters - Metric to Pg

Ref.	P EXT	P INT	Fig.	Ø A (mm)	C (mm)	H (mm)	Quantity Box/Bag
20A42011N	M20X1,5	Pg11	1	22	6,5	17,5	300/100
20A42016N	M20X1,5	Pg16	1	24	6,5	20	200/50
20A42513N	M25X1,5	Pg13,5	2	27	7	10	300/50
20A42516N	M25X1,5	Pg16	2	27	7	10	300/50
20A43216N	M32X1,5	Pg16	2	36	8	11,5	100/25
20A43221N	M32X1,5	Pg21	2	36	8	11,5	100/25

Entry thread converters - Pg to Metric

20A40916N	Pg 9	M16X1,5	1	20	6	15	100/100
20A41120N	Pg11	M20X1,5	1	22	6	16	100/100
20A41320N	Pg13,5	M20X1,5	1	24	6,5	16,5	50/50
20A41620N	Pg16	M20X1,5	2	24	6,5	9,5	50/50
20A42120N	Pg21	M20X1,5	2	30	7	10	100/100
20A42125N	Pg21	M25X1,5	2	30	7	10	100/100
20A42925N	Pg29	M25X1,5	2	39	8	11,5	50/50

ENTRY THREAD ADAPTERS

Nickel Plated Brass

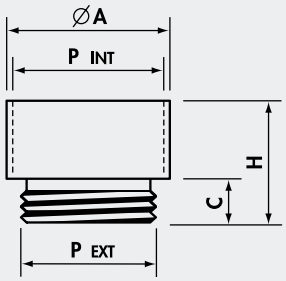
1800 2042

Entry thread enlargers

Pg thread DIN 40 430 - Dimensions DIN 46 320-K

Ref.	P EXT	P INT	∅ A (mm)	C (mm)	H (mm)	*Quantity Box/Bag*
180709	Pg 7	Pg 9	17	5	15	600/100
180911	Pg 9	Pg11	20	6	16,5	500/100
180913	Pg 9	Pg13,5	22	6	17,5	300/100
181113	Pg11	Pg13,5	22	6	17,5	300/100
181116	Pg11	Pg16	24	6	18,5	200/50
181316	Pg13,5	Pg16	24	6,5	19	200/50
181321	Pg13,5	Pg21	30	6,5	21	150/50
181621	Pg16	Pg21	30	6,5	21	100/25
182129	Pg21	Pg29	39	7	23	75/25
182936	Pg29	Pg36	50	8	27,5	30/10
183642	Pg36	Pg42	57	9	31	20/10
184248	Pg42	Pg48	64	10	33	20/10

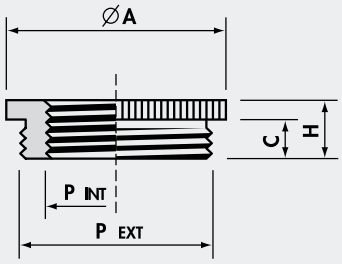
Material: NICKEL PLATED BRASS (CuZn 40 Pb 3)



Entry thread reducers

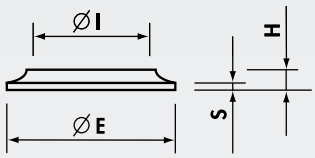
Pg thread DIN 40 430 - Dimensions DIN 46 320-H

Ref.	P EXT	P INT	∅ A (mm)	C (mm)	H (mm)	*Quantity Box/Bag*
20420907N	Pg 9	Pg 7	17	6	8,5	800/100
20421107N	Pg11	Pg 7	20	6	8,5	600/100
20421109N	Pg11	Pg 9	20	6	8,5	600/100
20421307N	Pg13,5	Pg 7	22	6,5	9	600/100
20421309N	Pg13,5	Pg 9	22	6,5	9	600/100
20421311N	Pg13,5	Pg11	22	6,5	9	600/100
20421607N	Pg16	Pg 7	24	6,5	9,5	300/50
20421609N	Pg16	Pg 9	24	6,5	9,5	400/100
20421611N	Pg16	Pg11	24	6,5	9,5	400/100
20421613N	Pg16	Pg13,5	24	6,5	9,5	400/100
20422111N	Pg21	Pg11	30	7	10	200/50
20422113N	Pg21	Pg13,5	30	7	10	200/50
20422116N	Pg21	Pg16	30	7	10	200/50
20422916N	Pg29	Pg16	39	8	11,5	100/25
20422921N	Pg29	Pg21	39	8	11,5	100/25
20423621N	Pg36	Pg21	50	9	12,5	100/25
20423629N	Pg36	Pg29	50	9	12,5	50/25
20424229N	Pg42	Pg29	57	10	14	50/25
20424236N	Pg42	Pg36	57	10	14	50/25
20424836N	Pg48	Pg36	64	10	14	50/25
20424842N	Pg48	Pg42	64	10	14	50/25



SPARES COMPRESSION WASHERS & SEALING RINGS

6010
1880
1890



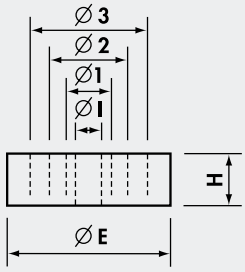
Compression washers

Material: Zinc plated STEEL UNI 5961/84

Ref.	Fits thread	Ø E (mm)	Ø I (mm)	H (mm)	S (mm)	Quantity Box/Bag
6010.14	G1/4"	11	8	1,1	0,5	15.000/1.000
6010.38	G3/8"	14,5	10	1,8	0,5	5.000/1.000
6010.12	Pg13,5 + G1/2"	18	14	1,5	0,5	4.000/1.000
6010.58	Pg16 + G5/8"	20	15,5	2	0,5	3.000/1.000
6010.34	G3/4"	24	18,5	2	0,5	2.500/500
6010.01	G1"	30	24,5	2	0,5	1.500/500
6010.114	G1"1/4	38	33,5	2	0,5	1.000/500
6010.11	Pg11	17	12	1,9	0,5	5.000/1.000
6010.21	Pg21	26,5	20	2,3	0,5	2.000/500
6010.29	Pg29 + G1"1/8	35	26,5	2	0,5	1.000/500
6010.36	Pg36 + G1"1/2	44,5	39	2	0,5	750/250
6010.42	Pg42	51	42,5	2,3	0,5	500/250
6010.48	Pg48 + G2"	56	47,5	3	0,5	400/100

Concentric sealing rings

Material: BUTADIENE-NITRILE NBR with concentric perforations

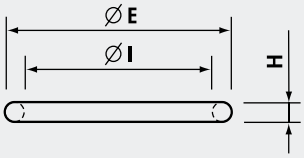


Ref.	Suitable only for Cable Glands IP54 (1700.., 2002..)	Ø E (mm)	Ø 3 (mm)	Ø 2 (mm)	Ø 1 (mm)	Ø I (mm)	H (mm)	Quantity Box/Bag
1880	Pg9	13,3	-	10	7,5	5	5,5	1.500/100
1881	Pg11	16,5	-	12,5	10	7,5	6	1.000/100
1882	Pg13,5	18,3	-	12,5	10	7,5	6	800/100
1883	Pg16	20,4	15	12,5	10	7,5	7	600/100
1884	Pg21	25,9	19	16	13	10	8	300/100
*1885	Pg29	34,7	27	24	21	18	9,5	150/50
1886	Pg36	44,7	33	30	27	24	12	100/50
*1887	Pg42	51,7	39	36	33	30	14	50/25
*1888	Pg48	56,9	45	42	39	36	14	75/25

*Dimensions DIN 46 320-7; material: CHLOROPRENE

O-rings

Material: Butadiene-Nitrile 70 sh

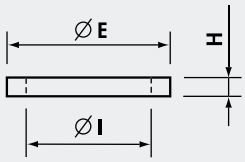


Ref.	Fits thread	Ø E (mm)	Ø I (mm)	H (mm)	Quantity Box/Bag
1889	M12	12,81	9,25	1,78	5.000/1.000
1890	Pg7 + G1/4"	14,38	10,82	1,78	5.000/1.000
1890A	M16 + Pg9 + G3/8"	15,98	12,42	1,78	5.000/1.000
1891	Pg11	19,16	15,60	1,78	5.000/1.000
1891A	M20	20,73	17,17	1,78	5.000/1.000
1892	Pg13,5 + G1/2"	22,33	18,77	1,78	5.000/1.000
1892A	Pg16 + G5/8"	23,91	20,35	1,78	5.000/1.000
1892B	M25	25,51	21,95	1,78	3.000/500
1893	Pg21	28,68	25,12	1,78	3.000/500
1893A	M32	30,00	26,00	2,00	2.000/500
1925.3	G3/4"	30,31	25,07	2,62	500
1894	G1"	35,06	29,82	2,62	2.000/500
1895	M40 + Pg29 + G1"1/8	39,84	34,60	2,62	1.000/500
1896	G1"1/4	43,01	37,77	2,62	1.000/500
1897	Pg36 + G1"1/2	49,36	44,12	2,62	800/100
1898	Pg42 + G1"3/4	55,71	50,47	2,62	800/100
1899	Pg48 + G2"	62,06	56,82	2,62	100
1899A	G2"1/2	76,50	69,44	3,53	1
1899B	G3"	92,60	81,92	5,34	1

357 FD

Material: BUTADIENE-STIRENE SBR 65 sh A
Temperature range: -20°C to +70°C
Colour: grey

Ref.	Fits thread	Ø E (mm)	Ø I (mm)	H (mm)	*Quantity* *Box/Bag*
3572007	Pg7	16,5	11,5	1	4.000/100
3572011	Pg11	23	17,5	1	2.500/100
35720131	Pg13,5 + M20X1,5 + G1/2"	27,5	20,5	1,4	1.000/100
3572013	Pg13,5	30	20,5	2,2	1.000/100
3572016	Pg16	29	23	2	1.000/100
3572021	Pg21	33,5	27	3	500/100
3573M16	M16X1,5	20,5	16,3	1	3.000/100
3573M20	M20X1,5 + Pg13,5 + G1/2"	25,5	20,5	1	4.000/100
3573M25	M25X1,5	30,5	25,5	1	2.000/100
3573M32	M32X1,5	40,5	32,5	1	1.500/100



Material: NEOPRENE® 80 sh A
Temperature range: -25°C to +100°C
Colour: black

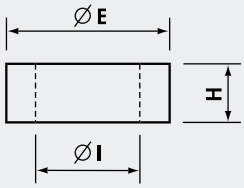
Ref.	Fits thread	Ø E (mm)	Ø I (mm)	H (mm)	*Quantity* *Box/Bag*
FDM 12	M12	15	10	1,2	50
FD 7	Pg7 + G1/4"	17	11,3	1,2	50
FD 9	Pg9 + M16 + G3/8"	20	13,9	1,2	50
FD 11	Pg11	23	17,1	1,2	50
FDM 20	M20	24	18	1,2	50
FD 13,5	Pg13,5 + G1/2"	25	19	1,2	50
FD 16	Pg16 + G5/8"	27	21	1,2	50
FDM 25	M25	30	23	1,2	20
FD 21	Pg21 + G3/4"	34	26,6	1,5	25
FDM 32	M32 + G1"	40	30	1,5	20
FD 29	Pg29 + G1"1/8"	45	35,2	1,5	25
FDM 40	M40 + G1"1/4	48	38	1,5	20
FD 36	Pg36 + G1"1/2"	56	45,2	1,5	25
FDM 50	M50	55	47,5	1,0	10
FD 42	Pg42 + G1"3/4"	62	52	1,0	10
FD 48	Pg48 + G2"	68	58	1,0	10
FDM 63	M63	68	60,5	1,0	5

SPARES SEALING RINGS

PVC 50 sh A

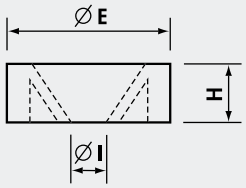
341
342
343
344

Material: PVC 50 sh A



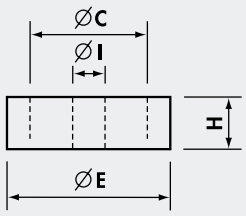
Cylindrical sealing rings

Ref.	Fits thread	C (mm)	Ø E (mm)	Ø I (mm)	H (mm)	Quantity Box/Bag
3411014	G1/4"	-	10,9	6,7	6	1.500/100
3411038	G3/8"	-	14,5	8,5	6	1.000/100
3411012	Pg13,5 + G1/2"	-	18	11	7,5	500/100
3412016	Pg16 + G5/8"	-	20	14	7,5	300/100
3422016	Pg16 + G5/8"	-	20	10	7,5	300/100
3411034	G3/4"	-	23,5	17,5	8	300/100
3411100	G1"	-	29	22	10	200/100
3412011	Pg11	-	16,5	10	7	1.000/100
3412021	Pg21	-	26	18	8,5	300/100
3422021	Pg21	-	26	13	8,5	250/50
3412029	Pg29 + G1"1/8	-	35	26	10	200/100



Membrane sealing rings

Ref.	Fits thread	C (mm)	Ø E (mm)	Ø I (mm)	H (mm)	Quantity Box/Bag
3431038	G3/8"	-	15	6	6	1.000/100
3431100	G1"	-	29	15	9,5	200/100



Double sealing rings

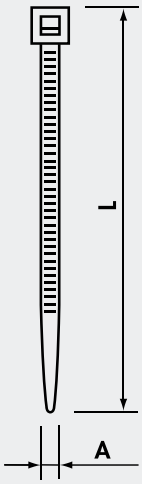
Ref.	Fits thread	C (mm)	Ø E (mm)	Ø I (mm)	H (mm)	Quantity Box/Bag
3441012	G1/2" + Pg13,5	13	18,5	8	6,5	500/100
3441034	G3/4"	17	23	12,5	8,5	300/100

CABLE & CONDUIT ACCESSORIES

G

G series, in PA6.6 Polyamide

Material: PA6.6 Polyamide
Self-extinguishing V2 (UL 94)
Humidity absorption:
2,5% (at 50% relative humidity)
Operating temperature:
From –40°C to +85°C (continuous)
From –40°C to +120°C (short periods)
Resistant to:
oils, bases, greases, oil products, chlorinated solvents.
Colour: Natural or Black (Ral 2005)



Black ties have higher UV resistance due to increased carbon black loading

Natural ties offer rapid installation due to the low friction coefficient of the material

Cable Ties in PA6.6

Type	L (mm)	A (mm)	Max. Bundle Ø (mm)	Min. Loop Tensile Strength (kg)	Quantity
G80x2.4	80	2,4	15	8	100
G80x2.4N					
G80x2.4/M					1000
G80x2.4N/M					
G90x2.4	90		16		100
G100x2.5	100	2,5	22		
G100x2.5N					
G100x2.5/M					1000
G100x2.5N/M					
G120x2.5	120		30		100
G140x2.5	140		33		
G140x2.5N					
G140x2.5/M					1000
G140x2.5N/M					1000
G160x2.5	160		40		100
G160x2.5N					
G160x2.5/M					1000
G160x2.5N/M					
G200x2.5	200		53		100
G200x2.5N					
G200x2.5/M					1000
G200x2.5N/M					
G250x2.8	250	2,8	65	14	100
G300x2.8	300		76		
G120x3.6	120	3,6	30	18	
G140x3.6	140		33		
G140x3.6N					
G140x3.6/M					1000
G140x3.6N/M					
G150x3.6	150		35		100
G180x3.6	180		44		
G200x3.6	200		53		
G200x3.6N					
G200x3.6/M					1000
G200x3.6N/M					
G250x3.6	250		65		100
G250x3.6N					
G300x3.6	300		76		
G300x3.6N					
G300x3.6/M					1000
G300x3.6N/M					
G370x3.6	370		102		100
G370x3.6N					
G120x4.8	120	4,8	24	22	
G120x4.8N					
G160x4.8	160		38		
G160x4.8N					
G190x4.8	190		46		
G190x4.8N					
G190x4.8/M					1000
G190x4.8N/M					
G200x4.8	200		50		100
G200x4.8N					
G200x4.8/M					1000
G200x4.8N/M					
G250x4.8/M	250		60		
G250x4.8N/M					

Minimum order: 1000 pcs

CABLE TIES

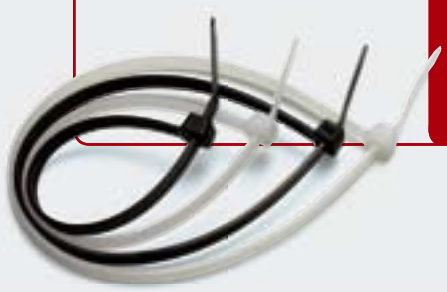
G series, in PA6.6 Polyamide

G

Cable Ties in PA6.6

Type	L (mm)	A (mm)	Max. Bundle Ø (mm)	Min. Loop Tensile Strength (kg)	Quantity	
G250x4.8	250	4,8	60	22	100	Minimum order: 100 pcs
G250x4.8N						
G280x4.8	280		70			
G300x4.8	300		76			
G300x4.8N						
G370x4.8	370		102			
G370x4.8N						
G390x4.8	390		105			
G390x4.8N						
G430x4.8	430		110			
G430x4.8N						
G450x4.8	450		116			
G450x4.8N						
G530x4.8	530		140			
G530x4.8N						
G150x7.6	150	7,6	33	55		
G150x7.6N						
G200x7.6	200		50			
G200x7.6N						
G250x7.6	250		65			
G250x7.6N						
G300x7.6	300		76			
G300x7.6N						
G370x7.6	370		102			
G370x7.6N						
G430x7.6	430		125			
G430x7.6N						
G530x7.6	530		140			
G530x7.6N						
G430x9.0	430	9,0	110	80		
G530x9.0	530		140			
G710x9.0	710		190			
G780x9.0	780		228			
G830x9.0	830		239			
G920x9.0	920		263			
G1020x9.0	1020		295			
G1220x9.0	1220		365			
G230x12.6	230	12,6	50	115		
G380x12.6	380		106			
G480x12.6	480		120			
G580x12.6	580		152			
G730x12.6	730		204			
G880x12.6	880		248			
G1030x12.6	1030		295			

Note: In Type, N = Black



Angled tongue to facilitate easy introduction into the buckle

Rounded corners for increased safety

CABLE TIES

G series, in PA6.6 Polyamide, VO (UL94)

G VO

Cable Ties in PA6.6 - VO (UL94)

Type	L (mm)	A (mm)	Max. Bundle Ø (mm)	Min. Loop Tensile Strength (kg)	Quantity	Minimum Qty
G90x2.4 VO	90	2,4	16	8	100	1000
G100x2.5/M VO	100	2,5	22		1000	
G140x2.5/M VO	140		33		1000	
G200x2.5/M VO	200		53		1000	
G150x3.6 VO	150	3,6	35	18	100	
G200x4.8/M VO	200	4,8	50	22	1000	
G370x4.8 VO	370		102		100	100
G430x4.8 VO	430		110		100	
G710x9.0 VO	710	9,0	190	80	100	

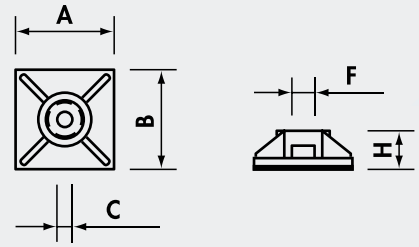
Features as G series ties except: self-extinguishing VO (UL 94)

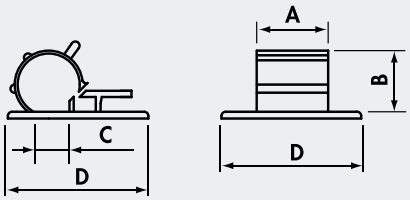
ACCESSORIES

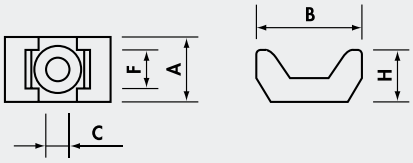
G

G series, in PA6.6 Polyamide

Material: PA6.6 Polyamide
Self-extinguishing V2 (UL 94)
Humidity absorption:
2,5% (at 50% relative humidity)
Operating temperature:
From –40°C to +85°C (continuous)
From –40°C to +120°C (short periods)
Resistant to:
oils, bases, greases, oil products,
chlorinated solvents.
Colour: Natural







PA6.6 self adhesive cable tie bases

Type	Max Tie (mm)	A (mm)	B (mm)	C (mm)	H (mm)	Fixing screw hole Ø (mm)	Quantity
AB 13	2,8	13,0	13,0	3,2	3,2	-	100
AB 19	3,6	19,0	19,0	4,0	4,4	3,1	100
AB 28	4,8	28,0	28,0	5,3	5,7	5,5	100

PA6.6 self adhesive cable clips

Type	Cable Ø (mm)	A (mm)	B (mm)	C (mm)	D (mm)	Quantity
CC 8.9	8-9	9,0	12,0	18,9	21,5	100
CC 9.12	9-12	12,0	15,0	17,0	21,5	100

PA6.6 cable tie saddle clamps

Type	Max Tie (mm)	A (mm)	B (mm)	C (mm)	F (mm)	H (mm)	Quantity
SS 4,8-3,7	4,8	9,5	15	3,7	5,0	7,2	100
SS 4,8-4,5	4,8	9,5	15	4,5	5,0	7,2	100
SS 9-4,5	9	16,0	22	4,5	9,2	9,7	100
SS 9-5	9	16,0	22	5,0	9,2	9,7	100
SS 9-6,4	9	16,0	22	6,4	9,2	9,7	100

POLYAMIDE CABLE TIE TOOLS

Type 5313022048

For ties from 2,2 to 4,8 mm
Automatic cutting
Weight : 0,2 kg
Length: 165 mm

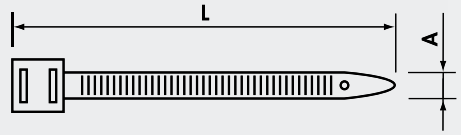
Type 5523036090

For ties from 4,8 to 9 mm
Manual cutting
Weight : 0,3 kg
Length: 195 mm

CABLE TIES

in PA12 Polyamide

HALOGEN FREE

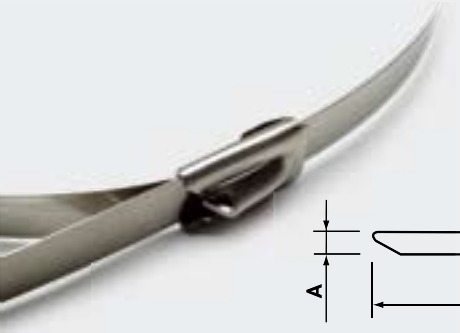


1600

Cable Ties in PA12 Polyamide

Type	L (mm)	A (mm)	Min. Bundle Ø (mm)	Max. Bundle Ø (mm)	Min. Loop Tensile	Quantity
1618.90	180	9	15	45	35	5.000/100
1626.90	265	9	30	65	51	2.500/100
1636.90	360	9	30	93	51	1.500/100
1651.90	510	9	70	140	54	100/100
1676.90	760	9	70	220	54	100/100

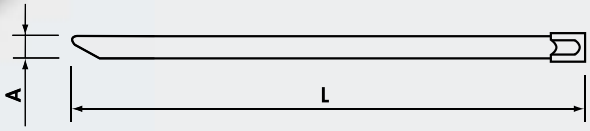
Material: PA12 Polyamide
Self-extinguishing HB (UL94)
Halogen free
Operating temperature:
From –45°C to + 85°C (continuous)
From –45°C to + 120°C (short periods)
Resistant to:
UV, salt atmosphere, oils, greases, oil products
Colour: Black



CABLE TIES

in Stainless Steel

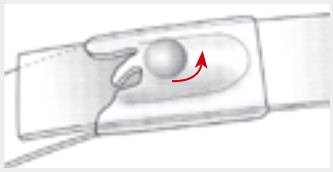
GX



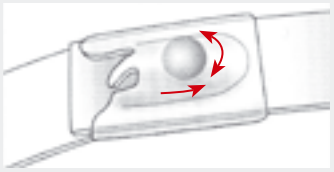
Stainless Steel Cable Ties

Type	L (mm)	A (mm)	Max. Bundle Ø (mm)	Min. Loop Tensile	Quantity
GX300x4.5	300	4,5	76	46	100
GX370x7.9	370	7,9	102	114	
GX680x7.9	680		207		
GX1020x7.9	1020		312		

Material: Stainless Steel
Unique ball locking mechanism that allows simple and rapid installation and secure locking.
Operating temperature:
From –80°C to +500°C
High tensile strength.
Non-flammability.
High resistance to acetic acid, alkalies, sulphuric acid, corrosion, etc.
In general very resistant to most hostile environments.



Insert the tongue into the buckle.
The internal locking ball rolls freely as the tie is tightened.



Once the correct tension is reached, use the tool below to trim the tongue.
The ball then wedges into the buckle locking it tightly against both the top and bottom of the tie.

STAINLESS STEEL CABLE TIE TOOL

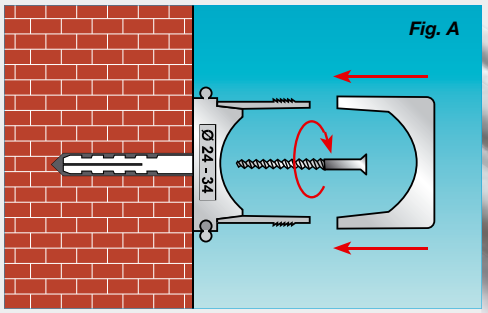
Type 5527030079

For ties from 0,3 to 7,9 mm
With cutting device
Weight: 0,56 kg
Length: 180 mm

3600

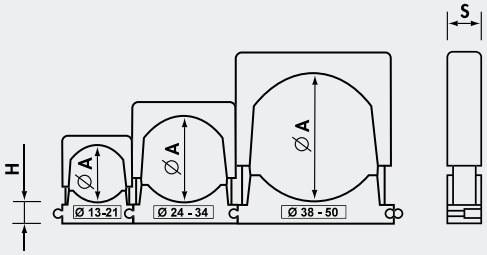
modular retaining clips - ABS

Application: Fix SICURclip base to surface using dia. 5 - 6 mm screw (Ref. Fig. A).
Insert cable, tubing or flexible conduit.
Fit adjustable cover and press to secure.
Modular SICURclips of the same or different size may easily be joined together.



Material: ABS self-extinguishing class V0 (UL94) UV stabilised
Glow wire resistance: 750° C (CEI EN 60695-2-1)
Temperature range:
–20°C to +80°C (continuous)
Colour: RAL 7035 light grey

SICURclips *for cable, tubing & fexible conduit*



Ref.	Ø A min-max (mm)	H (mm)	S (mm)	Quantity
3601	13-21	8,5	16	100
3602	24-34	8,5	16	50
3603	38-50	8,5	16	25

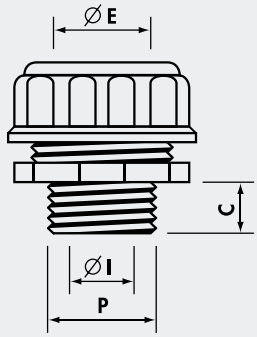
CONDUIT FITTINGS

1740

Polyamide PA6

Colour: RAL 7035 grey
For all conduits with metal protection: rigid, flexible, spiral, corrugated, etc.
High level of resistance: the action of sun, moisture or salinity does not affect the products, which are also impervious to fumes, acids, solvents and oils.
Suits outside diameters 13 - 40 mm .

Material: POLYAMIDE PA6
self-extinguishing class V0 (UL 94)
Temperature range:
–20°C to +90°C (continuous)



Pg thread DIN 40 430

Ref. Light Grey	P	Fixing Hole Ø (mm)	Ø E min-max (mm)	Ø I (mm)	C (mm)	Quantity *Box/Bag*
1740	Pg 9	15,5	13-15	9	9	100
* **1741**	Pg11	19	14-16,5	13	10	100
1742	Pg13,5	20,5	16-19	15	10	50
1743	Pg16	22,5	20-22	17	11	50
1744	Pg21	29	23-25,5	21	11	50/25
1745	Pg21	29	25-28,5	21	11	25
1746	Pg29	37	30-33	30	13	20/10
1747	Pg36	47	37-42	36	15	10

For nominal conduit diameters 16-20-25-32-40 mm

*Add to Ref: N for Black (RAL 9005)

MECHANICAL AND PNEUMATIC TOOLS

MECHANICAL TOOLS

nd® RANGE

A brand new generation of tools, with a unique mechanism to reduce operator effort.
Small and compact, with ergonomically designed handles for ease of operation.
High quality materials combined with advanced design and manufacturing technology, produce a reliable tool with a guaranteed consistent, crimping operation.

Type	Application	Conductor Size sqmm	Dimensions mm	Weight g
ND#1	*insulated and uninsulated end sleeves*	*0,3÷1,5*	190x72x21	470
ND#2		*1÷6*	190x72x21	470
ND#3		*6÷16*	190x72x21	470
ND#4		*0,5÷4*	190x72x21	470

ZKE 6-F

Tool for crimping end sleeves
0,5 to 6 sqmm
front insertion

ZKE 610

Single aperture, ratchet controlled tool for crimping end sleeves,
0,08 to 10 sqmm
side insertion

ZKE 2

For end sleeves
0,5 to 16 sqmm

MLL 90

Single aperture, ratchet controlled tool for crimping female connectors, open barrel, flag type
1 to 2,5 sqmm
side insertion

MECHANICAL TOOLS

Crimpstar® RANGE

The ratchet controlled tools in the Crimpstar® range, are compact, lightweight and easy to use.

Features include:
- High precision investment cast jaws.
- Ratchet controlled to ensure precise and consistent crimping.
- Emergency release lever.
- Toggle action leverage to reduce operator effort.
- Automatic handle opening following completion of the crimping operation.
- Ergonomically designed moulded plastic grips.

HP

K range, reinforced insulated terminal
HP 3-K for conductor size 0,25 to 6 sqmm

Insulated terminals and connectors
HP 1 for conductor sizes 0,2 to 2,5 sqmm
HP 3 for conductor sizes 0,25 to 6 sqmm
HP 1-1 same as HP 1 but with positioner
HP 3-1 same as HP 3 but with positioner

HNN

Nylon insulated terminals and connectors
HNN 3 for conductor sizes 1,5 to 10 sqmm
HNN 4 for conductor sizes 10 and 16 sqmm

HPH

End to end connectors
PE HD insulated, heat shrinkable.
HPH 1 for conductor sizes 0,5 to 6 sqmm

HNKE

End sleeves
HNKE 4 for conductor sizes 0,5 to 4 sqmm
HNKE 16 for conductor sizes 4 to 16 sqmm
HNKE 50 for conductor sizes 25 - 35 - 50 sqmm

HN

Uninsulated terminals and connectors
HN 1 for conductor sizes 0,25 to 10 sqmm
HN 5 for conductor sizes 10 and 16 sqmm

HF

Open barrel brass terminals:
HF 1 for conductors sizes 0,5 to 4 sqmm (not BN-FAB/FAR type)
HF 2 for conductors sizes 0,08 to 1,3 sqmm (28 to 16 AWG)

HX

Coaxial connectors
HX 1 for types RG58, RG59, RG62 and RG 71

MECHANICAL TOOLS

HP4

Ratchet controlled tooling for crimping insulated connectors

HP4-R
for conductors sizes 0,25 to 1,5 sqmm

HP4-B
for conductor sizes 1,5 to 2,5 sqmm

HP4-G
for conductor sizes 4 to 6 sqmm

HP4-C10

For sleeve connectors type C6-C6 and C10-C10.

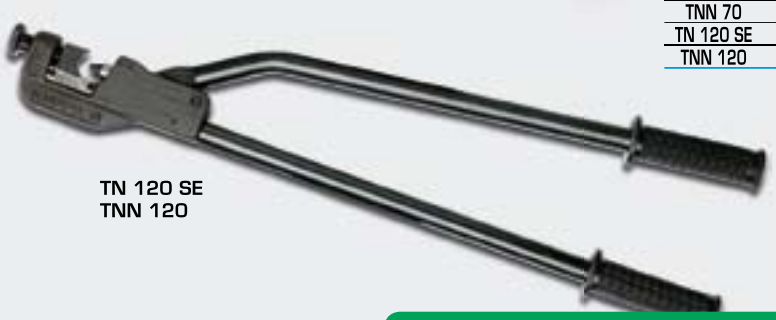
ZP2

For crimping insulated and uninsulated connectors, 0,25 to 6 sqmm

TN

TN 70 SE
TNN 70

Tool Type	Application	Cond. Size sqmm	Dimensions LxH mm	Weight kg
TN 70 SE	*uninsulated terminals and connectors*	*6÷70*	450 x 127	2
TNN 70	*Nylon insulated terminals and connectors*	*10÷70*	450 x 127	2
TN 120 SE	*uninsulated terminals and connectors*	*10÷120*	700 x 170	3
TNN 120	*Nylon insulated terminals and connectors*	*10÷120*	700 x 170	3



TN 120 SE
TNN 120

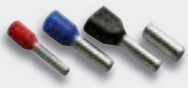
MECHANICAL TOOLS MARKETline RANGE

MLL 1

For crimping insulated terminals, 0,25 to 6 mm²

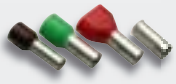
MLS 1

For crimping end sleeves 0,25 to 6 mm²



MLS 2

For crimping end sleeves 6 to 16 mm²



SCISSORS

SC 1

Electricians scissors with high carbon steel blades and satin finished Nylon handles.

SC 3X

Multi-purpose scissors with high hardness blades (52-54 HRC) and anti slide serrations. The moulded plastic handles combine a rigid structure with a softer material for finger comfort.

WIRE STRIPPERS

HB 29-U HB 40-U

Wire stripper, for circular cables.

- **Three types of cut:**
  - Circumferential
  - Linear
  - Spiral
- **Blade height adjustable to suit insulation thickness**
- **Blade profile suits difficult insulation**
- **PTFE blade housing reduces friction**

- **HB 29-U:** Ø 4,5 - 29 mm
- **HB 40-U:** Ø 19 - 40 mm

Dimensions:	HB 29-U	HB 40-U
Length mm:	138	153
Width mm:	38	54
Depth mm:	38	28
Weight g:	100	110

HB 1-U

Wire stripper, for PVC insulated cables 0,1 to 6 sqmm

HB 5

Wire stripper, for PVC insulated cables 0,25 to 6 sqmm

HB 7

A versatile tool for cutting, crimping, and stripping. Range: 0,2 to 6 mm²

HB 8

New

Wire stripper, for PVC insulated cables 0,2 to 6 sqmm

New model with improved characteristics

CABLE CUTTERS

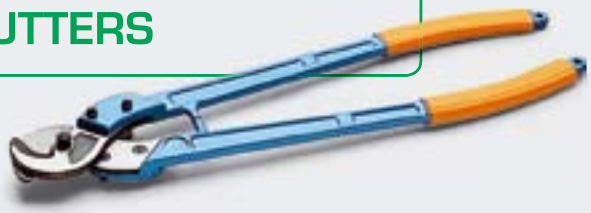
KT

KT 1
Hand operated tool
for cutting cables
up to a maximum Ø 15 mm

KT 2
Hand operated tool
for cutting cables
up to a maximum Ø 25 mm

KT 5
Hand operated tool
for cutting cables
up to max section 25 sqmm

CABLE CUTTERS



5116660250
For cutting cables 6 to 250 sqmm
Weight: 1,5 kg
Length: 600 mm

5116660500
For cutting cables 6 to 500 sqmm
Weight: 3 kg
Length: 800 mm

CABLE CUTTERS

KT 3
For cutting cables Ø max 32 mm
Weight: 0,59 kg
Length: 255 mm

KT 4
For cutting cables Ø max 52 mm
Weight: 0,89 kg
Length: 310 mm

HAND TOOL FOR CUTTING AND SEALING FLEXIBLE CONDUIT

KTS 1632

Cuts and seals flexibles plastic conduit in a single operation.
Lightweight and easy to operate.
Suitable for flexible conduits from Ø16 to Ø32 mm.

Length: 230 mm
Width: 58 mm
Thickness: 32 mm.
Weight: 0,32 kg.

PC 1

Plastic pipe cutting tool
Cutting capacity: Ø6 to Ø42 mm.

Body: die-cast aluminium alloy
Blade material:
hardened carbon steel

MECHANICAL HOLE PUNCHING TOOL FOR CABLE TRUNKING

MT-FC47

Table denotes the punch/die set reference, for each hole size.
Suitable for punching holes in mild steel, fibreglass or plastic material, up to 3 mm thick.

Hole Dimensions					Maximum thickness of mild steel mm	Code
Ø mm	Ø inch	Pg	ISO	Tube		
15,2	.598	Pg 9	-	-		RD 15,2 S
16,2	.638	-	ISO-16	-		RD 16,2 S*
17,5	.688	-	-	-		RD 17,5 S*
18,6	.732	Pg 11	-	-		RD 18,6 S
19,1	.750	-	-	-		RD 19,1 S*
20,4	.803	Pg 13,5	ISO-20	-		RD 20,4 S
20,6	.812	-	-	-		RD 20,6 S*
22,5	.885	Pg 16	-	1/2"	2	RD 22,5 S
23,8	.937	-	-	-		RD 23,8 S*
25,4	1.000	-	ISO-25	-		RD 25,4 S*
27,0	1.063	-	-	-		RD 27 S*
28,3	1.115	Pg 21	-	3/4"		RD 28,3 S
28,6	1.125	-	-	-		RD 28,6 S*
30,5	1.210	-	-	-		RD 30,5 S*
31,8	1.250	-	-	-		RD 31,8 S*
32,5	1.280	-	ISO-32	-		RD 32,5 S*
34,6	1.357	-	-	1"		RD 34,6 S*
34,9	1.375	-	-	-		RD 34,9 S*
37,0	1.457	Pg 29	-	-		RD 37 S
38,1	1.500	-	-	-	3	RD 38,1 S*
40,5	1.594	-	ISO-40	-		RD 40,5 S*
41,3	1.625	-	-	-		RD 41,3 S*
43,2	1.699	-	-	1-1/4"		RD 43,2 S*
44,5	1.750	-	-	-		RD 44,5 S*
47,0	1.850	Pg 36	-	-		RD 47 S

**available upon request*

Lightweight and easy to operate tool, designed for punching holes up to 47 mm diameter in the side wall of trunking without the need for pre drilling.

Max centre of hole to edge of trunking: 52 mm

Length : 247 mm
Width: 224 mm
Thickness : 66 mm
Weight: 2,78 kg

BENCH PRESS TOOLS

BENCH PRESS TOOLS

PNB-1

INTERCHANGEABLE DIES (to be ordered separately)

Die Set	Guard*	Type of connector			Conductor Size sqmm
PV-1	PU-1	*Insulated connectors*		*green*	0,2÷0,5
PR-1				*red*	0,25÷1,5
PB-1				*blue*	1,5÷2,5
PG-1				*yellow*	4÷6
KE 0,75-1	PK-1	*End Sleeves*		*KE, PK...*	0,3 - 0,5 - 0,75
KE 2,5-1					1 - 1,5 - 2,5
KE 10-1					4 - 6 - 10
MTT 16-50	ME-1				16
MTT 25-50					25
N1-1	PU-1	A 03-M..	S 1,5-..		0,25 - 1,5
		A 06-M..	S 2,5-..		1,5 - 2,5
		A 1-M..	S 6-..		4 - 6
ME 1-50	PU-1	*Bare copper lugs*		*A1-M..*	4 - 6
ME 2-50	ME-1			*A2-M..*	*S10-M..* 10
ME 3-50				*A3-M..*	16
ME 5-50				*A5-M..*	25
ME 7-50				*A7-M..*	35
ME 9-50				*A9-M..*	
ME 10-50				*A10-M..*	50
ME 12-50				*A12-M..*	
MN 2RF-50	MN RF-1	*Nylon insulated lugs*		*ANE2-M..*	10
MN 3RF-50				*ANE3-M..*	16
MN 5RF-50				*ANE5-M..*	25
MN 7RF-50				*ANE7-M..*	35
				ANE9-M..	

** Supplied as standard with the machine*

Hydro-pneumatic, production bench press, controlled by a foot operated pedal.
Extensive range of inter-changeable dies available for crimping a wide variety of connectors.
Producing a consistent and reliable crimped connection

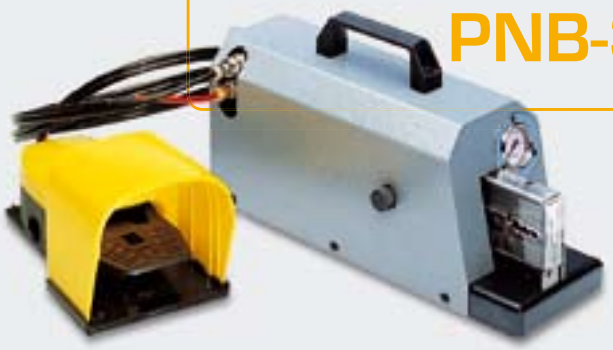
Technical details:
- Nominal operating pressure: 7 bar
- Dimensions LxDxH: 180x320x700 mm
- Weight: 23 kg (without dies)

NOTE: for applications not listed, please contact Cembre.

PNB-3

Type	Connector Type	Conductor Size sqmm
PNB-3P*	*Insulated connectors red, blue and yellow*	0,25÷6
PNB-3PD	*Insulated terminals and butt connectors - frontal insertion*	0,25÷6
PNB-3N1	*Uninsulated terminals*	0,25÷10
PNB-3N5	*Uninsulated terminals*	10÷16
PNB-3NN3	*Nylon insulated terminals*	1,5÷10
PNB-3NN4	*Nylon insulated terminals*	10÷16
PNB-3F/M	*Bullet connectors*	0,5÷2,5

** Will also crimp Polycarbonate fully-insulated terminals if fitted with PNB3F/M positioner, available as an optional accessory.*



Technical details:
- Normal operating pressure: 6÷7 bar
- Dimensions LxDxH: 130x370x195 mm
- Weight: 10,3 kg

Pneumatic bench press operated by foot pedal for crimping terminals and connectors 0,25 to 16 sqmm.

PNB-4KE

Tool	Connector Type	Conductor Size sqmm
PNB-4KE	*End Sleeves type PK.. and type KE*	0.3÷10

Technical details:
- Nominal operating pressure: 6 bar
- Dimensions LxDxH: 120x160x300mm
- Weight: 6 kg

Pneumatic bench press, controlled by a foot operated pedal. Supplied with a multi-aperture die suitable for crimping insulated and uninsulated end sleeves from 0,3 to 10 sqmm. Compacted and efficient. Easy to operate, producing a secure and reliable crimped connection.

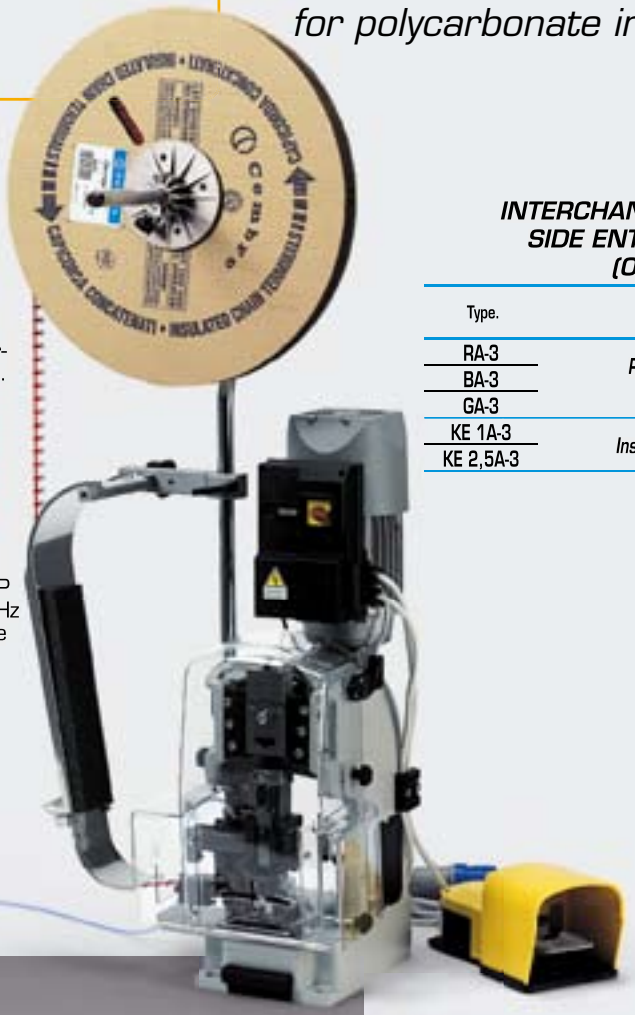
BENCH PRESS

ELB-3

for polycarbonate insulated chain connectors

Electro-pneumatic, production bench press, controlled by a foot operated pedal.
Producing a consistent and reliable crimped connection.
Interchangeable application heads available to suit the complete range of polycarbonate insulated connectors.

Technical details:
Air supply: 6 bar (90 psi)
Dimensions LxDxH:
180x250x620mm
Weight: 41 kg
(without applicator heads)
Motor:
- Power 0,55 kW / 0,75 HP
- Supply Voltage 220 V / 50 Hz
- Speed 2.800 turns/minute



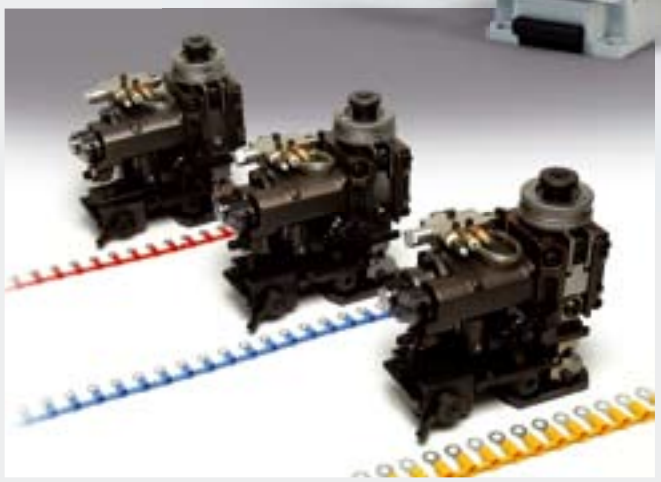
INTERCHANGEABLE APPLICATOR HEADS, SIDE ENTRY WITH PNEUMATIC FEED (ORDER AS REQUIRED)

Type.	Connectors		Conductor Size sqmm
RA-3	*Polycarbonate insulated chain terminals*	*red*	0,25÷1,5
BA-3		*blue*	1,5÷2,5
GA-3		*yellow*	4÷6
KE 1A-3	*Insulated chain end sleeves*		0,5÷1
KE 2,5A-3			1÷2,5

c UL us LISTED

HALOGEN FREE

OPERATING TEMPERATURE UP TO 115°C



See pages 6-7 and 16 for types and features of the insulated chain connectors and end sleeves.

HYDRAULIC CRIMPING TOOLS AND CUTTERS

HYDRAULIC CRIMPING TOOL

HT 45-E

general features

Crimping force kN	Dimensions mm		Weigth kg
	length	*width*	
50	346	130	2,0

Lightweight and compact, this tool is ideal for the compression of connectors on over head lines and other general applications.

Having the benefit of spring loaded handles, the dies can be advanced using only one hand; therefore leaving the other hand free to position the connector.

For ease of operation and comfort of the operator, the tool head can be fully rotated through 180 degrees.

The built-in safety valve will by-pass the oil supply when the maximum pressure is reached, and a pressure releasing system can easily be operated at any stage of the compression.

MAIN APPLICATIONS - max section mm²		
L.V. lugs and splices	"C" sleeve connectors	H.V. lugs and splices
150	35	70

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P1*	445x290xh95	1,2	❊	–

**Suitable for storage of the tool and 20 sets of dies.*

The operator can advance the dies using only one hand, leaving the other hand free to position the connector.

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

HYDRAULIC CRIMPING TOOL

general features

HT 51

Crimping force kN	Dimensions mm		Weight kg
	length	*width*	
50	380	130	2,7

MAIN APPLICATIONS - max section mm²			
L.V. lugs and splices	Insulated terminals	End sleeves	"C" sleeve Connectors
240	70	50	70

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P1*	445x290xh95	1,2	❊	—

** Suitable for storage of the tool and 20 sets of dies.*

HT 51-KV version also available for Power Supply Companies

New design two speed hydraulic tool, lightweight and compact, this tool is ideal for working in confined spaces. Having the benefit of spring loaded handles, the dies can be advanced using only one hand; therefore leaving the other hand free to position the connector.
For ease of operation and comfort of the operator, the tool head can be fully rotated through 180 degrees.
The built-in safety valve will by-pass the oil supply when the maximum pressure is reached, and a pressure release system can easily be operated at any stage of the compression.

HYDRAULIC PRESSHEAD

general features

RH 50

Crimping force kN	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
50	700	196	75	1,6

MAIN APPLICATIONS - max section mm²			
L.V. lugs and splices	Insulated terminals	End sleeves	"C" sleeve Connectors
240	70	50	70

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P1*	445x290xh95	1,2	❊	—
Canvas bag 007	350x105	0,13	—	❊

** Suitable for storage of the tool and 20 sets of dies.*

Hydraulic presshead complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138) RH 50 is suitable for installing the same range of connectors as HT 51.

HYDRAULIC PRESSHEAD

general features

RHM 50

Crimping force kN	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
50	700	210	70	1,3

MAIN APPLICATIONS - max section mm²		
L.V. lugs and splices	Insulated terminals	End sleeves
240	70	50

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P1*	445x290xh95	1,2	❊	—
Canvas bag 007	350x105	0,13	—	❊

** Suitable for storage of the tool and 20 sets of dies.*

Particularly suitable for high volume bench crimping.

Hydraulic presshead complete with quick automatic coupler for connection to hydraulic pump with working pressure of 700 bar max, (see page 136-138).
RHM50 is suitable for installing the same range of connectors as RH50.

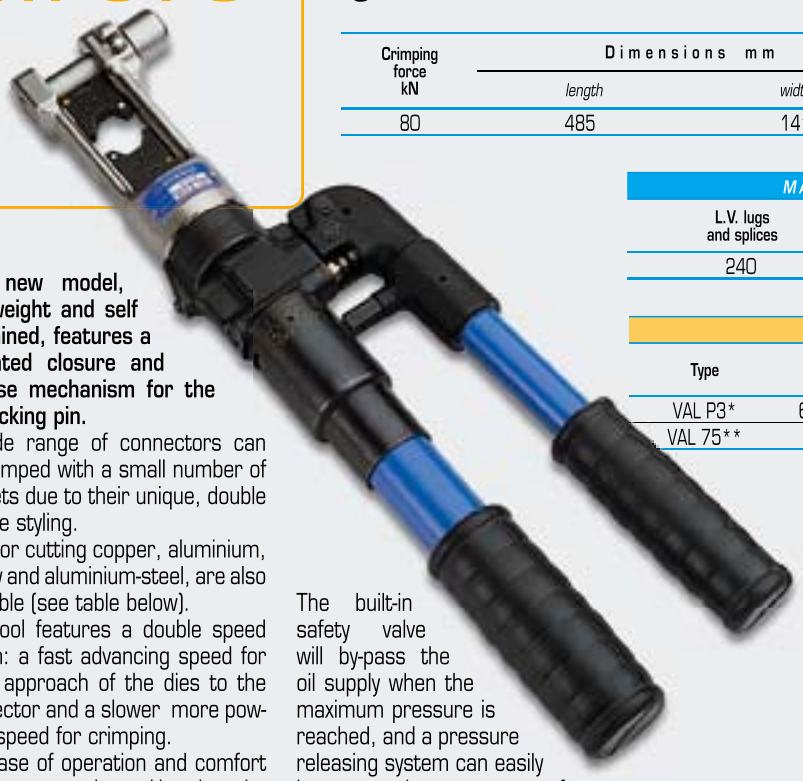
These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

HYDRAULIC CRIMPING TOOL

HT 81-U

general features

Crimping force kN	Dimensions mm		Weight Kg
	length	width	
80	485	141	3,4



MAIN APPLICATIONS - max section mm²		
L.V. lugs and splices	"C" sleeve connectors	H.V. lugs and splices
240	100	200

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P3*	620x380xh135	2,5	❊	—
VAL 75**	270x80xh30	0,15	—	❊

* Suitable for storage of the tool and three VAL 75.
**Suitable for storing five sets of dies.

This new model, lightweight and self contained, features a patented closure and release mechanism for the die locking pin.
A wide range of connectors can be crimped with a small number of die sets due to their unique, double groove styling.
Dies for cutting copper, aluminium, aldrey and aluminium-steel, are also available (see table below).
The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.
For ease of operation and comfort of the operator the tool head can be fully rotated through 180 degrees.

The built-in safety valve will by-pass the oil supply when the maximum pressure is reached, and a pressure releasing system can easily be operated at any stage of the compression.

HYDRAULIC PRESSHEAD

RHU 81

general features

CE

Crimping force kN	Max operating pressure bar	Dimensions mm		Weight kg
		length	width	
80	700	235	91	1,9

MAIN APPLICATIONS - max section mm²		
L.V. lugs and splices	"C" sleeve connectors	H.V. lugs and splices
240	100	200

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
Canvas bag 007	350x105	0,13	—	❊

Hydraulic presshead complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138).
This new model, lightweight and self contained, features a patented closure and release mechanism for the die locking pin.
The head is easy to use and is ideally suited for crimping in confined spaces.
RHU81 is suitable for installing the same range of connectors as HT 81-U.

HT 81-U and RHU 81 ACCESSORIES FOR CUTTING CONDUCTORS		
Die Type	Cutting Capacity	Conductor Type
MB2-80U	Ø 16 mm	Cu, Alu, Aldrey and Alu-Steel
	This die is suitable to cut steel conductors (R ≤ 160 daN/mm²) having the most common strandings, i.e.: 19 x 1,2 = Ø est. 6,0 mm 7 x 3,0 = Ø est. 9,0 mm 19 x 2,1 = Ø est. 10,5 mm 19 x 2,3 = Ø est. 11,5 mm	
MB3-80U	Suitable to cut aluminium strands of 150 mm² aluminium-steel conductors, without damage to the steel core	

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

HYDRAULIC CRIMPING TOOL

HT 120

general features

Crimping force kN	Dimensions mm		Weight kg
	length	*width*	
120	488	138	5,7

MAIN APPLICATIONS - max section mm²					
L.V. lugs	L.V. splices	Insulated terminals	"C" sleeve connectors	H.V. lugs	H.V. splices
400	240	240	185	400	240

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P3*	620x380xh135	2,5	❄	–

**Suitable for storage of the tool and 14 sets of dies.*

The built-in safety valve will by-pass the oil supply when the maximum pressure is reached, and a pressure release system can easily be operated at any stage of the compression.

This lightweight and self contained tool will accept the semi-circular slotted dies, common to most 130 kN tools.

It is particularly suitable for installing crimp type electrical connectors for overhead line applications.

The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.

For ease of operation and comfort of the operator the tool head can be fully rotated through 180 degrees.

HT 120-KV version also available for Power Supply Companies

Die release system, protected from accidental operation

HT 120 features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.

Pressure release trigger, which can be operated at any stage of the compression.

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

HYDRAULIC CRIMPING TOOL

HT 131-C

general features

Crimping force kN	Dimensions mm		Weight kg
	length	width	
130	473	144	5,5

This new model, self contained, robust and sturdy, will accept all semi-circular slotted dies, common to most 130 kN tools.
The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.
For ease of operation and comfort of the operator the tool head can be fully rotated through 180 degrees.

MAIN APPLICATIONS - max section mm²					
L.V. lugs	L.V. splices	Insulated terminals	"C" sleeve connectors	H.V. lugs	H.V. splices
400	240	240	185	400	240

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P3*	620x380xh135	2,5	❊	—

*Suitable for storage of the tool and 14 sets of dies

The built-in safety valve will by-pass the oil supply when the maximum pressure is reached, and the pressure release system can easily be operated at any stage of compression.

HYDRAULIC PRESSHEADS

RHC 131

general features

CE

Crimping force kN	Max operating pressure bar	Dimensions mm		Weight kg
		length	width	
130	700	232	124	3,8

MAIN APPLICATIONS - max section mm²					
L.V. lugs	L.V. splices	Insulated terminals	"C" sleeve connectors	H.V. lugs	H.V. splices
400	240	240	185	400	240

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P8*	445x290xh115	1,2	—	❊

*Suitable for storage of the head and 14 sets of dies

Hydraulic presshead complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138) **This new design with improved mechanical features**, is suitable for installing the same range of connectors as HT 131-C.

RHM 132

general features

CE

Crimping force kN	Max operating pressure bar	Dimensions mm		Weight kg
		length	width	
130	700	216	80	3,1

Particularly suitable for high volume bench crimping.

MAIN APPLICATIONS - max section mm²		
L.V. lugs	Insulated terminals	H.V. lugs
400	240	400

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P8*	445x290xh115	1,2	—	❊

*Suitable for storage of the head and 14 sets of dies

Hydraulic presshead complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138).

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

HYDRAULIC CRIMPING TOOL

HT 131L-C

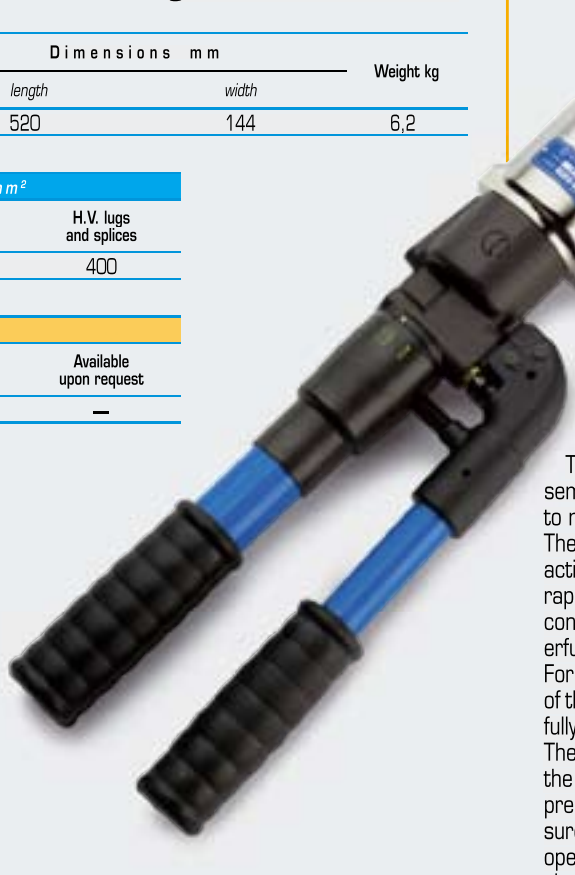
general features

Crimping force kN	Dimensions mm		Weight kg
	length	*width*	
130	520	144	6,2

MAIN APPLICATIONS - max section mm²			
L.V. lugs and splices	Insulated terminals	"C" sleeve connectors	H.V. lugs and splices
400	240	185	400

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P3*	620x380xh135	2,5	❄	—

**Suitable for storage of the tool and 12 sets of dies*



Hydraulic "C" head tool with a large 42 mm jaw opening, for easier introduction/ removal of large size compression terminations and joints.

The HT131L-C will accept all semi-circular slotted dies, common to most 130 kN tools.

The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.

For ease of operation and comfort of the operator the tool head can be fully rotated through 180 degrees.

The built-in safety valve will by-pass the oil supply when the maximum pressure is reached, and the pressure release system can easily be operated at any stage of compression.

HYDRAULIC PRESSHEAD

RHC 131L

CE

general features

Crimping force kN	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
130	700	270	124	4,8

MAIN APPLICATIONS - max section mm²			
L.V. lugs and splices	Insulated terminals	"C" sleeve connectors	H.V. lugs and splices
400	240	185	400

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P8*	445x290xh115	1,2	—	❄

**Suitable for storage of the head and 14 sets of dies*

Hydraulic head featuring a large 42 mm jaw opening; complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138).

Is suitable for installing the same range of connectors as HT 131-C.

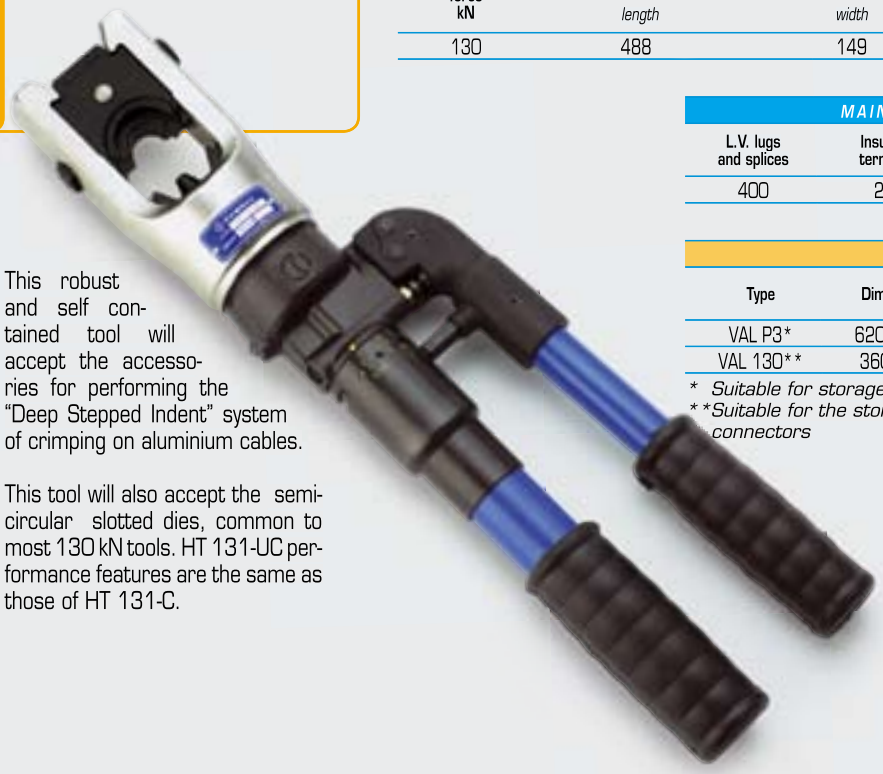
These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

HYDRAULIC CRIMPING TOOL

HT 131-UC

general features

Crimping force kN	Dimensions mm		Weight kg
	length	*width*	
130	488	149	5,4



This robust and self contained tool will accept the accessories for performing the "Deep Stepped Indent" system of crimping on aluminium cables.

This tool will also accept the semi-circular slotted dies, common to most 130 kN tools. HT 131-UC performance features are the same as those of HT 131-C.

MAIN APPLICATIONS - max section mm²				
L.V. lugs and splices	Insulated terminals	"C" sleeve connectors	H.V. lugs and splices	Alu lugs and splices
400	240	185	400	300

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P3*	620x380xh135	2,5	❊	—
VAL 130**	360x280xh48	3,0	—	❊

** Suitable for storage of the tool and 14 sets of semi-circular slotted dies*
***Suitable for the storage of accessories for crimping aluminium connectors*

HYDRAULIC PRESSHEAD

RHU 131-C

general features

CE

Crimping force kN	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
130	700	245	89	3,7

Hydraulic presshead complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138).

RHU 131-C is suitable for installing the same range of connectors as HT 131-UC.

MAIN APPLICATIONS - max section mm²				
L.V. lugs and splices	Insulated terminals	"C" sleeve connectors	H.V. lugs and splices	Alu lugs and splices
400	240	185	400	300

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P8*	445x290xh115	1,2	—	❊
VAL 130**	360x280xh48	3,0	—	❊
VAL 130-U***	450x305xh80	5,0	—	❊

** Suitable for storage of the head and 14 sets of dies*
*** Suitable for the storage of accessories for crimping aluminium connectors*
**** Suitable for storage of the head, semi-circular slotted dies and dies for crimping aluminium connectors*

VAL 130

VAL 130-U

VAL P8

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

HYDRAULIC PRESSHEADS

general features

ECW-H3D

STORAGE

Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL ECW-H3D*	345x305xh90	4,2	—	❊

** Suitable for storage of the head and 10 sets of dies*

ECW-H3D ACCESSORIES FOR CUTTING CONDUCTORS

Die Type	Cutting Capacity	Conductor Type
	Ø 20 mm	Cu, Alu, Aldrey and Alu-Steel
	Ø 20 mm	Extra flexible steel with ≥ 200 strands
WT2-3D	This die is suitable to cut steel conductors (R ≤ 160 daN/mm2) having the most common strandings, i.e.: 19 x 1,2 = Ø est. 6,0 mm; 7 x 3,0 = Ø est. 9,0 mm; 19 x 2,1 = Ø est. 10,5 mm; 19 x 2,3 = Ø est. 11,5 mm	

Crimping force kN	Max operating pressure bar	Dimensions mm length	Dimensions mm width	Weight kg
230	700	290	120	5,5

MAIN APPLICATION - max section mm²

L.V. lugs and splices	Insulated terminals	"C" sleeve connectors	H.V. lugs and splices
630	300	240	630

Hydraulic presshead complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138). Adaptor type AU230-130D is available as an optional extra enabling the head to utilise the semi-circular slotted dies which are common to most 130 kN tools. Also available is a series of dies for the compression of DIN electrical connectors, and a die for cutting copper, aluminium, aldrey, aluminium-steel and steel conductors.

RHU 231

STORAGE

Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL 231*	470x273xh96	7,2	❊	—

** Suitable for storage of the head and dies for aluminium compression*

VAL 231

Crimping force kN	Max operating pressure bar	Dimensions mm length	Dimensions mm width	Weight kg
230	700	320	110	6,4

MAIN APPLICATION - max section mm²

Alu lugs and splices	Cu lugs and splices
500	630

Hydraulic presshead complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138).

For crimping up to 500 sqmm aluminium.
Dies are available also for crimping copper connectors.

RHU 230-630

STORAGE

Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL 230-630*	405x230xh145	4,4	❊	—
VAL MAT 230-630**	290x260xh70	3,1	—	❊

** Suitable for storage of the head*
*** Suitable for storage of the accessories*

VAL 230-630

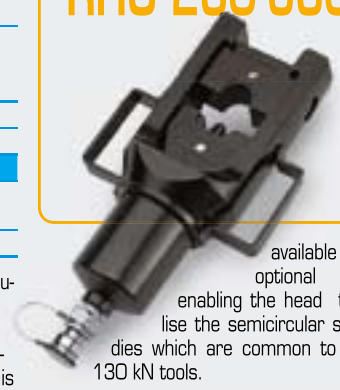
VAL MAT 230-630

Crimping force kN	Max operating pressure bar	Dimensions mm length	Dimensions mm width	Weight kg
230	700	365	193	9,0

MAIN APPLICATION - max section mm²

Cu lugs and splices	Alu lugs and splices	"C" sleeve connectors	H.V. lugs and splices
400	630	185	400

Hydraulic presshead complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138).
It allows for crimping up to 630 sqmm aluminium (according to HN 68 S90). Adapter AU 230-130 C, is available as an optional extra enabling the head to utilise the semicircular slotted dies which are common to most 130 kN tools.



RHU 520

STORAGE

Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL 520*	405x230xh145	4,4	—	❊
VAL MAT 520**	500x310xh68	5,6	—	❊

** Suitable for storage of the head*
*** Suitable for storage of 10 sets of dies*

VAL MAT 520

VAL 520

Crimping force kN	Max operating pressure bar	Dimensions mm length	Dimensions mm width	Weight kg
520	700	306	200	18,0

MAIN APPLICATION - max section mm²

Lugs and splices	H.V. overhead lines
1200	630

Hydraulic presshead complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138). Adaptor type AU520-130C is available as an optional extra enabling the head to utilise the semi-circular slotted dies which are common to most 130 kN tools.

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

HYDRAULIC CUTTING TOOL

INDUSTRIAL APPLICATION

HT-TC051

general features

Max cutting Ø mm	Dimensions mm		Weight kg
	length	*width*	
50	497	129	4,38

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
Canvas Bag 010	545x160	0,15	❊	—

Hand operated hydraulic tool specifically designed to cut copper, aluminium and telecommunications cables having a max overall diameter of 50 mm.
The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.

The head can be easily opened to allow the cutting of running cables.
The head can rotate through 90 degrees, to enable the operator to work in the most comfortable position.
HT-TC051 features an automatic safety valve to bypass oil when reaching maximum pressure; a pressure release device can also be operated at any stage of operation.

HYDRAULIC CUTTING HEAD

INDUSTRIAL APPLICATION

TC 050

general features

Max cutting Ø mm	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
50	700	325	112	3,2

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
Canvas bag 011	360x137	0,13	❊	—

Hydraulic cutting head complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138)

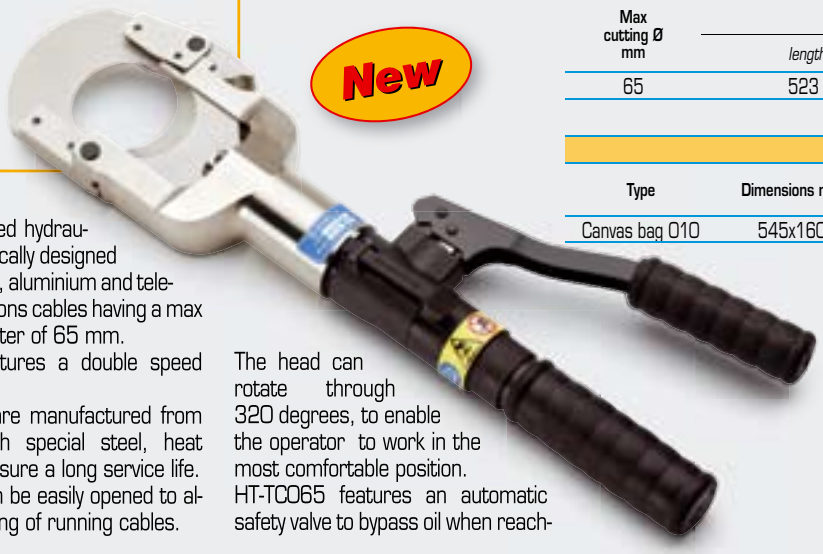
TC050 features the same cutting capability as HT-TC051.

HYDRAULIC CUTTING TOOL

INDUSTRIAL APPLICATION

HT-TC065

general features



Max cutting Ø mm	Dimensions mm		Weight kg
	length	*width*	
65	523	129	5,3

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
Canvas bag 010	545x160	0,15	❊	—

Hand operated hydraulic tool specifically designed to cut copper, aluminium and telecommunications cables having a max overall diameter of 65 mm.
The tool features a double speed action.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The head can be easily opened to allow the cutting of running cables.

The head can rotate through 320 degrees, to enable the operator to work in the most comfortable position.
HT-TC065 features an automatic safety valve to bypass oil when reaching maximum pressure; a pressure release device can also be operated at any stage of operation.

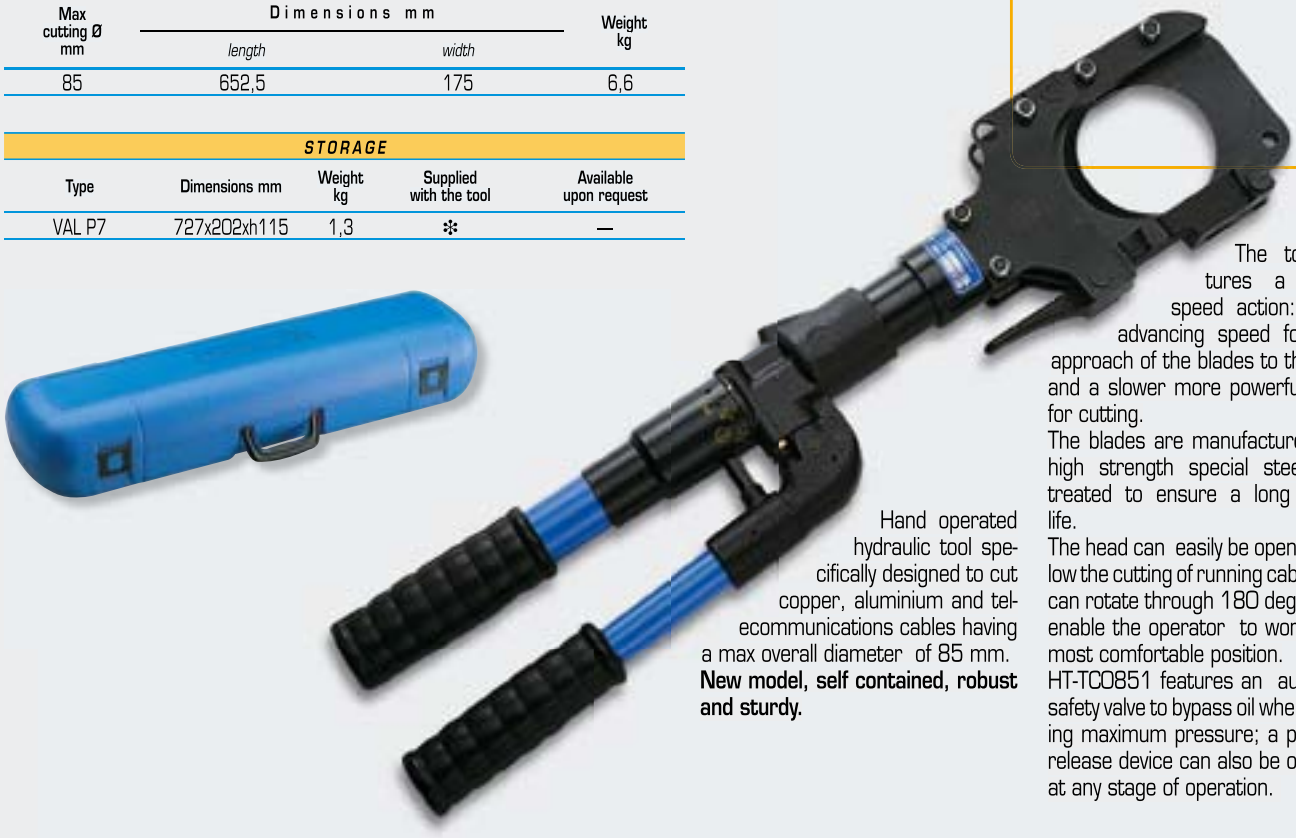
HYDRAULIC CUTTING TOOL

general features

INDUSTRIAL APPLICATION
HT-TC0851

Max cutting Ø mm	Dimensions mm		Weight kg
	length	*width*	
85	652,5	175	6,6

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P7	727x202xh115	1,3	❊	—



Hand operated hydraulic tool specifically designed to cut copper, aluminium and telecommunications cables having a max overall diameter of 85 mm.
New model, self contained, robust and sturdy.

The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The head can easily be opened to allow the cutting of running cables, and can rotate through 180 degrees, to enable the operator to work in the most comfortable position.
HT-TC0851 features an automatic safety valve to bypass oil when reaching maximum pressure; a pressure release device can also be operated at any stage of operation.

HYDRAULIC CUTTING HEAD

CE

general features

INDUSTRIAL APPLICATION
TC 085

Max cutting Ø mm	Max operating pressure bar	Dimensions mm		Weight Kg
		length	*width*	
85	700	409	135	4,9

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL TC 085	465x155xh65	2,4	❊	—

Hydraulic cutting head complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138)

TC085 features the same cutting capability as HT-TC0851.

INDUSTRIAL APPLICATION

TC 096

HYDRAULIC CUTTING HEAD

general features

Max cutting Ø mm	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
95	700	397	249	7,9

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL 096	430x265xh145	4,2	❊	—

Hydraulic cutting head specifically designed to cut copper and aluminium cables having a max overall diameter of 95 mm.

The head is complete with a quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138).

Handle designed for ease of operation

HYDRAULIC CUTTING HEAD

general features

INDUSTRIAL APPLICATION
TC 120

Max cutting Ø mm	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
120	700	536	175	9,5

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL TC 120	590x209xh84	4,9	❊	—

Hydraulic cutting head specifically designed to cut copper, aluminium and telecommunications cables having a max overall diameter of 120 mm.

The head can easily be opened to cut running cables, and the handle allows the most comfortable positioning of the head onto the cable to be cut.

The head is complete with a quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138).

TC 120 cutting capacity - a few examples:	
Cable type	*3x150 mm² steel armoured Ø80 mm*
	1000 mm² Cu - EPR rubber insulated; Ø85 mm
	1000 mm² Cu - EPR rubber insulated + lead sheath; Ø92 mm
	1000 mm² Cu - EPR rubber insulated + lead sheath + PE sheath; Ø100 mm
	240 mm² EPR rubber insulated

Handle designed for ease of operation

Opening head, to allow cutting of running cables

HYDRAULIC CUTTING TOOL

OVERHEAD LINE APPLICATION

HT-TC026

general features

Max cutting Ø mm	Dimensions mm		Weight kg
	length	*width*	
25	382	129	3,2

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
Canvas bag 001	430x155	0,15	❊	—

Hand operated hydraulic tool specifically designed to cut copper, aldrey, aluminium, aluminium-steel cables and steel ropes, aluminium and steel rods having a max overall diameter of 25 mm.
The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The head can rotate through 180 degrees, to enable the operator to work in the most comfortable position, and can easily be opened to allow the cutting of running cables.
HT-TC026 features an automatic safety valve to bypass oil when reaching maximum pressure; a pressure release device can also be operated at any stage of operation.

CUTTING CAPACITY			
	MATERIAL	TENSILE STRENGTH (da N/mm²)	MAX CUTTING DIAMETER (mm) HT-TC 026 TC 025 / HT-TC 026Y B-TC026
ROPES & CONDUCTORS	COPPER	≤ 41	25
	ALUMINIUM	≤ 20	25
	ALMELEC	≤ 34	25
	STEEL	≤ 180	*INDICATIVE EXAMPLES:* 7 x 3,0 : Ø est. = 9,0 mm 19 x 2,1 : Ø est. = 10,5 mm 19 x 2,3 : Ø est. = 11,5 mm
	MULTI STRANDS STEEL (STRANDS Qty ≥ 200)	≤ 180	18
	ACSR	≤ 180	25 *INDICATIVE EXAMPLES:* 26 x 2,50 + 7 x 1,95 : Ø est. = 15,85 26 x 3,06 + 7 x 2,38 : Ø est. = 19,38 26 x 3,60 + 7 x 2,80 : Ø est. = 22,80
RODS	STEEL	≤ 60	13
		≤ 42	16
	COPPER	≤ 30	20
		≤ 25	23
	ALUMINIUM	≤ 16	25

HYDRAULIC CUTTING HEAD

OVERHEAD LINE APPLICATION

TC 025

general features

Max cutting Ø mm	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
25	700	213	82	2,0

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
Canvas bag 007	350x105	0,13	❊	—

Hydraulic cutting head complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138)

TC025 has the same cutting capability as HT-TC026.

HYDRAULIC CUTTING TOOL

general features

OVERHEAD LINE APPLICATION

HT-TC026Y

Max cutting Ø mm	Dimensions mm		Weight kg
	length	*width*	
25	394,5	129	3,35

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
Canvas Bag 001	430x155	0,15	❊	—

Hand operated hydraulic tool specifically designed to cut copper, aldrey, aluminum, aluminum-steel cables, **stay wire and steel ropes having a max overall diameter of 25 mm and steel earthing rod up to 16 mm.**
The tool features a double speed action.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The head can rotate through 180 degrees, to enable the operator to work in the most comfortable position, and can easily be opened to allow the cutting of running cables.
HT-TC026Y features an automatic safety valve to bypass oil when reaching maximum pressure; a pressure release device can also be operated at any stage of operation.

Ideal for earthing rod and stay wire

HT-TC026Y cutting capacity - a few examples:		
Ø		***EARTHING RODS AND STAY WIRES***
mm	in.	
12,7	1/2"	*STEEL EARTHING ROD, COPPER PLATED; Tensile strength = 79 daN/mm²*
14,2	/	*STEEL EARTHING ROD, COPPER PLATED; Tensile strength = 69 daN/mm²*
15,6	/	*STEEL EARTHING ROD; Tensile strength = 69 daN/mm²*
15,9	5/8"	*STEEL EARTHING ROD, COPPER PLATED (CON ED - ILLINOIS); Tensile strength = 57 daN/mm²*
15,9	5/8"	*STEEL EARTHING ROD, COPPER PLATED (CON ED - STATEN ISLAND); Tensile strength = 78 daN/mm²*
19	3/4"	*STEEL EARTHING ROD, COPPER PLATED; Tensile strength = 74 daN/mm²*
9,15 (3,05x7)	/	*STAY WIRE*
10,8 (3,6x7)	/	*STAY WIRE (PORTLAND GENERAL ELECTRIC)*
11,1 (3,7x7)	/	*STAY WIRE (PORTLAND GENERAL ELECTRIC)*
12,3 (4,1x7)	/	*STAY WIRE (PORTLAND GENERAL ELECTRIC)*
12,6 (4,2x7)	/	*STAY WIRE (PORTLAND GENERAL ELECTRIC)*

HYDRAULIC CUTTING TOOL

OVERHEAD LINE APPLICATION

HT-TC041

general features

Max cutting Ø mm	Dimensions mm		Weight kg
	length	*width*	
40	550	144	5,8

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P7	727x202xh115	1,3	❇	—

Hand operated hydraulic tool specifically designed to cut copper, aldrey, aluminium, aluminium-steel cables and steel ropes, aluminium and steel rods having a max overall diameter of 40 mm.
New model, even more self contained, robust and sturdy.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The head can rotate through 90 degrees, to enable the operator to work in the most comfortable position, and can easily be opened to allow cutting of running cables.

HT-TC041 features an automatic safety valve to bypass oil when reaching maximum pressure; a pressure release device can also be operated at any stage of operation.

CUTTING CAPACITY			
	MATERIAL	TENSILE STRENGTH (da N/mm²)	MAX CUTTING DIAMETER (mm) HT-TC 041 TC 04 B-TC04
ROPES & CONDUCTORS	COPPER	≤ 41	40
	ALUMINIUM	≤ 20	40
	ALMELEC	≤ 34	40
	STEEL	≤ 180	*INDICATIVE EXAMPLES:* 7 x 3,0 : Ø est. = 9,0 mm 19 x 2,1 : Ø est. = 10,5 mm 19 x 2,3 : Ø est. = 11,5 mm
	MULTI STRANDS STEEL (STRANDS Qty ≥ 200)	≤ 180	18
	ACSR	≤ 180	40 *INDICATIVE EXAMPLES:* 26 x 2,50 + 7 x 1,95 : Ø est. = 15,85 26 x 3,06 + 7 x 2,38 : Ø est. = 19,38 26 x 3,60 + 7 x 2,80 : Ø est. = 22,80 54 x 3,50 + 19 x 2,10 : Ø est. = 31,50 54 x 4,36 + 19 x 2,62 : Ø est. = 39,20
RODS	STEEL	≤ 60	18
		≤ 42	20
	COPPER	≤ 30	30
		≤ 25	32
	ALUMINIUM	≤ 16	40

HYDRAULIC CUTTING HEAD

OVERHEAD LINE APPLICATION

TC 04

general features

Max cutting Ø mm	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
40	700	311	100	4,0

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL 04	350x125xh68	2,0	❇	—

Hydraulic cutting head complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138)
TC04 has the same cutting capability as HT-TC041.

HYDRAULIC CUTTING TOOL

OVERHEAD LINE APPLICATION

HT-TC051Y

general features

Max cutting Ø mm	Dimensions mm		Weight kg
	length	*width*	
50	503	129	4,7

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
Canvas Bag 010	545x160	0,15	❊	—

Hand operated hydraulic tool specifically designed to cut copper, aluminum, aluminum-steel cables (ACSR) having a max overall diameter of 50 mm.
The HT-TC051Y is provided with a two stage hydraulic system, which advances the blades quickly to the cable. This proven system saves operator time and effort.
The HT-TC051Y is provided with an automatic safety valve to bypass oil when reaching max pressure.
This means safety to the operator and protection to the blades.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The shape of the blades provides a "clean" cut.
The head can be opened to allow cutting of running cables and ropes.
The head rotates 90 degrees allowing the operator to perform the cut in the most comfortable position.
The tool is supplied complete with canvas bag 010 for protection and storage when not in use.

Does not cut stay wire, steel wire or earthing rod.

HYDRAULIC CUTTING HEAD

CE

OVERHEAD LINE APPLICATION

TC 050Y

general features

Max cutting Ø mm	Max operating pressure bar	Dimensions mm		Weight kg
		length	*width*	
50	700	331	112	3,3

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
Canvas bag 011	360x137	0,13	❊	—

Hydraulic cutting head complete with quick automatic coupler for connection to a hydraulic pump with a working pressure of 700 bar max, (see page 136-138).
TC 050Y features the same cutting capability as HT-TC051Y.

Does not cut stay wire, steel wire or earthing rod.

HYDRAULIC CUTTING TOOL

OVERHEAD LINE APPLICATION

HT-TC055

general features

New

Max cutting Ø mm	Dimensions mm		Weight kg
	length	*width*	
55	595	144	8,3

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P7	727x202xh115	1,3	❊	—

Hand operated hydraulic tool specifically designed to cut copper, aldrey, aluminium, aluminium-steel cables and steel ropes, aluminium and steel rods having a max overall diameter of 55 mm.
The HT-TC055 is provided with a two stage hydraulic system, which advances the blades quickly to the cable. This proven system saves operator time and effort.
The HT-TC055 is provided with an automatic safety valve to bypass oil when reaching max pressure.
This means safety to the operator and protection to the blades.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The shape of the blades provides a "clean" cut.
The head can be opened to allow cutting of running cables and ropes.
The head rotates 327 degrees allowing the operator to perform the cut in the most comfortable position.
The tool is supplied complete with plastic case VAL P7 for protection and storage when not in use.

CUTTING CAPACITY			
	MATERIAL	TENSILE STRENGTH (da N/mm²)	MAX CUTTING DIAMETER (mm) HT-TC055 B-TC055
ROPES & CONDUCTORS	COPPER	≤ 41	55
	ALUMINIUM	≤ 20	55
	ALMELEC	≤ 34	55
	STEEL	≤ 180	*INDICATIVE EXAMPLES:* 7 x 3,0 : Ø est. = 9,0 mm 19 x 2,1 : Ø est. = 10,5 mm 19 x 2,3 : Ø est. = 11,5 mm
	MULTI STRANDS STEEL (STRANDS Q.TY ≥ 200)	≤ 180	22
	ACSR	≤ 180	50 *INDICATIVE EXAMPLES:* 26 x 2,50 + 7 x 1,95 : Ø est. = 15,85 26 x 3,06 + 7 x 2,38 : Ø est. = 19,38 26 x 3,60 + 7 x 2,80 : Ø est. = 22,80 54 x 3,50 + 19 x 2,10 : Ø est. = 31,50 54 x 4,36 + 19 x 2,62 : Ø est. = 39,20 83 x 4,60 + 16 x 2,80 : Ø est. = 50,00
	GUY WIRE (GW15-9/16-188)	Extra high strenght grade	7 x 4,77 : Ø est. =14,30 mm
RODS	STEEL	≤ 60	20
		≤ 42	22
	COPPER	≤ 30	34
		≤ 25	38,5
	ALUMINIUM	≤ 16	50

Hole punching head RH-FC 47

general features

Type	Max piercing Ø mm	Max centre of hole to edge of trunking (mm)	Max operating pressure bar	Dimensions mm		Weight kg
				length	width	
RH-FC 47	47	52	700	255	118	3,1

Storage type	Dimensions mm	Weight kg
VAL P10*	315x300xh95	0,93

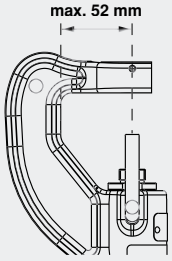
*Supplied with the head

Hole Dimensions					Maximum thickness of mild steel mm	Code
Ø mm	Ø inch	Pg	ISO	Tube		
15,2	.598	Pg 9	-	-	2	RD 15,2 S
16,2	.638	-	ISO-16	-		RD 16,2 S*
17,5	.688	-	-	-		RD 17,5 S*
18,6	.732	Pg 11	-	-		RD 18,6 S
19,1	.750	-	-	-		RD 19,1 S*
20,4	.803	Pg 13,5	ISO-20	-		RD 20,4 S
20,6	.812	-	-	-		RD 20,6 S*
22,5	.885	Pg 16	-	1/2"		RD 22,5 S
23,8	.937	-	-	-		RD 23,8 S*
25,4	1.000	-	ISO-25	-		RD 25,4 S*
27,0	1.063	-	-	-		RD 27 S*
28,3	1.115	Pg 21	-	3/4"		RD 28,3 S
28,6	1.125	-	-	-		RD 28,6 S*
30,5	1.210	-	-	-		RD 30,5 S*
31,8	1.250	-	-	-		RD 31,8 S*
32,5	1.280	-	ISO-32	-	3	RD 32,5 S*
34,6	1.357	-	-	1"		RD 34,6 S*
34,9	1.375	-	-	-		RD 34,9 S*
37,0	1.457	Pg 29	-	-		RD 37 S
38,1	1.500	-	-	-		RD 38,1 S*
40,5	1.594	-	ISO-40	-		RD 40,5 S*
41,3	1.625	-	-	-		RD 41,3 S*
43,2	1.699	-	-	1-1/4"		RD 43,2 S*
44,5	1.750	-	-	-		RD 44,5 S*
47,0	1.850	Pg 36	-	-		RD 47 S

*available upon request

Table denotes the punch/die set reference, for each hole size. Suitable for punching holes in mild steel, fibreglass or plastic material, up to 3 mm thick.

Hydraulic piercing head complete with automatic quick coupler, designed for punching holes from 15,2 up to 47 mm diameter in the side wall of trunking without the need for pre drilling.
For operation, the head must be joined to a hydraulic pump developing a pressure of 700 bar (see page 136-138).



Piercing heads RHT

general features

Type	Max piercing Ø mm	Max hole distance from bar edge (mm)	Max operating pressure bar	Dimensions mm		Weight kg
				length	width	
RHT 160	17	30	700	240	153	6,5
RHT 160-60N	17	60	700	240	181	9,2

Storage type	Dimensions mm	Weight kg
VAL 160*	283x180xh100	2,3

*Supplied with the head

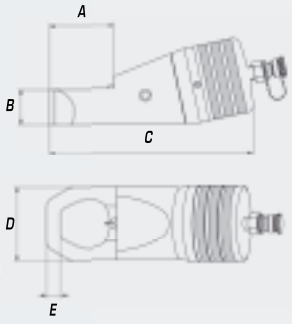
Available accessories (to be ordered separately):						
Piercing Ø mm	6,5	8,5	10,5	13	15	17
Set die - indentor	RT 6,5	RT 8,5	RT 10,5	RT 13	RT 15	RT 17

Hydraulic piercing head complete with automatic quick coupler, for piercing holes of various diameters in copper, aluminium and steel bars with max. thickness of 10 mm.
This compact and handy tool is widely used for transformer room connections, control switch boards and power plants.
For operation the head must be joined to a hydraulic pump developing a pressure of 700 bar (see page 136-138).

SPECIAL TOOLS

Nut splitting heads RHTD

general features



Hydraulic nut splitting head complete with automatic quick coupler.
For operating the head must be joined to a hydraulic pump developing a pressure of 700 bar (see page 136-138).

DIMENSIONS mm:

	RHTD 3241	RHTD 1724	RHTD 3241T
A	66	40,5	77
B	36	25	41
C	208	150,5	222
D	75,5	54	75,5
E	16	7,5	21,5

CE

RHTD 1724

Suitable for splitting nuts mm	Max operating pressure bar	Weight kg
17 (M12) ÷ 24 (M16)	700	1,76

RHTD 3241

Suitable for splitting nuts mm	Max operating pressure bar	Weight kg
27 (M18) ÷ 41 (M27)	700	4,6

RHTD 3241T

Suitable for splitting square and hexagonal nuts or fastening bushes mm	Max operating pressure bar	Weight kg
27 (M18) ÷ 41 (M27)	700	4,9

Storage type	Dimensions mm	Weight kg
VAL P4*	315x300xh95	0,93

**Supplied with the head*

ACCESSORIES

Flexible hoses

High pressure flexible hoses for joining hydraulic heads to pumps.
In addition to the standard versions listed below alternative hose lengths are available, upon request:

TF 300-Q 38 FM
3 m length flexible hose fitted with an automatic female quick coupler and a male quick coupler.

TF 600-Q 38 FM
6 m length flexible hose fitted with an automatic female quick coupler and a 3/8" NPT male threaded bush.

TF 300-Q 38 F
3 m length flexible hose equipped with automatic female quick coupler at one end and male threading at the other end.

Quick couplers

STANDARD VERSIONS

Q 38-M
Male automatic coupler for hydraulic heads.

Q 38-F
Female automatic coupler for hydraulic pumps and flexible hoses.

Q 38-MS
Male automatic coupler for flexible hoses.

INSULATED VERSIONS

I 38-M
Male automatic coupler for insulated hydraulic heads.

I 38-F
Female automatic coupler for insulated hydraulic pumps and flexible hoses.

I 38-MS
Male automatic coupler for insulated flexible hoses.

CRIMPING FORCE GAUGES FOR HYDRAULIC TOOLS

MPC 2

Crimping force gauge MPC 2

The MPC2 device, complete with test die set, to measure the maximum force developed by Cembre tools:
HT 131-C, HT 131L-C,
HT 120, RHC 131,
B 131-C, B 131L-C.

MPC 3

Crimping force gauge MPC 3

The MPC3 device, complete with test die set, to measure the maximum force developed by Cembre tools:
HT45, HT 51, RH 50, RHM 50,
HT 61, RH 61, B 46, B 51, B 62.

MPC 4

Crimping force gauge MPC 4

The MPC4 device, complete with test die set, to measure the maximum force developed by Cembre tools:
ECW-H3D, RHU240-3D-850.

PRESSURE TEST DEVICE FOR HYDRAULIC PUMPS AND TOOLS

MPC 1

Pressure checking device MPC 1

The MPC1 device, complete with test adapter set, to measure the maximum oil pressure on all Cembre tools.

IN-LINE PRESSURE TEST DEVICE FOR HYDRAULIC PUMPS

Manometer 700 bar

Manometer unit 700 bar

With the Manometer unit 700 bar, it is possible to check the oil pressure at any point during the operation.

CHECKING DEVICES				
For Hydraulic Tools			For Hydraulic Pumps and Tools	For Hydraulic Pumps
MPC 2	**MPC 3**	**MPC 4**	**MPC 1**	**Manometer unit 700 bar**
HT 131-C HT 131L-C HT 120 RHC 131 RHC 131L B 131-C B 131L-C B 135-C B 135L-C	HT 45 HT 51 HT 61 RH 61 B 46 B 51 B 62 RH 50 RHM 50	ECW-H3D RHU 240-3D-850	P0 7000 CPP-0 CPE-1 B70M-P24 HT 45 HT 51 HT 61 HT 81-U HT 131-C HT 131L-C HT 131-UC HT-TC026 HT-TC051 HT-TC041 HT-TC0851	P0 7000 CPP-0 CPE-1 B70M-P24

CORDLESS HYDRAULIC TOOLS

14.4 V CORDLESS TOOL FEATURES

- *Cordless tooling can be operated with one hand.*
- *Balanced tool for greater control.*
- *Head rotates for ease of operation in confined spaces.*
- *Battery condition displayed after every crimping operation, to show the residual battery power.*
- *The tools are fitted with a maximum pressure valve to indicate a correct crimping operation or the full extent of the blade travel.*
- *Extremely quiet in operation with very little vibration.*
- *Durable moulded body offering high resistance to wear and damage in all operating conditions.*
- *The plastic or steel carrying case can accomodate the tool and all the accessories.*
- *The B51, B135-C, B135L-C, B135-UC, B131-C, B131L-C and B131-UC will accept die sets common to the Cembre 50 and 130 kN tooling range.*
- ***Common features:***

DOUBLE ACTION SPEED — ***double speed action: a rapid approach speed and a slower more powerful speed for crimping or cutting.***

14.4V 3.0Ah Ni-MH — ***new more powerful Ni-MH battery 14.4V - 3.0Ah; 50% more energy, less memory effect, better environmental compatibility.***

SUPPLIED WITH

1. **CB 1430H** 14.4 V 3.0 Ah Ni-MH high power battery (2 pcs.).
2. **CFC 230** Battery charger.
3. Shoulder strap.

- Plastic/Metal carrying case suitable for storage of the tool, accessories and dies (depending on tool type).

OPTIONAL ACCESSORIES

4. **BPS 230.14** mains power supply.
   Main features: INPUT 230V~ 50-60Hz; OUTPUT 14,4V⎓ thermal and short circuit protection.
   Current supply: up to 5A continuous use; 20A for 50 s; 30A for 8 s.
5. **ESC 600** cable for connection to a 12V DC external power supply/vehicle battery length 6 m (suitable only for tools with 12V DC socket).
6. **CFC 12-24IC** car battery charger.
   (INPUT 12-24 V DC; OUTPUT 9.6-14.4 V DC)

B 51 Acoustic Noise

(Directive 2006/42/EC, annexe 1, point 1.7.4.2 letter u)

- *The weighted continuous acoustic pressure level equivalent A at the workplace L_{pA} is equal to **75 dB (A)***
- *The maximum value of the weighted acoustic displacement pressure C at the workplace L_{pCpeak} is less than **< 130 dB (C)***
- *The acoustic power level emitted by the machine L_{WA} is equal to **85.3 dB (A)***

B 131-C Acoustic Noise

(Directive 2006/42/EC, annexe 1, point 1.7.4.2 letter u)

- *The weighted continuous acoustic pressure level equivalent A at the workplace L_{pA} is equal to **72.4 dB (A)***
- *The maximum value of the weighted acoustic displacement pressure C at the workplace L_{pCpeak} is less than **< 130 dB (C)***
- *The acoustic power level emitted by the machine L_{WA} is equal to **83.1 dB (A)***

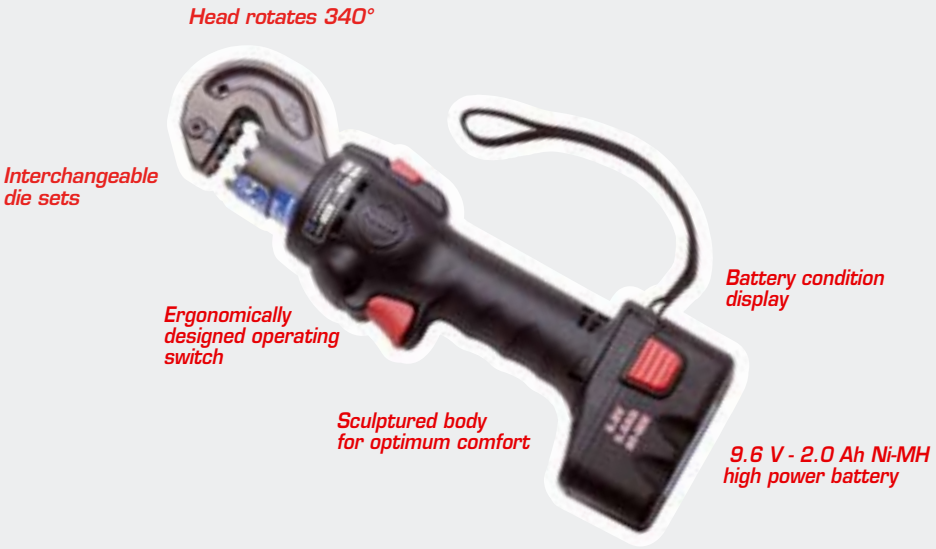
Risks due to vibration

(Directive 2006/42/EC, annexe 1, point 2.2.1.1)

*Tests performed in accordance with specifications UNI ENV 25349 and UNI EN 28662 pt. 1, in operating conditions more severe than normal, **certify that the weighted root mean square, in frequency of the acceleration the upper limbs are exposed to, for each biodynamic reference axis, does not exceed 2.5 m/sec²**.*

9.6 V CORDLESS TOOL FEATURES

- *Cordless tooling can be operated with one hand.*
- *Balanced tool for greater control.*
- *Head rotates for ease of operation in confined spaces.*
- *Battery condition displayed after every crimping operation to show the residual battery power.*
- *The tools are fitted with a maximum pressure valve to indicate a correct crimping operation or the full extent of the blade travel.*
- *Extremely quiet in operation with very little vibration.*
- *Durable moulded body offering high resistance to wear and damage in all operating conditions.*
- *The plastic carrying case can accomodate the tool and all the accessories.*



SUPPLIED WITH

1. **CB 9620H** 9.6 V 2.0 Ah Ni-MH high power battery (for B15, 2 pcs.).
2. **CFC 230** Battery charger.
3. **Adaptor CBA 96-144**.

- **VAL P22** Plastic carrying case suitable for storing the tool and accessories.

OPTIONAL ACCESSORIES

4. **CFC 12-24IC** car battery charger. (INPUT 12-24 V DC; OUTPUT 9.6-14.4 V DC)
5. **Adaptor CBA 96-144.**

B 15 Acoustic Noise

(Directive 2006/42/EC, annexe 1, point 1.7.4.2 letter u)

- *The weighted continuous acoustic pressure level equivalent A at the workplace L_{pA} is equal to **66.8 dB (A)***
- *The maximum value of the weighted acoustic displacement pressure C at the workplace L_{pCpeak} is less than **< 130 dB (C)***
- *The acoustic power level emitted by the machine L_{WA} is equal to **75 dB (A)***

Risks due to vibration

(Directive 2006/42/EC, annexe 1, point 2.2.1.1)

*Tests performed in accordance with specifications UNI ENV 25349 and UNI EN 28662 pt. 1, in operating conditions more severe than normal, **certify that the weighed root mean square, in frequency of the acceleration the upper limbs are exposed to, for each biodynamic reference axis, does not exceed 2.5 m/sec²**.*

9.6 V CORDLESS HYDRAULIC CRIMPING TOOL

B 15

general features

Crimping force kN	Dimensions mm			Battery Ni-MH	Weight kg (with battery)
	length	*height*	*width*		
15	320	117	66	9.6 V 2.0 Ah	1,68

9.6V 2.0Ah Ni-MH

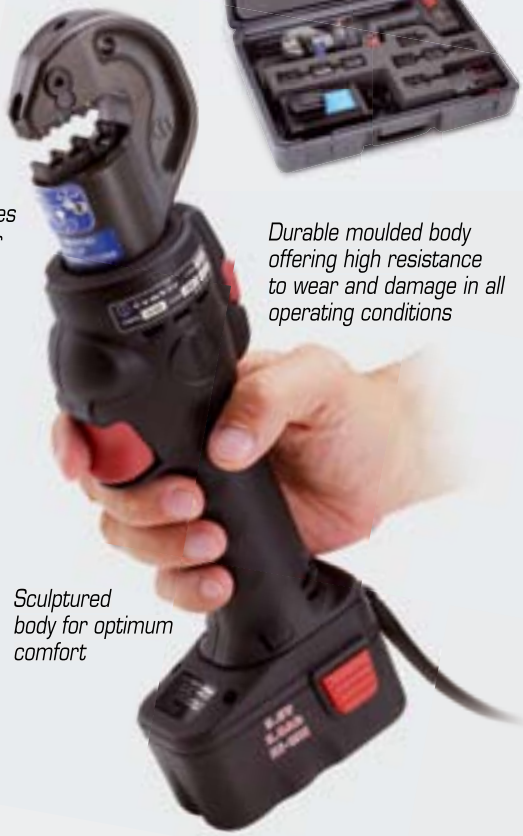
New

Stick Tool shape for better handling.
Can be operated with one hand.
Balanced for greater control.
Head rotates by 340° for ease of operation in confined spaces.
The tool is fitted with a maximum pressure valve.
Automatic return of jaws after completion of the crimp.
Automatic return can be stopped at any time to ease positioning.
Extremely quiet, minimal vibration.
Durable moulded body offering high resistance to wear and damage in all operating conditions.
Ni-MH battery; powerful, better environmental compatibility.
Battery condition displayed after every crimping operation and battery insertion to show the residual battery power.
Supplied in a robust plastic case to accommodate the tool and all the accessories.
Two batteries and charger included.
Many different interchangeable crimping dies available.

MAIN APPLICATIONS - max size AWG		
Copper lugs and splices	Insulated terminals	End sleeves
0,25 - 16	0,25 - 16	0,3 - 35

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P22	448x228x115	1,4	❄	—

The tool is supplied with:
- *Basic tool with battery and wrist strap*
- *Spare battery*
- *Battery charger*
- *Battery adapter*
- *Plastic carrying case suitable for storing the tool and accessories*



Head rotates by 340° for ease of operation

Durable moulded body offering high resistance to wear and damage in all operating conditions

Sculptured body for optimum comfort

Many different interchangeable crimping dies available

CRIMPING DIES AVAILABLE				
Conductor size mm²	(AWG)	Connector type	DIE SET	
0,25 ÷ 16	22 ÷ 6	A... ; L...-M ; L...-P ; S... ; RN... ; BN... ; GN...	MA03/3-15	◡
1,5 ÷ 10	16 ÷ 8	A... ; L...-M ; L...-P	ME03/2-15	
10 ÷ 16	8 ÷ 6	A...; 2A... ; L...-M ; L...-P	ME2/3-15	
4 ÷ 10	12 ÷ 8	T... (NF C 20130 style) ; L...-T	MS4/10-15	
10 ÷ 16	8 ÷ 6	T... (NF C 20130 style) ; L...-T	MS10/16-15	⬡
10 ÷ 16	8 ÷ 6	HR... ; HSV...	MH10/16-15	
6 ÷ 16	10 ÷ 6	DR... (DIN 46235 style) ; DSV... (DIN 46267 T1 style)	MK5/8-15	
10 ÷ 16	8 ÷ 6	ANE... ; AN... ; IN... ; EN...	NN4-15	◡
0,25 ÷ 6	22 ÷ 10	R... ; B... ; G... ; PL... ; NL...	RBG-15	⬭
0,3 ÷ 4	22 ÷ 12	PKE ; PKC ; PKD ; PKT ; KE	KE4-15	
4 ÷ 16	12 ÷ 6	PKE ; PKC ; PKD ; PKT ; KE	KE16-15	▽
16 ÷ 35	6 ÷ 2	PKE ; PKC ; PKD ; PKT ; KE	KE35-15	

Battery condition display

Interchangeable die sets

Ergonomically designed switch

Automatic slot-in battery

14.4 V CORDLESS HYDRAULIC CRIMPING TOOL

B 51

general features

Crimping force kN	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
50	297	302	94	14,4 V 3.0 Ah	4,0

MAIN APPLICATIONS - max section mm²			
L.V. lugs and splices	Insulated terminals	End sleeves	"C" sleeve Connectors
240	70	50	70

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P5	543x412xh130	2,3	❄	—

14.4 V cordless hydraulic crimping tool, lightweight and balanced for single hand operation.

The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.

The tool is supplied with:

- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing 21 die sets*

The crimping head can rotate through 180° for ease of operation. The B 51 will accept die sets common to the Cembre 50 kN tooling range.
Fitted with a maximum hydraulic pressure valve. Complete with a battery condition display, which after every operation indicates the residual battery power.
Extremely quiet in operation, with very little vibration. Ergonomically designed with a sculptured body for operator comfort.

B 51-KV version also available for Power Supply Companies

Available in B 51L standard and B 51L-KV version for Power Supply Companies for use with W dies.

B 51L-KV

B 51L

Lightweight and balanced

Motor ventilation

Battery condition display

Switch protected against accidental operation

Automatic slot-in battery

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

14.4 V CORDLESS HYDRAULIC CRIMPING TOOL

B 55

general features

Crimping force kN	Dimensions mm			Battery Ni-MH	Weight kg (with battery)
	length	*height*	*width*		
55	385	302	94	14.4 V 3.0 Ah	5

DOUBLE ACTION SPEED

14.4V 3.0Ah Ni-MH

MAIN APPLICATIONS - max section mm²			
Copper lugs and splices	Insulated terminals	End sleeves	"C" sleeve Connectors
240	70	50	70

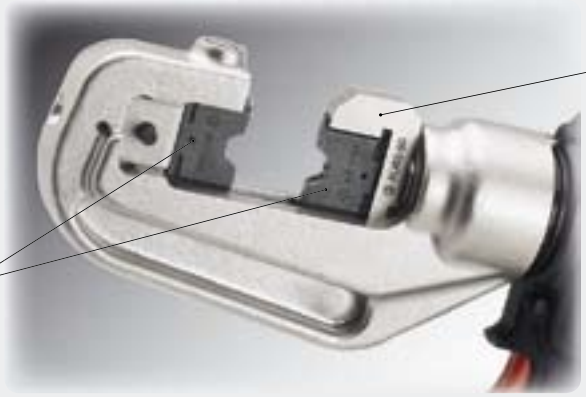
STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9	543x412xh130	2,2	❊	—

14.4 V cordless hydraulic crimping tool, lightweight and balanced for single hand operation.
The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.
The crimping head can rotate through 180° for ease of operation.
The B 55, with adapter AU55-50, will accept all Cembre 50 kN dies; with adapter AU55-W it will accept "W" dies.
Fitted with a maximum hydraulic pressure valve.
Complete with a battery condition display, which after every operation indicates the residual battery power.
Extremely quiet in operation, with very little vibration.
Ergonomically designed with a sculptured body for operator comfort.

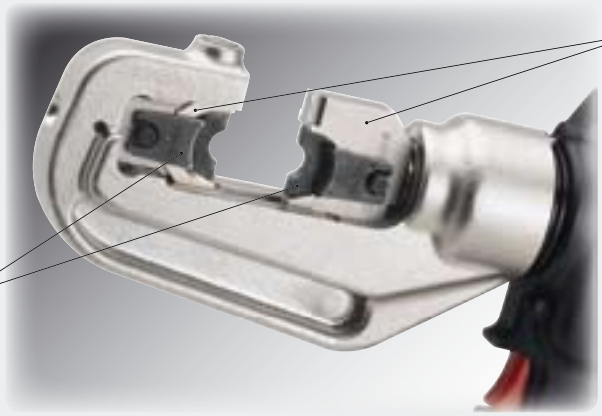
The tool is supplied with:

- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and accessories*

With adapter AU55-50 for accepting Cembre dies.



With adapter AU55-W for accepting "W" dies.



These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

14.4 V CORDLESS HYDRAULIC CRIMPING TOOL

B 55-KV

general features

Crimping force kN	Dimensions mm			Battery Ni-MH	Weight kg (with battery)
	length	*height*	*width*		
55	385	302	94	14.4 V 3.0 Ah	5

MAIN APPLICATIONS - max section mm²			
Copper lugs and splices	Insulated terminals	End sleeves	"C" sleeve Connectors
240	70	50	70

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9	543x412xh130	2,2	❇	—

The tool is supplied with:

- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and accessories*

Suitable for installing the same range of connectors of B 55, B 55-KV tool is provided with additional coatings to protect the operator and tool against accidental brush contact with energised conductors.

Particularly suitable for Power Supply Companies.

Battery condition display

Motor ventilation

Automatic slot-in battery

Switch protected against accidental operation

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

14.4 V CORDLESS HYDRAULIC CRIMPING TOOL

B 135-C

general features

Crimping force kN	Dimensions mm			Battery	Weight kg (with battery)
	length	height	width		
130	361	302	94	14,4 V 3.0 Ah	6,65

DOUBLE ACTION SPEED — 14.4V 3.0Ah Ni-MH

MAIN APPLICATIONS - max section mm²					
L.V. lugs	L.V. splices	Insulated terminals	"C" sleeve connectors	H.V. lugs	H.V. splices
400	240	240	185	400	240

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9-C	543x412xh130	2,2	❊	—

14.4 V cordless hydraulic crimping tool, lightweight and balanced for single hand operation.
The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.
The crimping head can rotate through 180° for ease of operation.
The B135-C will accept all semi-circular slotted dies, common to most 12 tons tools (U dies).
Fitted with a maximum hydraulic pressure valve.

Complete with a battery condition display, which after every operation indicates the residual battery power.
Extremely quiet in operation, with very little vibration.
Ergonomically designed with a sculptured body for operator comfort.

The tool is supplied with:
- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and 8 sets of semi-circular slotted dies*

B 135-C-KV version also available for Power Supply Companies

B 135L-C

general features

Crimping force kN	Dimensions mm			Battery	Weight kg (with battery)
	length	height	width		
130	404	302	94	14,4 V 3.0 Ah	7,35

DOUBLE ACTION SPEED — 14.4V 3.0Ah Ni-MH

MAIN APPLICATIONS - max section mm²			
L.V. lugs and splices	Insulated terminals	"C" sleeve Connectors	H.V. lugs and splices
400	240	185	400

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9-C	543x412xh130	2,2	❊	—

Also available in the B135L-C version, featuring a large 42 mm jaw opening, for an easier introduction/removal of large size compression terminations and joints.

The tool is supplied with:
- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and 8 sets of semi-circular slotted dies*

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

14.4 V CORDLESS HYDRAULIC CRIMPING TOOL

B 135-UC

general features

Crimping force kN	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
130	376	302	94	14,4 V 3.0 Ah	6,5

MAIN APPLICATIONS - max section mm²				
L.V. lugs and splices	Insulated terminals	"C" sleeve Connectors	H.V. lugs and splices	Alu lugs and splices
400	240	185	400	300

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9-C	543x412xh130	2,2	❊	—

The tool is supplied with:

- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and 8 sets of semi-circular slotted dies*

14.4 V cordless hydraulic crimping tool, lightweight and balanced for single hand operation.
This tool will accept the accessories for performing the "Deep Stepped Indent" system of crimping on aluminium cables.
The B135-UC will accept all semi-circular slotted dies, common to most 12 tons tools (U dies).
The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.
The crimping head can rotate through 180° for ease of operation.

Fitted with a maximum hydraulic pressure valve.
Complete with a battery condition display, which after every operation indicates the residual battery power.
Extremely quiet in operation, with very little vibration.
Ergonomically designed with a sculptured body for operator comfort.

Battery condition display

Motor ventilation

Automatic slot-in battery

Switch protected against accidental operation

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

14.4 V CORDLESS HYDRAULIC CRIMPING TOOL

B 131-C

general features

Crimping force kN	Dimensions mm			Battery	Weight kg (with battery)
	length	height	width		
130	420	250	100	14,4 V 3.0 Ah	7,4

DOUBLE ACTION SPEED — 14.4V 3.0Ah Ni-MH

MAIN APPLICATIONS - max section mm²					
L.V. lugs	L.V. splices	Insulated terminals	"C" sleeve connectors	H.V. lugs	H.V. splices
400	240	240	185	400	240

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P19	542x412xh197	3,2	❊	—

Available upon request:
- *ESC600 cable for connection to a 12V dc external power supply/vehicle battery length 6 m.*

The tool is supplied with:
- *Basic tool complete with battery and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and 14 sets of semi-circular slotted dies*

- 14.4 V cordless hydraulic crimping tool, lightweight and balanced for single hand operation. This tool will accept all semi-circular slotted dies, common to most 130 kN tools.
- The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.
- For ease of operation and comfort of the operator the tool head can be fully rotated through 180 degrees.
- The tool is powered by 14.4 V dc Ni-MH battery.
- A balanced tool for optimum control.
- Quiet in operation with very little vibration.
- Lightweight construction enables the operator to hold the tool in one hand and to position the connector with the other hand.
- The operating buttons, crimp/release, are mechanically interlocked, to prevent accidental operation of the tool.
- A microprocessor controls the tool operation and automatically cuts out the motor, on completion of the crimping operation, saving energy and extending battery life.
- The residual battery capacity is automatically displayed after every cycle.
- Fitted with an integral socket, for connection to a 12 V dc external power supply/vehicle battery.
- The tool is provided with a maximum pressure valve.

B 131-C-KV version also available for Power Supply Companies

B 131L-C

general features

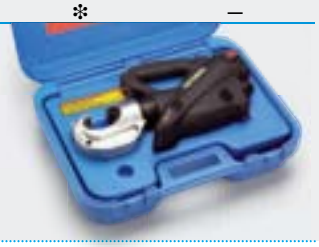
Crimping force kN	Dimensions mm			Battery	Weight kg (with battery)
	length	height	width		
130	460	250	100	14,4 V 3.0 Ah	8,2

DOUBLE ACTION SPEED — 14.4V 3.0Ah Ni-MH

MAIN APPLICATIONS - max section mm²			
L.V. lugs and splices	Insulated terminals	"C" sleeve Connectors	H.V. lugs and splices
400	240	185	400

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P19	542x412xh197	3,2	❊	—

Also available in the B131L-C version, featuring a large 42 mm jaw opening, for an easier introduction/ removal of large size compression terminations and joints.



These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

14.4 V CORDLESS HYDRAULIC CRIMPING TOOL

B 131-UC

general features

DOUBLE ACTION SPEED

14.4V 3.0Ah Ni-MH

Crimping force kN	Dimensions mm			Battery	Weight kg (with battery)
	length	height	width		
130	435	250	100	14,4 V 3.0 Ah	7,4

MAIN APPLICATIONS - max section mm²

L.V. lugs and splices	Insulated terminals	"C" sleeve Connectors	H.V. lugs and splices	Alu lugs and splices
400	240	185	400	300

STORAGE

Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P19	542x412xh197	3,2	❄	—

The tool is supplied with:

- *Basic tool complete with battery and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and 14 sets of semi-circular slotted dies*

Available upon request:

- *ESC600 cable for connection to a 12V dc external power supply/vehicle battery length 6 m.*

- 14.4 V cordless hydraulic crimping tool, lightweight and balanced for single hand operation. This tool will accept the accessories for performing the "Deep Stepped Indent" system of crimping on aluminium cables.
- This tool will also accept the semi-circular slotted dies, common to most 130 kN tools.
- The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the connector and a slower more powerful speed for crimping.
- For ease of operation and comfort of the operator the tool head can be fully rotated through 180 degrees.
- The tool is powered by 14.4 V dc Ni-MH battery.
- A balanced tool for optimum control.
- Quiet in operation with very little vibration.
- Lightweight construction enables the operator to hold the tool in one hand and to position the connector with the other hand.
- The operating buttons, crimp/release, are mechanically interlocked, to prevent accidental operation of the tool.
- A microprocessor controls the tool operation and automatically cuts out the motor, on completion of the crimping operation, saving energy and extending battery life.
- The residual battery capacity is automatically displayed after every cycle.
- Fitted with an integral socket, for connection to a 12 V dc external power supply/vehicle battery.
- The tool is provided with a maximum pressure valve.

Motor ventilation

Battery condition display

High power battery

Socket for 12÷14.4 V dc external power supply

Operating and pressure release buttons mechanically interlocked

Easy to operate with only one hand

Cable type ESC600

These tools are supplied without dies. For die selection, please refer to chart on pages 142 to 146

OVERHEAD LINE APPLICATION

B-TC026

14.4 V CORDLESS HYDRAULIC CUTTING TOOL

general features

Max cutting Ø mm	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
25	295	302	94	14,4 V 3.0 Ah	4,3

14.4 V cordless hydraulic cutting tool, lightweight and balanced for single hand operation. **The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.** Specifically designed to cut copper, aldrey, aluminium, aluminium-steel cables and steel ropes, aluminium and steel rods having a max overall diameter of 25 mm.

The blades are manufactured from high strength special steel, heat treated to ensure a long service life. The crimping head can rotate through 180° for ease of operation. Fitted with a maximum hydraulic pressure valve. Complete with a battery condition display, which after every operation indicates the residual battery power.
Extremely quiet in operation, with very little vibration. Ergonomically designed with a sculptured body for operator comfort.

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9	543x412xh130	2,2	❊	—

The tool is supplied with:

- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and accessories*

For further details about the cutting capacity, please consult the table of page 110.

OVERHEAD LINE APPLICATION

B-TC04

14.4 V CORDLESS HYDRAULIC CUTTING TOOL

general features

Max cutting Ø mm	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
40	492	250	100	14,4 V 3.0 Ah	7,6

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL BTC04	566x410xh130	6,7	❊	—

The tool is supplied with:

- *Basic tool with battery and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Metal carrying case suitable for storing the tool and accessories*

- 14.4 V cordless hydraulic cutting tool specifically designed cut copper, aldrey, aluminium, aluminium-steel cables and steel ropes, aluminium and steel rods having a max overall diameter of 40 mm.
- Lightweight and balanced for single hand operation.
- The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.
- For ease of operation and comfort of the operator the tool head can be rotated through 90 degrees.
- The tool is powered by 14.4 V dc Ni-MH battery.
- A balanced tool for optimum control.
- Quiet in operation with very little vibration.
- Lightweight construction enables the operator to hold the tool in one hand and to position the cable with the other hand.
- The operating buttons, cut/release, are mechanically interlocked, to prevent accidental operation of the tool.
- A microprocessor controls the tool operation and automatically cuts out the motor, on completion of the cutting operation, saving energy and extending battery life.
- The residual battery capacity is automatically displayed after every cycle.
- Fitted with an integral socket, for connection to a 12 V dc external power supply/vehicle battery.
- The tool is provided with a maximum pressure valve.

For further details about the cutting capacity, please consult the table of page 112.

14.4 V CORDLESS HYDRAULIC CUTTING TOOL

OVERHEAD LINE APPLICATION
B-TC051Y

general features

Max cutting Ø mm	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
50	414	302	94	14,4 V 3.0 Ah	5,4

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9	543x412xh130	2,2	❇	—

The tool is supplied with:
- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and accessories*

14.4 V cordless hydraulic cutting tool, lightweight and balanced for single hand operation.
Specifically designed to cut copper, aluminum, aluminum-steel cables (ACSR) having a max overall diameter of 50 mm.
The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The head can be easily opened to allow the cutting of running cables.

The head can rotate through 90 degrees, to enable the operator to work in the most comfortable position. Fitted with a maximum hydraulic pressure valve. Complete with a battery condition display, which after every operation indicates the residual battery power. Extremely quiet in operation, with very little vibration. Ergonomically designed with a sculptured body for operator comfort.

Does not cut stay wire, steel wire or earthing rod.

14.4 V CORDLESS HYDRAULIC CUTTING TOOL

OVERHEAD LINE APPLICATION
B-TC055

general features

Max cutting Ø mm	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
55	483	298	94	14,4 V 3.0 Ah	9,41

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL B-TC095	565x410x132	6,7	❇	—

The tool is supplied with:
- *Basic tool with battery and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and accessories*

14.4 V cordless hydraulic cutting tool, lightweight and balanced for single hand operation.
Specifically designed cut copper, aldrey, aluminium, aluminium-steel cables and steel ropes, aluminium and steel rods having a max overall diameter of 55 mm.
The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life. The head can be easily opened to allow the cutting of running cables.
The head can rotate through

327 degrees, to enable the operator to work in the most comfortable position. Fitted with a maximum hydraulic pressure valve. Complete with a battery condition display, which after every operation indicates the residual battery power. Extremely quiet in operation, with very little vibration. Ergonomically designed with a sculptured body for operator comfort.

For further details about the cutting capacity, please consult the table of page 114.

INDUSTRIAL APPLICATION

B-TC051

14.4 V CORDLESS HYDRAULIC CUTTING TOOL

general features

Max cutting mm	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
50	414	302	94	14,4 V 3.0 Ah	5,4

DOUBLE ACTION SPEED

14.4V 3.0Ah Ni-MH

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9	543x412x130	2,2	❊	—

The tool is supplied with:

- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and accessories*

14.4 V cordless hydraulic cutting tool, lightweight and balanced for single hand operation.
Specifically designed to cut copper, aluminium and telecommunication cables having a max overall diameter of 50 mm.
The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The head can be easily opened to allow the cutting of running cables.
The head can rotate through 90 degrees, to enable the operator to work in the most comfortable position. Fitted with a maximum hydraulic pressure valve. Complete with a battery condition display, which after every operation indicates the residual battery power.
Extremely quiet in operation, with very little vibration. Ergonomically designed with a sculptured body for operator comfort.

INDUSTRIAL APPLICATION

B-TC065

14.4 V CORDLESS HYDRAULIC CUTTING TOOL

general features

Max cutting mm	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
65	445	305	94	14.4 V 3.0 Ah	6,4

DOUBLE ACTION SPEED

14.4V 3.0Ah Ni-MH

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9	543x412x130	2,2	❊	—

The tool is supplied with:

- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and accessories*

14.4 V cordless hydraulic cutting tool, lightweight and balanced for single hand operation.
Specifically designed to cut copper, aluminium and telecommunication cables having a max overall diameter of 65 mm.
The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.
The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The head can be easily opened to allow the cutting of running cables.
The head can rotate through 335 degrees, to enable the operator to work in the most comfortable position.
Fitted with a maximum hydraulic pressure valve. Complete with a battery condition display, which after every operation indicates the residual battery power.
Extremely quiet in operation, with very little vibration. Ergonomically designed with a sculptured body for operator comfort.

14.4 V CORDLESS HYDRAULIC CUTTING TOOL

INDUSTRIAL APPLICATION
B-TC095

general features

Max cutting mm	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
95	527	305	94	14.4 V 3.0 Ah	7,36

STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL B-TC095	565x410x132	6,7	❇	—

The tool is supplied with:
- *Basic tool with battery and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Metal carrying case suitable for storing the tool and accessories*

14.4 V cordless hydraulic cutting tool specifically designed to cut copper, aluminium and telecommunication cables having a max overall diameter of 95 mm.
The tool features a double speed action: a fast advancing speed for rapid approach of the blades to the cable and a slower more powerful speed for cutting.

The blades are manufactured from high strength special steel, heat treated to ensure a long service life.
The head can be easily opened to allow the cutting of running cables.
The head can rotate through 335 degrees, to enable the operator to work in the most comfortable position.
Fitted with a maximum hydraulic pressure valve. Complete with a battery condition display, which after every operation indicates the residual battery power.

Extremely quiet in operation, with very little vibration. Ergonomically designed with a sculptured body for operator comfort.

B-FC48

14.4 V CORDLESS HYDRAULIC TOOL FOR PUNCHING HOLES

general features

Max hole punch Ø mm	Dimensions mm			Battery	Weight kg (with battery)
	length	*height*	*width*		
47	351	302	94	14,4 V 3.0 Ah	5

DOUBLE ACTION SPEED

14.4V 3.0Ah Ni-MH

14.4 V cordless hydraulic tool for punching holes from 15,2 up to 47 mm diameter in the side wall of trunking without the need for pre drilling. Lightweight and balanced for single-hand operation.

The tool features a double speed action: a fast advancing speed for rapid approach of the dies to the material and a slower more powerful speed for punching.

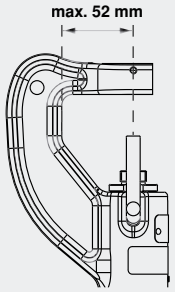
The punching head can rotate through 180° for ease of operation.

Complete with battery condition display, which after every operation indicates the residual battery power.

Extremely quiet in operation, with very little vibration. Ergonomically designed with a sculptured body for operator comfort.

Also available in the hand operated mechanical version MT-FC47 (see page 93).

Max centre of hole to edge of trunking: 52 mm



STORAGE				
Type	Dimensions mm	Weight kg	Supplied with the tool	Available upon request
VAL P9	543x412xh130	2,2	❊	—

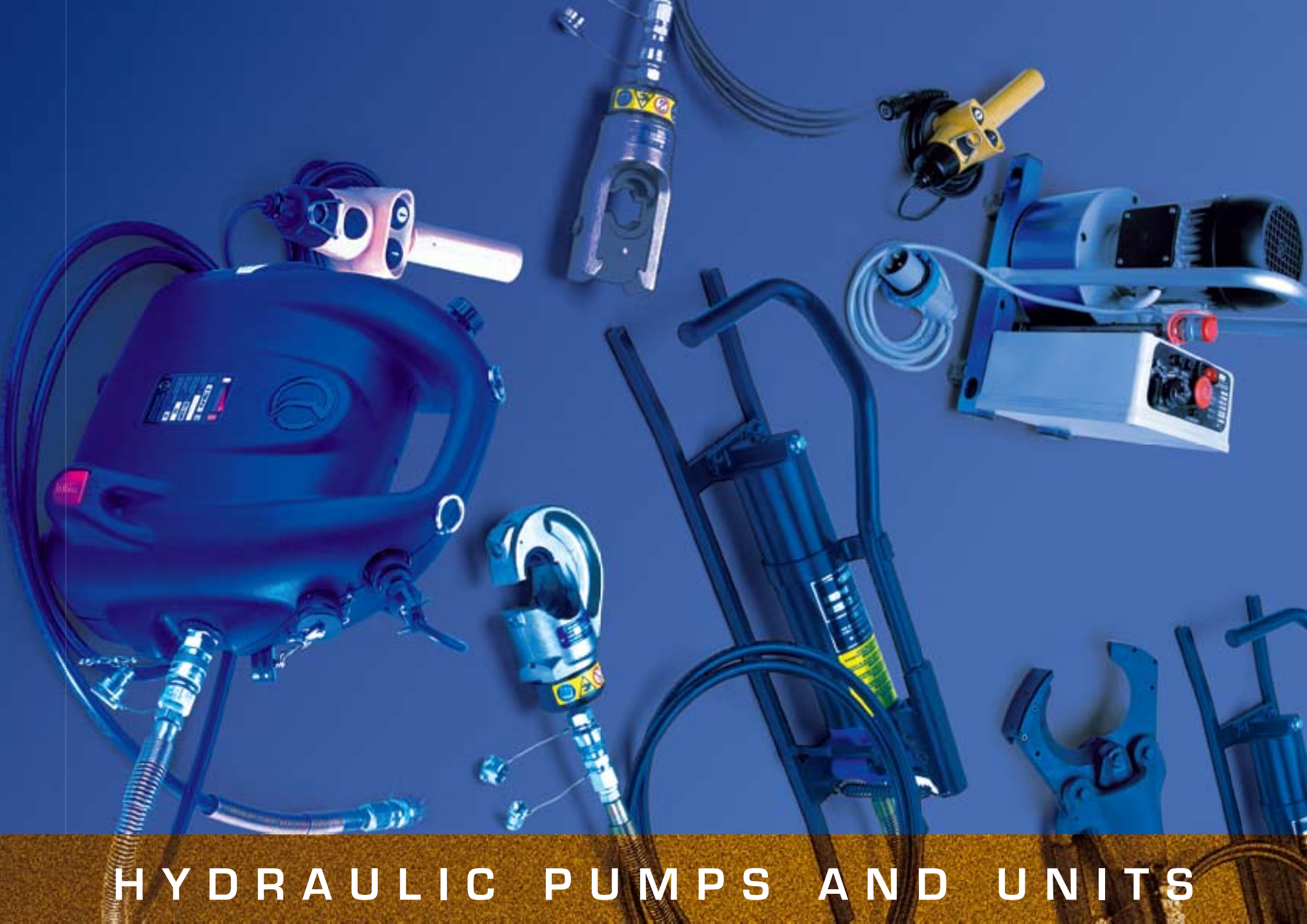
The tool is supplied with:

- *Basic tool with battery, wrist strap and shoulder strap*
- *Spare battery*
- *Battery charger*
- *Plastic carrying case suitable for storing the tool and accessories*

Table denotes the punch/die set reference, for each hole size. Suitable for punching holes in mild steel, fibreglass or plastic material, up to 3 mm thick.

Hole Dimensions					Maximum thickness of mild steel mm	Code
Ø mm	Ø inch	Pg	ISO	Tube		
15,2	.598	Pg 9	-	-		**RD 15,2 S**
16,2	.638	-	ISO-16	-		**RD 16,2 S***
17,5	.688	-	-	-		**RD 17,5 S***
18,6	.732	Pg 11	-	-		**RD 18,6 S**
19,1	.750	-	-	-		**RD 19,1 S***
20,4	.803	Pg 13,5	ISO-20	-		**RD 20,4 S**
20,6	.812	-	-	-		**RD 20,6 S***
22,5	.885	Pg 16	-	1/2"	**2**	**RD 22,5 S**
23,8	.937	-	-	-		**RD 23,8 S***
25,4	1.000	-	ISO-25	-		**RD 25,4 S***
27,0	1.063	-	-	-		**RD 27 S***
28,3	1.115	Pg 21	-	3/4"		**RD 28,3 S**
28,6	1.125	-	-	-		**RD 28,6 S***
30,5	1.210	-	-	-		**RD 30,5 S***
31,8	1.250	-	-	-		**RD 31,8 S***
32,5	1.280	-	ISO-32	-		**RD 32,5 S***
34,6	1.357	-	-	1"		**RD 34,6 S***
34,9	1.375	-	-	-		**RD 34,9 S***
37,0	1.457	Pg 29	-	-		**RD 37 S**
38,1	1.500	-	-	-	**3**	**RD 38,1 S***
40,5	1.594	-	ISO-40	-		**RD 40,5 S***
41,3	1.625	-	-	-		**RD 41,3 S***
43,2	1.699	-	-	1-1/4"		**RD 43,2 S***
44,5	1.750	-	-	-		**RD 44,5 S***
47,0	1.850	Pg 36	-	-		**RD 47 S**

**available upon request*



HYDRAULIC PUMPS AND UNITS

HYDRAULIC PUMPS

PO 7000

Foot operated double speed pump, developing a maximum pressure of 700 bar.
The pump is supplied with 3 m long high pressure flexible hose complete with female self-lock quick coupler.
Pressure can be withdrawn at any time during operation by depressing the release lever.
A solid shaped stand gives the pump stability during operation.

Operating pressure bar	Dimensions mm			Weight kg
	length	*width*	*height*	
700	680	200	163	9,8

Storage type	Dimensions mm	Weight kg
VAL P21*	820x430xh290	6,74

**Supplied with the pump*

CPE-1 CPE-1-110

New

Electrically driven hydraulic pump, powered by a 230V / 50-60Hz single-phase electric motor.
The remote hand controller allows advancement and pressure release on completion of the crimping operation.
The mechanically actuated emergency button located on the pump body allows the pressure release at any time in case of power shortage.
Also available **CPE-1-110** version for 110-115V / 50-60Hz.
Both models are IP 55 rated.

Operating pressure bar	Dimensions mm			Weight kg
	length	*width*	*height*	
700	372	223	482	21

The pump is supplied with:
- high pressure flexible hose with male and female automatic quick coupler
- remote hand controller
- external supply connection cable

Available as optional accessories:
- **RCP-B70** remote foot controller
- **CS-CPE-1** transportation trolley

CS-CPE-1

CPE-0-P12N

Portable electro-hydraulic pump, operating at 12 V, and developing a pressure of 700 bar.
This pump can either be operated by battery for independent use, or by an external 12V dc supply.
Complete with internal battery charger,

CPE-0-P12N is supplied with:
– 3 m flexible hose complete with male + female 3/8" NPT self-lock quick couplers
– Remote control cable
– External 12V dc supply cable
– Back-up 12V dc battery

Operating pressure bar	Dimensions mm			Weight kg
	length	*width*	*height*	
700	343	162	353	19,5*

**without accessories*

– Battery charger 240 V ac supply cable
– Canvas holdall for carrying accessories

Additional accessories available on request:
– Remote pedal control
– External battery charger

CPP-0

The CPP-0 air hydraulic power unit intensifies an air supply of 6÷8 bar (87-115 psi) to a power crimping or cutting force of up to 700 bar (10.000 psi) depending upon the input pressure.
The control pedal allows for advancing and pressure release at any stage of the operation.
The unit is provided with a 2 m high pressure flexible hose, including a 3/8" NPT female self-lock quick coupler.

Operating pressure bar	Dimensions mm			Weight kg
	length	*width*	*height*	
700	320	150	200	6,8

HYDRAULIC PUMPS

B70M-P24

Portable electro-hydraulic pump, operating at 24V dc by battery for independent use, developing 700 bar pressure; it features an integral socket for connection to an external 24 V dc supply. It is also available insulated and operated by remote pneumatic hand controller and supplied with an non-conductive hose.

Operating pressure bar	Dimensions mm			Weight kg
	length	*width*	*height*	
700	390	163	323	9,2*

**without accessories*

B70M-P24 is supplied with:
- 3 m flexible hose complete with male + female 3/8" NPT self-lock quick couplers
- Remote control
- Shoulder strap
- External battery charger
- Canvas holdall for carrying accessories

Additional accessories available on request:
- Spare 24V dc battery
- 24 V dc external supply connection cables:
  - **ESC 300 CEE** with 24 V dc CEE type plug (3 m length)
  - **ESC 600** with crocodile clips (6 m length)
- **RCP-B70** remote foot pedal controller
- **RCH-B70** remote hand controller (adjustable on 3 m length flexible hose)
- **TRS-B70** canvas rucksack (for carrying the pump)
- **SH-B70** hook (for hanging the pump from a ladder)

SUPPLIED WITH

1. Powerful 24V 3Ah Ni-MH battery.
2. Plug-in remote hand controller with bezel-locking electrical connector.
3. 3metre, high pressure flexible hose with automatic self-lock, quick couplers.
4. Self-ventilating battery charger for in-house use.
5. Shoulder strap for attachment to rings provided on pump.
6. Canvas accessories bag.

Remote electrical hand or foot controller connection

24V dc external power supply socket with protective cap

Easily accessible oil top-up inlet

High pressure hose connects to automatic self-lock quick coupling with protective cap

B70M-P24A-KV insulated version with remote pneumatic hand controller

Powerful 24V Ni-MH rechargeable battery

Battery residual power level display

Manual pressure release button

ACCESSORIES FOR B70M-P24A

ESC 300CEE
CONNECTING CABLE WITH 24V dc CEE TYPE PLUG
(for power from an external source, length 3 meters)

ESC 600
CONNECTING CABLE WITH CROCODILE CLIPS
(for power from an external source, length 6 meters)

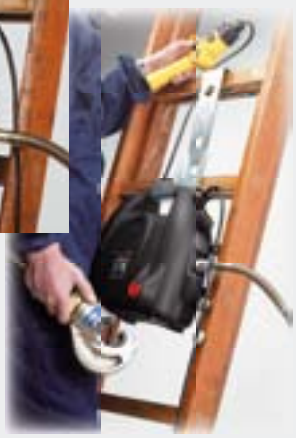
TRS-B70
CANVAS RUCKSACK
(for carrying the pump)

RCH-B70
CONTROL HANDLE
FOR FLEX HOSES

Pressure release button

Operating push-button

SH-B70
HOOK
(for hanging the pump from a ladder)



VAL-P18
Durable case for pump and accessories.

RCP-B70
PORTABLE REMOTE FOOT CONTROL

HYDRAULIC UNITS

Hydraulic units are obtained by combining the double stage hydraulic foot pump with the various hydraulic press heads featured on previous pages.
The use of the double speed pump considerably reduces operating time.

CP 1131

*(pump **P0 7000** + head **RHC 131**)*

Crimping force kN	Dimensions pump mm	Dimensions head mm	Weight kg
130	680x200xh163	232x124	13,6

MAIN APPLICATIONS - max section mm²

L.V. lugs and splices	Insulated terminals	"C" sleeve connectors	H.V. lugs and splices
400	240	185	400

Storage type	Dimensions mm	Weight kg
VAL P21*	820x430xh290	6,74

**Supplied with the unit, suitable for storage of 24 semi-circular slotted dies*

CPU 1131-C

*(pump **P0 7000** + head **RHU 131-C**)*

Crimping force kN	Dimensions pump mm	Dimensions head mm	Weight kg
130	680x200xh163	245x89	13,5

MAIN APPLICATIONS - max section mm²

L.V. lugs and splices	Insulated terminals	"C" sleeve connectors	H.V. lugs and splices	Alu lugs and splices
400	240	185	400	300

Storage type	Dimensions mm	Weight kg
VAL P21*	820x430xh290	6,74

**Supplied with the unit, suitable for storage of 24 semi-circular slotted dies and accessories for crimping aluminium connectors*

CPU 1230-3D

*(pump **P0 7000** + head **ECW-H3D**)*

Crimping force kN	Dimensions pump mm	Dimensions head mm	Weight kg
230	680x200xh163	315x120	15,3

MAIN APPLICATIONS - max section mm²

L.V. lugs and splices	Insulated terminals	"C" sleeve connectors	H.V. lugs and splices
630	300	240	630

Storage type	Dimensions mm	Weight kg
VAL P21*	820x430xh290	6,74

**Supplied with the unit, suitable for storage of 24 semi-circular slotted dies and adaptors and dies specific for head ECW-H3D*

HYDRAULIC CUTTING UNITS

CP 1096

*(pump **PO 7000** + head **TC 096**)*

Max cutting Ø mm	Dimensions pump mm	Dimensions head mm	Weight kg
95	680x200xh163	397x249	17,7

Storage type	Dimensions mm	Weight kg
VAL CP 096*	785x430xh175	14,0

**Supplied with the unit*

Units CP-W-KV

GS approval n. ET 04246

Meets the requirements of EN 50340 VDE 0682 part 661 and GS-ET-23

Hydraulic units provide protection against short circuit when cutting accidentally live L.V. / M.V. cables with nominal voltage up to 30 kV (36 kV maximum working voltage acceptable).

Unit Type	Max cutting Ø mm	Dimensions pump	Dimensions head	Weight kg
CP 1086-W-1000-KV	85	680x200x163	405x143	16,6
CP 1096-W-1000-KV	95	680x200x163	407x245	19,0
CP 1120-W-1000-KV	120	680x200x163	556x185	20,2

Storage case type	Dimensions mm	Weight kg
VAL CP096-W*	785x430xh175	12,6

Supplied with the **unit*

Optional accessories:

- EK100 earth cable for the pump (1 m length)
- EK500P earth cable for the head (5 m length) with earth rod and canvas bag

EK 500P

EK 100

DIE SELECTOR CHART

DIE SELECTOR CHART

COPPER CONDUCTORS

APPLICATION	CONDUCTOR		CONNECTOR			HYDRAULIC TOOLS																	
						B 15	HT 45 - E			HT 51 RH 50 B 51 B 55			HT 81-U RHU 81		HT 120 and tools and heads with 130 kN crimping force			ECW-H3D			RHU 520		
	Conductor Size sqmm Low str.	Flex	TERMINAL		SPLICE	DIE SET	NEST	INDEN-TOR	DIE SET	NEST	INDENTOR	DIE SET	DIE SET	DIE SET	NEST	INDENTOR	DIE SET	NEST	INDENTOR	DIE SET	NEST	INDENTOR	DIE SET
COPPER CONDUCTORS	0,25 ÷ 2,5		A 03-M.. A 06-M..		L 03-M /L 03-P L 06-M/L 06-P	ME03/2-15 (1) MA03/3-15 (1)																	
	4 ÷ 6		A 1-M..		L 1-M L 1-P	ME03/2-15 (1) MA03/3-15 (1)	MA 1 (1)	PA 1	ME 1 (1)			ME 1-50 (1)											
	10		A 2-M.. A 2-P12		L 2-M L 2-P	ME03/2-15 (1) ME2/3-15 (1) MA03/3-15 (1)	MA 2.3 (1)	PA 5	ME 2 (1)	MA 2.3-50 (1)	PA 5-50	ME 2-50 (1)		ME 2.19-U (1)	MA 2-C (1)	PA 10-C	ME 2-C (1)	Adaptor AU 230-130 D with die set MA..-C and indentor PA..-C		Adaptor AU 230-130 D with die set ME..-C	Adaptor AU 520-130 C with die set MA..-C and indentor PA..-C		Adaptor AU 520-130 C with die set ME..-C
	16		A 3-M.. A 3-P14	2A 3-M..	L 3-M L 3-P	ME2/3-15 (1) MA03/3-15 (1)			ME 3 (1)			ME 3-50 (1)	MA 3.5-U (1)	ME 3.14-U (1)	MA 3-C (1)		ME 3-C (1)						
	25		A 5-M.. A 5-P16	2A 5-M..	L 5-M L 5-P		MA 5 (1)		ME 5 (1)	MA 5-50 (1)		ME 5-50 (1)		ME 5.7-U (1)	MA 5-C (1)		ME 5-C (1)						
	35	25* 35	A 7-M.. A 7-P20	2A 7-M..	L 7-M L 7-P		MA 7 (1)	PA 10	ME 7 (1)	MA 7-50 (1)	PA 10-50	ME 7-50 (1)	MA 7.14-U (1)		MA 7-C (1)		ME 7-C (1)						
	50	35* 50	A 10-M.. A 10-P25	2A 10-M..	L 10-M L 10-P		MA 10 (1)		ME 10 (2)	MA 10-50 (1)		ME 10-50 (2)	MA 10.19-U (1)	ME 10.24-U (2)	MA 10-C (1)		ME 10-C (1)						
	70	50* 70	A 14-M.. A 14-P30	2A 14-M..	L 14-M L 14-P				ME 14 (2)	MA 14-50 (1)	PA 19-50	ME 14-50 (2)	MA 7.14-U (1)	ME 3.14-U (2)	MA 14-C (1)	PA 24-C	ME 14-C (1)						
	95	70* 95	A 19-M..	2A 19-M..	L 19-M L 19-P				ME 19 (2)	MA 19-50 (1)		ME 19-50 (2)	MA 10.19-U MA 19-U (1)	ME 2.19-U (2)	MA 19-C (1)		ME 19-C (1)						
	120	95* 120	A 24-M..	2A 24-M..	L 24-M L 24-P				ME 24 (2)	MA 24-50 (1)	PA 24-50	ME 24-50 (2)	MA 24-U (1)	ME 10.24-U (2)	MA 24-C (1)		ME 24-C (1)						
	150	120* 150	A 30-M..	2A 30-M..	L 30-M L 30-P				ME 30 (3)			ME 30-50 (3)	MA 30-80-U (1)	ME 30-U (2)	MA 30-C (1)		ME 30-C (1)						
	185	150* 185	A 37-M.. A 37-4ESI	2A 37-M..	L 37-M L 37-P							ME 37-50 (3)	MA 37-U (2)	ME 37-U (2)	MA 37-C (1)	PA 48-C	ME 37-C (1)						
	240	185* 240	A 48-M.. A 48-4ESI	2A 48-M..	L 48-M L 48-P							ME 48-50 (3)	MA 48-U (3)	ME 48-U (3)	MA 48-C (1)		ME 48-C (2)						
	300	240 300	A 60-M.. A 60-4ESI	2A 60-M..	L 60-M..										MA 60-C (1)	PA 60-C	ME 60-C (3)						
	400	300	A 80-M.. A 80-4ESI	2A 80-M..	L 80-M..												ME 80-C (3)	MA 80-3D (1)	PA 100-3D	ME 80-3D (2)	MA 80-520 (1)		ME 80-520 (2)
	500	400	A 100-M.. A 100-4ESI	2A 100-M..	L 100-M..													MA 100-3D (1)		ME 100-3D (2)	MA 100-520 (1)	PA 120-520	ME 100-520 (2)
	630	500	A 120-M.. A 120-4ESI	2A 120-M..	L 120-M..													MA 120-3D (1)	PA 120-3D	ME 120-3D (2)	MA 120-520 (1)		ME 120-520 (2)
	800	630	A 160-M.. A 160-4ESI	2A 160-M..	L 160-M..																MA 160-520 (1)	PA 200-520	ME 160-520 (2)
	1000	800	A 200-M..	2A 200-M..	L 200-M..																MA 200-520 (1)		ME 200-520 (2)
EXTRA FLEXIBLE COPPER CONDUCTORS		35	A 9-M..				MA 9 (1)	PA 10	ME 9 (1)	MA 9-50 (1)	PA 10-50	ME 9-50 (1)	MA 9.17-U (1)	ME 9.20-U (1)	MA 9-C (1)	PA 10-C	ME 9-C (1)	Adaptor AU 230-130 D with die set MA..-C and indentor PA..-C		Adaptor AU 230-130 D with die set ME..-C	Adaptor AU 520-130 C with die set MA..-C and indentor PA..-C		Adaptor AU 520-130 C with die set ME..-C
		50	A 12-M..						ME 12 (2)	MA 12-50 (1)	PA 19-50	ME 12-50 (2)	MA 12.20-U (1)	ME 12.17-U (2)	MA 12-C (1)		ME 12-C (1)						
		70	A 17-M..						ME 17 (2)	MA 17-50 (1)	PA 19-50	ME 17-50 (2)	MA 9.17-U (1)	ME 12.17-U (2)	MA 17-C (1)	PA 24-C	ME 17-C (1)						
		95	A 20-M..						ME 20 (2)	MA 20-50 (1)	PA 19-50	ME 20-50 (2)	MA 12.20-U (1)	ME 9.20-U (2)	MA 20-C (1)		ME 20-C (1)						
		120	A 29-M..									ME 29-50 (3)	MA 29.80-U (1)	ME 29-U (2)	MA 29-C (1)		ME 29-C (1)						
		150	A 35-M..									ME 35-50 (3)	MA 35-U (2)	ME 35-U (2)	MA 35-C (1)	PA 48-C	ME 35-C (1)						
		185	A 40-M..									ME 40-50 (3)	MA 40-U (2)	ME 40-U (3)	MA 40-C (1)		ME 40-C (1)						

= Hexagonal crimp *(use one size up with fine stranded conductors, E.G.: 95² fine stranded use A19-.. + ME 19 or A 20-.. + ME 20)* = Indent crimp * Contact Cembre for appropriate die set ***N.B.:*** *Number inside symbol indicates the number of crimps on A-M barrel*

APPLICATION	CONDUCTOR	CONNECTOR					HYDRAULIC TOOLS						
							B 15	HT 51 RH 50 B 51 B 55	HT 120 and tools and heads with 130 kN crimping force			ECW-H3D	
COPPER CONDUCTORS	Conductor Size Flex sqmm	TERMINAL						DIE SET	NEST	INDENTOR	DIE SET	NEST	INDENTOR
 ANE..-M..	10	ANE 2-M..	ANE 2-P12	ANE 2-U..			NN4-15	MN 2 RF-50	MN 2-C	PN 7-C	MN 2 RF-C	Adaptor AU 230-130 D with die set MN..-C and indentor PN..-C or with die set MN..-RF-C and die set MN..F-C	
	16	ANE 3-M..	ANE 3-P14	ANE 3-U..				MN 3 RF-50	MN 3-C		MN 3 RF-C		
	25	ANE 5-M..	ANE 5-P16					MN 5 RF-50	MN 5-C		MN 5 RF-C		
	35	ANE 7-M..	ANE 7-P20					MN 7 RF-50	MN 7-C		MN 7 RF-C		
 ANE..-P..	50	ANE 10-M..						MN 10 RF-50	MN 10-C	PN 14-C	MN 10 RF-C		
	70	ANE 14-M..						MN 14 RF-50	MN 14-C		MN 14 RF-C		
	95	ANE 19-M..							MN 19-C	PN 24-C	MN 19 RF-C		
	120	ANE 24-M..							MN 24-C		MN 24 RF-C		
	150	ANE 30-M..							MN 30-C	PN 37-C	MN 30 RF-C		
 ANE..-U..													
EXTRA FLEXIBLE COPPER CONDUCTORS	35	ANE 9-M..						MN 7 RF-50	MN 9-C	PN 14-C	MN 7 RF-C	Adaptor AU 230-130 D with die set MN..-C and indentor PN..-C or with die set MN..-RF-C and die set MN..F-C	
 ANE..-M..	50	ANE 12-M..						MN 12 F-50	MN 12-C		MN 12 F-C		
	70	ANE 17-M..						MN 17 F-50	MN 17-C	PN 24-C	MN 17 F-C		
	95	ANE 20-M..							MN 20-C		MN 20 F-C		
	120	ANE 29-M..							MN 29-C	PN 37-C	MN 29 F-C		
	150	ANE 35-M..							MN 35-C		MN 35 F-C		
COPPER CONDUCTORS	Conductor Size Flex sqmm	TERMINAL					DIE SET	DIE SET					
 PK ...	0,3 ÷ 4	PKD 506 ÷ PKD 418	PKE 508 ÷ PKE 418	PKC 508 ÷ PKC 418	KE 506 ÷ KE 412		KE4-15						
	4 ÷ 16	PKD 410 ÷ PKD 1618	PKE 410 ÷ PKE 1618	PKC 410 ÷ PKC 1618	KE 410 ÷ KE 1616		KE16-15						
	16	PKD 16..	PKE 16..	PKC 16..	KE 16..		KE35-15	MTT 16-50					
	25	PKD 25..	PKE 25..	PKC 25..	KE 25..			MTT 25-50					
	35	PKD 35..		PKC 35..	KE 35..			MTT 35-50					
	50	PKD 50..		PKC 50..				MTT 50-50					

= Hexagonal crimp = Indent crimp = Radial crimp = circular crimp = Trapezium crimp

DIE SELECTOR CHART

TAP-OF ON COPPER CONDUCTOR

APPLICATION	CONDUCTOR		CONNECTOR		HYDRAULIC TOOLS					
					HT 45-E	HT 51 RH 50 B 51 B 55	HT 81-U RHU 81	HT 120 and tools and heads with 130 kN crimping force	ECW-H3D	RHU 520
	Conductor Size sqmm		CONNECTOR	CONNECTOR	DIE SET	DIE SET	DIE SET	DIE SET	DIE SET	DIE SET
	Run	*Tap*								
	6 ÷ 2,5	6 ÷ 1,5	C 6 - C 6 ST	C 6 - C 6	MC 6	MC 6-50	MC 6.25-U			
	10	10 ÷ 1,5	C 10 - C 10 ST	C 10 - C 10	MC 10	MC 10-50	MC 10-U	MC 10-C	Adaptor AU 230-130 D with die set MC..-C	Adaptor AU 520-130 C with die set MC..-C
	16	16 ÷ 1,5	C 16 - C 16 ST	C 16 - C 16						
	25 ÷ 16	10 ÷ 1,5	C 25 - C 10 ST	C 25 - C 10	MC 25	MC 25-50	MC 6.25-U MC 25-U	MC 25-C		
	25	25 ÷ 16	C 25 - C 25 ST	C 25 - C 25						
	40 ÷ 35	16 ÷ 1,5	C 35 - C 16 ST	C 35 - C 16	MC 35	MC 35-50	MC 35-U	MC 35-C		
	40 ÷ 35	40 ÷ 25	C 35 - C 35 ST	C 35 - C 35						
	50	25 ÷ 10								
	70 ÷ 63	25 ÷ 1,5	C 70 - C 25N ST	C 70 - C 25N						
	50	25 ÷ 4	C 50 - C 25 ST	C 50 - C 25		*MC 70-50	MC 70-80U	MC 70-C	MC 70-3D	
	*50	50 ÷ 35	C 50 - C 50 ST	C 50 - C 50						
	*70 ÷ 50	40 ÷ 4	C 70 - C 35 ST	C 70 - C 35						
	*70 ÷ 50	70 ÷ 35	C 70 - C 70 ST	C 70 - C 70						
	100 ÷ 95	40 ÷ 4	C 95 - C 35 ST	C 95 - C 35			MC 95-80U	MC 95-C	MC 95-3D	
	100 ÷ 95	70 ÷ 40	C 95 - C 70 ST	C 95 - C 70						
	100 ÷ 95	100 ÷ 63	C 95 - C 95 ST	C 95 - C 95						
	125 ÷ 110	125 ÷ 25	C 120 - C 120 ST	C 120 - C 120				MC 185-C	MC 185-3D	
	160 ÷ 150	125 ÷ 25	C 150 - C 120 ST	C 150 - C 120						
	150	150 ÷ 63	C 150 - C 150 ST	C 150 - C 150						
	185	100 ÷ 16	C 185 - C 95 ST	C 185 - C 95						
	185 ÷ 120	185 ÷ 120	C 185 - C 185 ST	C 185 - C 185					MC 240-3D	
	240 ÷ 150	120 ÷ 95	C 240 - C 120 ST	C 240 - C 120						

H.V. COPPER CONDUCTORS

Conductor Size sqmm	SPLICE		TERMINALS			DIE SET	DIE SET	DIE SET	DIE SET	DIE SET
25 R	MT 25 - TD	MT 25 - GC	CA 25 - M..	CA 25 - 2M..	MT 25 - C..	MMT 25-50	MMT 25-U	MMT 25-C	Adaptor AU 230-130 D with die set MMT..-C	Adaptor AU 520-130 C with die set MMT..-C
35 RC/S ÷ 40 S	MT 40 S - TD	MT 40 S - GC	CA 40 S - M..	CA 40 S - 2M..	MT 40 S - C..					
50 RC	MT 50 R - TD	MT 50 R - GC	CA 50 R - M..	CA 50 R - 2M..	MT 50 R - C..	MMT 50-50	MMT 50-U	MMT 50-C		
50 S	MT 50 S - TD	MT 50 S - GC	CA 50 S - M..	CA 50 S - 2M..	MT 50 S - C..					
63 S ÷ 70 S	MT 70 S - TD	MT 70 S - GC	CA 70 S - M..	CA 70 S - 2M..	MT 70 S - C..					
80 S ÷ 95 RC	MT 95 R - TD	MT 95 R - GC	CA 95 R - M..	CA 95 R - 2M..	MT 95 R - C..	MMT 95-50	MMT 95-U	MMT 95-C		
95 S ÷ 100 S	MT 95 S - TD	MT 95 S - GC	CA 95 S - M..	CA 95 S - 2M..	MT 95 S - C..					
120 RC/S ÷ 150 RC	MT 150 R - TD	MT 150 R - GC	CA 150 R - M..	CA 150 R - 2M..	MT 150 R - C..					
150 S ÷ 160 RC	MT 150 S - TD	MT 150 S - GC	CA 150 S - M..	CA 150 S - 2M..	MT 150 S - C..	MMT 200-50	MMT 200-U	MMT 200-C		
160 S ÷ 200 RC	MT 200 R - TD	MT 200 R - GC	CA 200 R - M..	CA 200 R - 2M..	MT 200 R - C..					
200 S ÷ 240 RC	MT 240 R - TD	MT 240 R - GC	CA 240 R - M..	CA 240 R - 2M..	MT 240 R - C..					
240 S ÷ 315 RC	MT 315 R - TD	MT 315 R - GC	CA 315 R - M..	CA 315 R - 2M..	MT 315 R - C..			MMT 315-C		
315 S	MT 315 S - TD	MT 315 S - GC	CA 315 S - M..	CA 315 S - 2M..	MT 315 S - C..					
400 R	MT 400 - TD		2A 80 - M..	2A 80 - 2M..				ME 80-C	ME 80 - 3D	ME 80 - 520
500 R	MT 500 - TD		2A 100 - M..	2A 100 - 2M..					ME 100 - 3D	ME 100 - 520
600 R ÷ 630 R	MT 630 - TD		2A 120 - M..	2A 120 - 2M..					ME 120 - 3D	ME 120 - 520

= Hexagonal crimp = Oval crimp = circular crimp

** When using die set type MC70-50, the conductors marked with a star must be annealed.*

DIE SELECTOR CHART FOR DEEP STEPPED INDENTING WITH CONTAINING DIES

ALUMINIUM CABLES

APPLICATIONS	CONDUCTOR	CONNECTORS			HYDRAULIC TOOLS			
					HT 131-UC RHU 131-C B 131-UC			
	Conductor Size sqmm	LUGS			DIE HOLDER	DIE		INDENTOR
CAA..-M..	10	CAA 10 - M..			AU 130-150	MV 35	MUA 35	PS 130-35/E
	16	CAA 16 - M..	MTA 16 - C					
	25	CAA 25 - M..	MTA 25 - C					
	35	CAA 35 - M..	MTA 35 - C					
	50	CAA 50 - M..	MTA 50 - C			MV 95	MUA 95	PS 130-95/E
	70	CAA 70 - M..	MTA 70 - C..					
MTA..-C	95	CAA 95 - M..	MTA 95 - C..					
	120	CAA 120 - M..	MTA 120 - C..			MV 150	MUA 150	PS 130-150/E
	150	CAA 150 - M..	MTA 150 - C..					
	185	CAA 185 - M..	MTA 185 - C..		AU 130-240	MV 240	MUA 240	PS 130-240/E
	240	CAA 240 - M..	MTA 240 - C..					
	300	CAA 300 - 34 - M..				MUA 300-34		
	Conductor Size sqmm	LUGS			DIE HOLDER	DIE		INDENTOR
	16	AA 16 - M..			AU 130-150	MUA 35		PS 130-35/E
	25	AA 25 - M..						
	35	AA 35 - M..						
	50	AA 50 - M..				MUA 95		PS 130-95/E
	70	AA 70 - M..						
AA..-M..	95	AA 95 - M..						
	120	AA 120 - M..				MUA 150		PS 130-150/E
	150	AA 150 - M..						
	185	AA 185 - M..			AU 130-240	MUA 240		PS 130-240/E
	240	AA 240 - M..						
	300	AA 300 - 34 - M..				MUA 300-34		

Indent crimp

DIE SELECTOR CHART FOR DEEP STEPPED INDENTING WITH CONTAINING DIES


MTMA...-GC

Conductor Size sqmm	SPLICES		Conductor Size sqmm Al	Conductor Size sqmm Al/Cu	SPLICES	HYDRAULIC TOOLS HT 131-UC RHU 131-C B 131-UC		
						DIE HOLDER	DIE	INDENTOR
10	MTMA 10-GC					AU 130-150	MVM 35 / MUA 35	PS 130-35/E
16	MTMA 16-GC	MTMA 16/1	16	10	MTMA 16-10 GC			
25	MTMA 25-GC	MTMA 25/1	25	10	MTMA 25-10 GC			
			25	16	MTMA 25-16 GC			
35	MTMA 35-GC	MTMA 35/1						
50	MTMA 50-GC	MTMA 50/1	50	25	MTMA 50-25 GC		MVM 95 / MUA 95	PS 130-95/E
			50	35	MTMA 50-35 GC			
70	MTMA 70-GC	MTMA 70/1	70	35	MTMA 70-35 GC			
			70	50	MTMA 70-50 GC			
95	MTMA 95-GC	MTMA 95/1	95	50	MTMA 95-50 GC			
			95	70	MTMA 95-70 GC			
120	MTMA 120-GC	MTMA 120/1	120	70	MTMA 120-70 GC		MVM 150 / MUA 150	PS 130-150/E
			120	95	MTMA 120-95 GC			
150	MTMA 150-GC	MTMA 150/1	150	70	MTMA 150-70 GC			
			150	95	MTMA 150-95 GC			
			150	120	MTMA 150-120 GC			
185	MTMA 185-GC	MTMA 185/1	185	120	MTMA 185-120 GC	AU 130-240	MVM 240 / MUA 240	PS 130-240/E
			185	150	MTMA 185-150 GC			
240	MTMA 240-GC	MTMA 240/1	240	150	MTMA 240-150 GC			
			240	185	MTMA 240-185 GC			
300	MTMAD 300-GC	MTMAD 300/1	300	185	MTMAD 300-185 GC		MUA 300-34	
			300	240	MTMAD 300-240 GC			

PRE-ROUNDERS SELECTION

ALUMINIUM CONDUCTOR SIZE sqmm	PRE-ROUNDER	DIE-SUPPORT
25	UP 130-25	AC 130-P
35	UP 130-35	
50	UP 130-50	
70	UP 130-70	
95	UP 130-95	
120	UP 130-120	
150	UP 130-150	
185	UP 130-185	
240	UP 130-240	

DIES DESCRIPTION

1) AU 130-.. DIE-HOLDER
Used to house dies and pre-rounders.

2) UP 130-.. PRE-ROUNDERS
Used to round aluminium sectoral conductors in order to introduce them into circular connectors.
Each pre-rounder is made of two parts: the upper part is housed in die-holder **AU 130-..** and the lower part is locked onto **AC 130-P..** die support.

3) AC 130-P.. DIE SUPPORT
Houses lower part of pre-rounder **UP 130-..**

4) MUA... DIES
Containing dies.

5) PS 130-../E INDENTORS
Such indentors are specifically engineered for deep indentation of aluminium conductors of any stranding configuration.

DIES SEQUENCE

CONDUCTOR ROUNDING	CRIMPING
1	1
2	4
3	5

Indent crimp


REGISTRO ITALIANO NAVALE
1861
UL
Lloyd's Register
TA
TYPE APPROVED
VDE
GS
geprüfte Sicherheit

APPENDIX

REFERENCE/CODE CROSS-REFERENCE CHART

Ref.	Code
1052007	3005900
1052007N	3005901
1052009	3005903
1052009N	3005904
1052011	3005906
1052011N	3005907
1052013	3005909
1052013N	3005910
1052016	3005912
1052016N	3005913
1052021	3005915
1052021N	3005916
1052029	3005918
1052029N	3005919
1052036	3005921
1052036N	3005922
1052042	3005924
1052042N	3005925
1052048	3005927
1052048N	3005928
1053M12	3005958
1053M12N	3005959
1053M16	3005961
1053M16N	3005962
1053M20	3005964
1053M20N	3005965
1053M25	3005967
1053M25N	3005968
1053M32	3005970
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1053M40	3005973
1053M40N	3005974
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1053M63	3005979
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1112N	3005716
1116	3005720
1116N	3005721
1120	3005725
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1125	3005730
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1141012N	3005121
1141112	3005155
1141112N	3005156
1141200	3005170
1141200N	3005171
1142007	3005010
1142007G	3005012
1142007N	3005011
1142009	3005015
1142009G	3005017
1142009N	3005016
1142011	3005020
1142011G	3005022
1142011N	3005021
1142013	3005025
1142013G	3005027
1142013N	3005026
1142016	3005030
1142016G	3005032
1142016N	3005031
1142021	3005035
1142021G	3005037
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1142029	3005040
1142029G	3005042
1142029N	3005041
1142036	3005045
1142036G	3005047

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1142042	3005050
1142042G	3005052
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1142048	3005055
1142048G	3005057
1142048N	3005056
1143M12	3005215
1143M12G	3005217
1143M12N	3005216
1143M16	3005220
1143M16G	3005222
1143M16N	3005221
1143M20	3005225
1143M20G	3005227
1143M20N	3005226
1143M25	3005230
1143M25G	3005232
1143M25N	3005231
1143M32	3005235
1143M32G	3005237
1143M32N	3005236
1143M40	3005240
1143M40G	3005242
1143M40N	3005241
1143M50	3005245
1143M50G	3005247
1143M50N	3005246
1143M63	3005250
1143M63G	3005252
1143M63N	3005251
1150	3005745
1150N	3005746
1163	3005750
1163N	3005751
1253M12	3006750
1253M12N	3006751
1253M16	3006755
1253M16N	3006756
1253M20	3006760
1253M20N	3006761
1253M25	3006765
1253M25N	3006766
1253M32	3006770
1253M32N	3006771
1253M40	3006775
1253M40N	3006776
1253M50	3006780
1253M50N	3006781
1253M63	3006785
1253M63N	3006786
1400	3003110
1401	3003114
1401B	3003116
1401BN	3003117
1401C	3003118
1401CN	3003119
1401N	3003115
1402	3003120
1402N	3003121
1403	3003125
1404	3003130
1405	3003135
1407	3003155
1408	3003170
1410	3005610
1410N	3005611
1411	3005615
1411N	3005616
1412	3005620
1412N	3005621
1413	3005625
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1414	3005630
1414N	3005631
1415	3005635
1415N	3005636

Ref.	Code
1500.07	3002010
1500.07N	3002011
1500.09	3002015
1500.09N	3002016
1500.11	3002020
1500.11N	3002021
1500.12	3002120
1500.12N	3002121
1500.13	3002025
1500.13N	3002026
1500.14	3002110
1500.14N	3002111
1500.16	3002030
1500.16N	3002031
1500.21	3002035
1500.21N	3002036
1500.34	3002130
1500.34N	3002131
1500.38	3002115
1500.38N	3002116
1500.M12	3002205
1500.M12N	3002206
1500.M16	3002210
1500.M16N	3002211
1500.M20	3002215
1500.M20N	3002216
1500.M25	3002220
1500.M25N	3002221
1500.M32	3002225
1500.M32N	3002226
1540.M25	3002269
1540.M25N	3002270
1700	3003015
1700.2	3004015
1700.2N	3004016
1700N	3003016
1700P	3006015
1700T	3003515
1700TN	3003516
1701	3003020
1701.2	3004020
1701.2N	3004021
1701N	3003021
1701P	3006020
1701PN	3006021
1701T	3003517
1701TN	3003518
1702	3003025
1702.2	3004025
1702.2N	3004026
1702.5	3004425
1702.5N	3004426
1702CONC	3003523
1702CONCN	3003524
1702N	3003026
1702P	3006025
1702PN	3006026
1702T	3003519
1702TN	3003520
1703	3003030
1703.2	3004030
1703.5	3004430
1703P	3006030
1703T	3003521
1704	3003035
1704.2	3004035
1704P	3006035
1705	3003040
1705.2	3004040
1706	3003045
1707	3003050
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1709	3003010
1710	3005515
1710N	3005516
1711	3005520
1711N	3005521

Ref.	Code
1712	3005525
1712N	3005526
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1713N	3005531
1714	3005535
1714E34	3005572
1714N	3005536
1715	3005540
1715N	3005541
1719	3005510
1719E17	3005581
1719E17N	3005580
1719N	3005511
1730M20	3003225
1730M20N	3003226
1740	3027015
1741	3027020
1741N	3027021
1742	3027025
1743	3027030
1744	3027035
1745	3027037
1746	3027040
1747	3027045
180709	3017610
180911	3017620
180913	3017625
181113	3017630
181116	3017640
181316	3017650
181321	3017655
181621	3017660
182129	3017670
182936	3017680
1830	3004110
1830N	3004111
1831	3004115
1831N	3004116
1832	3004120
1832N	3004121
1835G	3004222
1836	3004225
183642	3017690
1836N	3004226
1840	3006610
1840N	3006611
1841	3006615
1841N	3006616
1842	3006620
184248	3017700
1842N	3006621
1843	3006625
1843N	3006626
1844	3006630
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1847	3006645
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1848	3006650
1848N	3006651
1849	3006655
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1861	3004515
1861N	3004516
1862	3004520
1862N	3004521
1866	3004615
1866N	3004616
1880	3016215
1881	3016220
1882	3016225
1883	3016230
1884	3016235

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1885	3016240
1886	3016245
1887	3016250
1888	3016255
1889	3016405
1890	3016410
1890A	3016420
1891	3016430
1891A	3016431
1892	3016440
1892A	3016450
1892B	3016451
1893	3016460
1893A	3016461
1894	3016480
1895	3016490
1896	3016500
1897	3016510
1898	3016520
1899	3016530
1899A	3016535
1899B	3016540
1900.07	3001010
1900.07G	3001012
1900.07N	3001011
1900.09	3001015
1900.09G	3001017
1900.09N	3001016
1900.11	3001020
1900.11G	3001022
1900.11N	3001021
1900.12	3001120
1900.12N	3001121
1900.13	3001025
1900.13G	3001027
1900.13N	3001026
1900.14	3001110
1900.14N	3001111
1900.16	3001030
1900.16G	3001032
1900.16N	3001031
1900.21	3001035
1900.21G	3001037
1900.21N	3001036
1900.29	3001040
1900.29G	3001042
1900.29N	3001041
1900.34	3001130
1900.34N	3001131
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1900.36N	3001046
1900.38	3001115
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1900.48G	3001057
1900.48N	3001056
1900.M12	3001215
1900.M12G	3001217
1900.M12N	3001216
1900.M16	3001220
1900.M16G	3001222
1900.M16N	3001221
1900.M20	3001225
1900.M20G	3001227
1900.M20N	3001226
1900.M25	3001230
1900.M25G	3001232
1900.M25N	3001231
1900.M32	3001235
1900.M32G	3001237
1900.M32N	3001236
1900.M40	3001240
1900.M40G	3001242

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ANE2-U4	2408860
ANE2-U5	2408865
ANE20-M10	2451320
ANE20-M12	2451330
ANE20-M14	2451340
ANE20-M16	2451350
ANE20-M8	2451310
ANE24-M10	2453530
ANE24-M12	2453550
ANE24-M14	2453570
ANE24-M16	2453590
ANE29-M10	2456010
ANE29-M12	2456030
ANE29-M14	2456050
ANE29-M16	2456070
ANE29-M20	2456090
ANE3-M10	2415840
ANE3-M12	2415850
ANE3-M4	2415800
ANE3-M5	2415810
ANE3-M6	2415820
ANE3-M8	2415830
ANE3-P14	2415860
ANE3-U4	2415870

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ANE30-M16	2458370
ANE30-M20	2458390
ANE35-M12	2460010
ANE35-M14	2460030
ANE35-M16	2460050
ANE35-M20	2460070
ANE5-M10	2418540
ANE5-M12	2418550
ANE5-M4	2418500
ANE5-M5	2418510
ANE5-M6	2418520
ANE5-M8	2418530
ANE5-P16	2418560
ANE7-M6	2422300
ANE7-M8	2422310
ANE7-M10	2422320
ANE7-M12	2422330
ANE7-P20	2422360
ANE9-M10	2430170
ANE9-M12	2430180
ANE9-M6/15	2430150
ANE9-M8	2430160
AU130-150	2615560
AU130-240	2615590
AU230-130D	2636960
AU520-130C	2648230
B-FC48	2598873
B-TC026	2598760
B-TC04	2599410
B-TC051	2598820
B-TC051Y	2598823
B-TC055	2598830
B-TC065	2598835
B-TC095	2598845
B15	2599830
B131-C	2599010
B131-UC	2599110
B131L-C	2599019
B135-C	2599250
B135-C-KV	2599256
B135L-C	2599251
B135-UC	2599270
B51	2598525
B51-KV	2598527
B51L	2598526
B51L-KV	2598528
B55	2598990
B55-KV	2598984
B70M-P24	2596120
BA-3	2598424
BF-BF5	2053630
BF-BM5	2053660
BF-F405	2053560
BF-F405P	2053565
BF-F408	2053570
BF-F408P	2053575
BF-F608	2053610
BF-F608P	2053620
BF-FM608	2053690
BF-M10	2052390
BF-M12	2052430
BF-M2	2052010
BF-M3	2052030
BF-M3,5	2052070
BF-M3,5/1	2052110
BF-M4	2052150
BF-M5	2052190
BF-M6	2052230
BF-M6/1	2052270
BF-M6/2	2052280
BF-M608	2053650
BF-M608P	2053655
BF-M7	2052310
BF-M8	2052350

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BF-P12	2053290
BF-P8	2053210
BF-PP12	2053330
BF-PP12/25	2053370
BF-PP12/29	2053380
BF-PP16/25	2053410
BF-PPL30	2053460
BF-PPL46	2053465
BF-U10	2052910
BF-U12	2052950
BF-U3	2052630
BF-U3,5	2052670
BF-U3,5/1	2052671
BF-U4	2052710
BF-U4/1	2052720
BF-U4/2	2052730
BF-U5	2052750
BF-U6	2052790
BF-U6/1	2052830
BF-U8	2052870
BKF-F608	2053612
BK-M10	2142390
BK-M12	2142430
BK-M3	2142030
BK-M3,5	2142070
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BK-M4	2142150
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BK-PPL30	2143460
BK-PPL46	2143465
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BK-U12	2142950
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BK-U6	2142790
BK-U6/1	2142830
BK-U8	2142870
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BN-FAB608	3031660
BN-FAR608	3031680
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BN-M3	2152030
BN-M3,5	2152070
BN-M3,5/1	2152110
BN-M4	2152150
BN-M5	2152190
BN-M6	2152230
BN-M6/1	2152270
BN-M7	2152310
BN-M8	2152350
BN-MA608	3031740
BN-P10	2153190
BN-P12	2153230
BN-P8	2153150
BN-PP12	2153270
BN-PP12/25	2153310
BN-PP16/25	2153350
BN-U10	2152910
BN-U12	2152950
BN-U3	2152630
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BN-U4	2152710
BN-U4/1	2152730

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BN-U6/1	2152830
BN-U8	2152870
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BP-M12	2046350
BP-M2	2046305
BP-M3	2046310
BP-M3,5	2046315
BP-M3,5/1	2046316
BP-M4	2046320
BP-M5	2046325
BP-M6	2046330
BP-M6/1	2046331
BP-M6/2	2046332
BP-M7	2046335
BP-M8	2046340
BP-P10	2046415
BP-P12	2046420
BP-P8	2046410
BP-PP12	2046440
BP-PP12/25	2046445
BP-PP12/29	2046450
BP-PP16/25	2046455
BP-PPL30	2046470
BP-PPL46	2046475
BP-U10	2046565
BP-U12	2046570
BP-U3	2046510
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BP-U3,5/1	2046516
BP-U4	2046530
BP-U4/1	2046531
BP-U4/2	2046540
BP-U5	2046545
BP-U6	2046555
BP-U6/1	2046556
BP-U8	2046560
BPS230.14	2598500
C10-C10	2490070
C120-C120	2490630
C150-C120	2490670
C150-C150	2490690
C16-C16	2490110
C185-C185	2490745
C185-C95	2490710
C240-C120	2490760
C25-C10	2490150
C25-C25	2490190
C35-C16	2490230
C35-C35	2490270
C50-C25	2490350
C50-C50	2490390
C6-C6	2490030
C70-C25N	2490310
C70-C35	2490430
C70-C70	2490470
C95-C35	2490510
C95-C70	2490550
C95-C95	2490590
C10-C10ST	2492070
C120-C120ST	2492630
C150-C120ST	2492670
C150-C150ST	2492690
C16-C16ST	2492110
C185-C185ST	2492745
C185-C95ST	2492710
C240-C120ST	2492760
C25-C10ST	2492150
C25-C25ST	2492190
C35-C16ST	2492230
C35-C35ST	2492270
C50-C25ST	2492350
C50-C50ST	2492390
C6-C6ST	2492030
C70-C25NST	2492310

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C95-C35ST	2492510
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C95-C95ST	2492590
CA1202M12	8005766
CA1502M12	8005776
CA1852M12	8005786
CA252M10	2530170
CA3002M12	8005806
CA352M12	8005726
CA502M12	8005736
CA952M12	8005756
CA120M12	8005566
CA120M16	8005570
CA150M12	8005576
CA150M16	8005580
CA150R-2M14	2533010
CA150R-M12	2532810
CA150R-M14	2532850
CA150S-2M14	2533330
CA150S-M12	2533210
CA150S-M14	2533250
CA185M12	8005586
CA185M16	8005590
CA240M12	8005594
CA240M16	8005596
CA240M20	8005600
CA200R-2M14	2533570
CA200R-M14	2533530
CA240R-2M14	2533850
CA240R-M14	2533770
CA300M12	8005604
CA300M16	8005608
CA300M20	8005610
CA25-2M12	2530210
CA25-2M8	2530130
CA25-M10	2530050
CA25-M12	2530090
CA25-M8	2530010
CA35M10	8005524
CA35M12	8005526
CA35M16	8005530
CA315R-2M14	2534430
CA315R-M14	2534330
CA315S-2M14	2534610
CA315S-M14	2534530
CA40S-2M12	2530510
CA40S-M12	2530450
CA40S-M16	2530490
CA50RM12	2530790
CA50SM12	2531110
CA50SM16	2531150
CA50R-2M12	2530870
CA50R-M12	2530790
CA50S-2M12	2531190
CA50S-M12	2531110
CA50S-M16	2531150
CA70-M12	2531870
CA70SM10	2531420
CA70SM12	2531430
CA70SM14	2531450
CA70S-2M12	2531510
CA70S-M12	2531430
CA70S-M16	2531470
CA95R-2M14	2532230
CA95R-M12	2532150
CA95R-M14	2532190
CA95M10	8005554
CA95M12	8005556
CA95M16	8005560
CA95S-2M14	2532610
CA95S-M12	2532450
CA95S-M14	2532490
CA95S-M16	2532500
Canvas Bag 001	2593300
Canvas Bag 007	2593295

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Canvas Bag 011	2593299
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CAA120-M12	2760310
CAA150-M12	2760350
CAA16-M12	2760012
CAA185-M12	2760430
CAA240-M12	2760590
CAA25-M12	2760030
CAA300-34-M12	2760680
CAA35-M12	2760070
CAA35ADN	2762260
CAA50-M12	2760110
CAA70-M12	2760150
CAA95-M12	2760190
CB1430H	2598502
CB9620H	2598503
CBA96-144	2598508
CBP-F405	2076535
CBP-F408	2076540
CBP-F608	2076545
CBP-F608P	2076550
CBP-M3	2076310
CBP-M3,5	2076315
CBP-M3,5/1	2076320
CBP-M4	2076325
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CBP-M6	2076340
CBP-M6/1	2076345
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CBP-M8	2076355
CBP-P10	2076455
CBP-P12	2076460
CBP-P8	2076450
CBP-PP12	2076480
CBP-PP12/25	2076490
CBP-U3	2076380
CBP-U3,5	2076385
CBP-U4	2076395
CBP-U4/1	2076400
CBP-U4/2	2076405
CBP-U4/3L	2076408
CBP-U5	2076410
CBP-U6	2076415
CC8.9	3041630
CC9.12	3041632
CFA2600	3031942
CFA300	3031900
CFA400	3031914
CFA600	3031928
CFAB600	3031970
CFAR600	3031956
CFC230	2598505
CFC12-24IC	2598507
CGP-F608	2076845
CGP-F608P	2076850
CGP-M3	2076610
CGP-M3,5	2076615
CGP-M4	2076625
CGP-M5	2076635
CGP-M6	2076640
CGP-M6/1	2076645
CGP-M608	2076860
CGP-M7	2076650
CGP-M8	2076660
CGP-M8/1	2076665
CGP-P10	2076755
CGP-P12	2076760
CGP-P14	2076765
CGP-PP12	2076780
CGP-PP17	2076790
CGP-U3,5	2076685
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CGP-U5	2076710
CGP-U6	2076715
CMA600	3031984

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CP1096-W-1000-KV	2597695
CP1120-W-1000-KV	2597958
CP1131	2610120
CPE-1	2592751
CPE-1-110	2592752
CPE-O-P12N	2592735
CPKD108	2808582
CPKD1508	2808587
CPKD2508	2808592
CPKD508	2808573
CPKD7508	2808578
CPP-O	2592671
CPU1131-C	2610150
CPU1230-3D	2630200
CRP-F305	2076225
CRP-F308	2076230
CRP-F405	2076235
CRP-F408	2076240
CRP-F608	2076245
CRP-F608P	2076250
CRP-M3	2076010
CRP-M3,5	2076015
CRP-M3,5/1	2076020
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CRP-M4/3	2076030
CRP-M5	2076035
CRP-M6	2076040
CRP-M6/1	2076045
CRP-M608	2076260
CRP-M7	2076050
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CRP-P10	2076155
CRP-P12	2076160
CRP-P8	2076150
CRP-PP12	2076180
CRP-PP12/1	2076185
CRP-PP12/23	2076190
CRP-PP14	2076195
CRP-U3	2076080
CRP-U3,5	2076085
CRP-U3,5/2	2076090
CRP-U4	2076095
CRP-U4/1	2076100
CRP-U4/2	2076105
CRP-U5	2076110
CRP-U6	2076115
CRP-U6/1	2076120
CRP-U8	2076125
CS-CPE-1	2592748
ECW-H3D	2630073
ELB-3	2598422
ESC300CEE	2596110
ESC600	2599001
F1-15	2599865
FD11	3017354
FD13,5	3017356
FD16	3017358
FD21	3017360
FD29	3017362
FD36	3017364
FD42	3017366
FD48	3017368
FD7	3017350
FD9	3017352
FDM12	3017375
FDM20	3017377
FDM25	3017379
FDM32	3017381
FDM40	3017383
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FL10-200	2510150
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FL16-250	2510590
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FL16-350	2510690
FL16-420	2510710
FL16-570	2510750
FL16-660	2510790
FL25-150	2510950
FL25-200	2511070
FL25-250	2511110
FL25-300	2511190
G80x2.4	3041700
G80x2.4N	3041701
G80x2.4/M	3041702
G80x2.4N/M	3041703
G90x2.4	3041705
G90x2.4 V0	3041709
G100x2.5	3041710
G100x2.5N	3041711
G100x2.5/M	3041712
G100x2.5/M V0	3041714
G100x2.5N/M	3041713
G120x2.5	3041715
G140x2.5	3041720
G140x2.5N	3041721
G140x2.5/M	3041722
G140x2.5/M V0	3041724
G140x2.5N/M	3041723
G160x2.5	3041725
G160x2.5N	3041726
G160x2.5/M	3041727
G160x2.5N/M	3041728
G200x2.5	3041730
G200x2.5N	3041731
G200x2.5/M	3041732
G200x2.5/M V0	3041734
G200x2.5N/M	3041733
G250x2.8	3041735
G300x2.8	3041740
G120x3.6	3041745
G140x3.6	3041750
G140x3.6N	3041751
G140x3.6/M	3041753
G140x3.6N/M	3041752
G150x3.6	3041755
G150X3.6 V0	3041759
G180x3.6	3041760
G200x3.6	3041765
G200x3.6N	3041766
G200x3.6/M	3041767
G200x3.6N/M	3041768
G250x3.6	3041770
G250x3.6N	3041771
G300x3.6	3041775
G300x3.6N	3041776
G300x3.6/M	3041777
G300x3.6N/M	3041778
G370x3.6	3041780
G370x3.6N	3041781
G120x4.8	3041785
G120x4.8N	3041786
G160x4.8	3041790
G160x4.8N	3041791
G190x4.8	3041795
G190x4.8N	3041796
G190x4.8/M	3041797
G190x4.8N/M	3041798
G200x4.8	3041800
G200x4.8N	3041801
G200x4.8/M	3041802
G200x4.8/M V0	3041804
G200x4.8N/M	3041803
G250x4.8	3041805
G250x4.8N	3041806
G250x4.8/M	3041807
G250x4.8N/M	3041808
G280x4.8	3041810

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G370x4.8	3041820
G370x4.8 V0	3041824
G370x4.8N	3041821
G390x4.8	3041825
G390x4.8N	3041826
G430x4.8	3041830
G430x4.8 V0	3041834
G430x4.8N	3041831
G450x4.8	3041835
G450x4.8N	3041836
G530x4.8	3041840
G530x4.8N	3041841
G150x7.6	3041845
G150x7.6N	3041846
G200x7.6	3041850
G200x7.6N	3041851
G250x7.6	3041855
G250x7.6N	3041856
G300x7.6	3041860
G300x7.6N	3041861
G370x7.6	3041865
G370x7.6N	3041866
G430x7.6	3041870
G430x7.6N	3041871
G530x7.6	3041875
G530x7.6N	3041876
G430x9.0	3041880
G530x9.0	3041885
G710x9.0	3041890
G710x9.0 V0	3041894
G780x9.0	3041895
G830x9.0	3041900
G920x9.0	3041905
G1020x9.0	3041910
G1220x9.0	3041915
G230x12.6	3041920
G380x12.6	3041925
G480x12.6	3041930
G580x12.6	3041935
G730x12.6	3041940
G880x12.6	3041945
G1030x12.6	3041950
GA-3	2598429
GF-F608	2055630
GF-F608P	2055650
GF-M10	2054250
GF-M10/1	2054290
GF-M12	2054330
GF-M14	2054370
GF-M16	2054410
GF-M3	2054010
GF-M3,5	2054030
GF-M4	2054070
GF-M5	2054110
GF-M6	2054150
GF-M6/1	2054160
GF-M608	2055670
GF-M7	2054170
GF-M8	2054210
GF-M8/1	2054220
GF-P10	2055310
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GF-P14	2055370
GF-PP12	2055390
GF-PP17	2055430
GF-PPL46	2055465
GF-U10	2054810
GF-U10/1	2054850
GF-U12	2054890
GF-U14	2054930
GF-U16	2054970
GF-U3,5	2054610
GF-U4	2054650
GF-U5	2054690
GF-U6	2054730

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GK-M14	2144390
GK-M16	2144430
GK-M3	2144010
GK-M3,5	2144030
GK-M4	2144070
GK-M5	2144110
GK-M6	2144150
GK-M7	2144190
GK-M8	2144230
GK-M8/1	2144240
GK-P14	2145250
GK-PP17	2145310
GK-PPL46	2145465
GK-U10	2144830
GK-U12	2144870
GK-U14	2144910
GK-U16	2144950
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GK-U4	2144670
GK-U5	2144710
GK-U6	2144750
GK-U8	2144790
GN-M10	2154250
GN-M10/1	2154290
GN-M12	2154330
GN-M14	2154370
GN-M16	2154410
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GN-M3,5	2154030
GN-M4	2154070
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GN-M6	2154150
GN-M6/1	2154160
GN-M7	2154170
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GN-U6	2154770
GN-U8	2154810
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GP-M10/1	2046646
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GP-M5	2046625
GP-M6	2046630
GP-M6/1	2046631
GP-M7	2046635
GP-M8	2046640
GP-M8/1	2046641
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GP-PP12	2046740
GP-PP17	2046750
GP-PPL46	2046755
GP-U10	2046865

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GP-U14	2046875
GP-U16	2046880
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GP-U4	2046830
GP-U5	2046845
GP-U6	2046855
GP-U8	2046860
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GX370x7.9	3042260
GX680x7.9	3042265
GX1020x7.9	3042270
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HB29-U	8060030
HB40-U	8060035
HB5	2591318
HB7	2591310
HB8	2591284
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HNKE16	2590329
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HNN4	2590292
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HP1-1	2590502
HP3	2590531
HP3-1	2590532
HP4-B	2590032
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HP4-R	2590031
HPH-1	2590029
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HT-TC026Y	2591408
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HT-TC051	2591472
HT-TC051Y	2591475
HT-TC055	2591445
HT-TC065	2591477
HT-TC0851	2591496
HT120	2610420
HT120-KV	2610430
HT131-C	2610416
HT131-UC	2610436
HT131L-C	2610418
HT45-E	2650040
HT51	2670610
HT51-KV	2670611
HT81-U	2600036
HX1	2590298
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I38-M	2593858
I38-MS	2593862
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KE106ST	2802310
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KE2,5-1	2598459
KE2,5A-3	2598432
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KE7508ST	2802150
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KT5	2591279
KTS1632	2590700
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L03-P	2485010
L06-M	2480050
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L100-M	2480930
L120-M	2481010
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L14-P	2485350
L160-M	2481050
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L200-M	2481090
L24-M	2480570
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L2-P	2485100
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L3-M	2480170
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L48-M	2480810
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M118-50	2675860
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M118.158-U	2603725
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M140-50	2675870
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M158-50	2675880
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M75-50	2675805
M75-C	2611650
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M96-50	2675850
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MA100-520	2645690
MA12-C	2610870
MA12.20-U	2600310
MA120-3D	2631810
MA120-520	2645711
MA14-50	2675670
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MA160-520	2645731
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MA2.3-50	2675660
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MA20-C	2610910
MA200-520	2645750
MA24-50	2675676
MA24-C	2610920
MA24-U	2600330
MA29-C	2610930
MA29.80-U	2600360
MA3-C	2610820
MA3.5-U	2600210
MA30-80-U	2600380
MA30-C	2610940
MA35-C	2610950
MA35-U	2600390
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MA37-U	2600410
MA40-C	2610970
MA40-U	2600430
MA48-C	2610980
MA48-U	2600450
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MA5-50	2675662
MA5-C	2610830
MA60-C	2610990
MA7	2650170
MA7-50	2675664
MA7-C	2610840
MA7.14-U	2600250
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MA80-520	2645671
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MC240-3D	2632035
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MC35	2650570
MC35-50	2675630
MC35-C	2611120
MC35-U	2600690
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MC6-50	2675605
MC6.25-U	2600630
MC70-3D	2632010
MC70-50	2675640
MC70-80U	2600720
MC70-C	2611130
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MC95-80U	2600730
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ME10-50	2676060
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ME10.24-U	2604830
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ME100-520	2648552
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ME12.17-U	2604850
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ME120-520	2648554
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ME14-50	2676080
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ME160-520	2648556
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ME2/3-15	2599876
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ME29-50	2676130
ME29-C	2614225
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ME3-C	2614203
ME3.14-U	2604770
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ME30-C	2614227
ME30-U	2604890
ME35-50	2676150
ME35-C	2614229
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ME37-50	2676160
ME37-C	2614231
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ME40-50	2676165
ME40-C	2614233
ME40-U	2604950
ME48-50	2676170
ME48-C	2614235
ME48-U	2604970
ME5	2652070
ME5-50	2676030
ME5-C	2614205
ME5.7-U	2604790
ME60-C	2614237
ME7	2652090
ME7-50	2676040
ME7-C	2614207
ME80-3D	2634930
ME80-520	2648550
ME80-C	2614239
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MK5/8-15	2599890
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MMT50-50	2676382
MMT50-C	2611170
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MMT95-50	2676384
MMT95-C	2611180
MMT95-U	2601130
MN10-C	2610560
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MN10RF-C	2610768
MN12-C	2610570
MN12F-50	2676260
MN12F-C	2610770
MN14-C	2610580
MN14RF-50	2676270
MN14RF-C	2610772
MN17-C	2610591
MN17F-50	2676280
MN17F-C	2610774
MN19-C	2610600
MN19RF-C	2610776
MN2-C	2610511
MN20-C	2610610
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MN24-C	2610620
MN24RF-C	2610780
MN29-C	2610625
MN29F-C	2610782
MN2RF-50	2676210
MN2RF-C	2610760
MN3-C	2610520
MN30-C	2610630
MN30RF-C	2610784
MN35-C	2610635
MN35F-C	2610786
MN37-C	2610640
MN37RF-C	2610788
MN3RF-50	2676220
MN3RF-C	2610762
MN48-C	2610650
MN48RF-C	2610790
MN5-C	2610530
MN5RF-50	2676230
MN5RF-C	2610764
MN60-C	2610660
MN7-C	2610540
MN7RF-50	2676240
MN7RF-C	2610766
MN80-3D	2631450
MN9-C	2610551
MP608	3031810
MP608/45	3031815
MP608/90	3031820
MP608D	3031830
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MPC3	2595206
MPC4	2595208
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MS10/16-15	2599881
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MT120C16	8006258
MT150C10	8006252
MT150C12	8006264
MT150C1480	8006266
MT150C16	8006268
MT185C10	8006262
MT185C16	8006278
MT240C12	8006284
MT240C16	8006288
MT300C16	8006298
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MT35C1480	8006216
MT50C8	8006220
MT50C10	8006222
MT50C1480	8006226
MT70C10	8006232
MT95C10	8006242
MT95C12	8006244
MT95C1480	8006246
MT120GC	8006150
MT150GC	8006160
MT185GC	8006170
MT240GC	8006180
MT300GC	8006190
MT35GC	8006110
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MT120TD	8006050
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MT185TD	8006070
MT240TD	8006080
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MT70TD	8006030
MT95TD	8006040
MT150R-C12	2545010

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MT150S-C16	2545350
MT150S-GC	2541910
MT150S-TD	2540630
MT200R-C10	2545540
MT200R-C16	2545550
MT200R-GC	2542030
MT200R-TD	2540670
MT240R-C12	2545710
MT240R-C16	2545750
MT240R-GC	2542110
MT240R-TD	2540710
MT25-C8	2543030
MT25-GC	2541570
MT25-TD	2540150
MT315R-C16	2545950
MT315R-GC	2542150
MT315R-TD	2540750
MT315S-C16	2545990
MT315S-GC	2542290
MT315S-TD	2540790
MT400-TD	2540830
MT40S-C10	2543410
MT40S-C14-80	2546070
MT40S-C8	2543400
MT40S-GC	2541610
MT40S-TD	2540190
MT500-TD	2540870
MT50R-C10	2543650
MT50R-C8	2543610
MT50R-GC	2541690
MT50R-TD	2540270
MT50S-C10	2543850
MT50S-C14-80	2546110
MT50S-C8	2543810
MT50S-GC	2541650
MT50S-TD	2540230
MT630-TD	2540890
MT70S-C10	2544050
MT70S-GC	2541730
MT70S-TD	2540350
MT95R-C10	2544290
MT95R-C12	2544330
MT95R-GC	2541770
MT95R-TD	2540390
MT95S-C10	2544530
MT95S-C12	2544570
MT95S-C14-80	2546230
MT95S-GC	2541850
MT95S-TD	2540470
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MTA25-C	2770020
MTA35-C	2770030
MTA50-C	2770310
MTA70-C	2770550
MTA95-C	2770830
MTA120-C	2771510
MTA150-C	2771710
MTA185-C	2772150
MTA240-C	2773010
MTMA10-GC	2720025
MTMA120-70-GC	2721410
MTMA120-95-GC	2721450
MTMA120-GC	2720272
MTMA150-120-GC	2721630
MTMA150-70-GC	2721550
MTMA150-95-GC	2721590
MTMA150-GC	2720330
MTMA16-10-GC	2720560
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MTMA185-120-GC	2721900
MTMA185-150-GC	2721910
MTMA185-GC	2720360

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MTMA240-150-GC	2722050
MTMA240-185-GC	2722090
MTMAD300-185-GC	2722160
MTMAD300-240-GC	2722220
MTMA240-GC	2720410
MTMAD300-GC	2720440
MTMA25-10-GC	2720575
MTMA25-16-GC	2720580
MTMA25-GC	2720090
MTMA35-GC	2720130
MTMA50-25-GC	2720650
MTMA50-35-GC	2720660
MTMA50-GC	2720152
MTMA70-35-GC	2720940
MTMA70-50-GC	2720980
MTMA70-GC	2720195
MTMA95-50-GC	2721030
MTMA95-70-GC	2721070
MTMA95-GC	2720232
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MTMA25/1	2720071
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MTMA50/1	2720160
MTMA70/1	2720191
MTMA95/1	2720250
MTMA120/1	2720280
MTMA150/1	2720320
MTMA185/1	2720370
MTMA240/1	2720400
MTMAD300/1	2720460
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MV150	2616170
MV240	2616180
MV35	2616150
MV95	2616160
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MVM35	2616290
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NL2-M	2469390
NL3-M	2469430
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PA1	2650230
PA10	2650290
PA10-50	2675686
PA10-C	2611010
PA100-3D	2631930
PA120-3D	2631950
PA120-520	2645600
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PA24-50	2675696
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PA60-C	2611040
PB-1	2591046
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PN48-C	2610740
PN60-C	2610750
PN7-C	2610700
PN80-3D	2631460
PNB-1	2591040
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PNB-3N1	2591092
PNB-3N5	2591096
PNB-3NN3	2591094
PNB-3NN4	2591095
PNB-3P	2591090
PNB-3P1	2591084
PNB-3PD	2591091
PNB-4KE	2591251
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PR-1	2591045
PS130-150/E	2616371
PS130-240/E	2616381
PS130-35/E	2616351
PS130-95/E	2616361
PV-1	2591044
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Q38-MS	2593860
RA-3	2598428
RBG-15	2599850
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RD16,2S	2684124
RD17,5S	2684126
RD18,6S	2684128
RD19,1S	2684130
RD20,4S	2684132
RD20,6S	2684134
RD22,5S	2684136
RD23,8S	2684138
RD25,4S	2684140
RD27S	2684142
RD28,3S	2684144
RD28,6S	2684146
RD30,5S	2684148
RD31,8S	2684150
RD32,5S	2684152
RD34,6S	2684154
RD34,9S	2684156
RD37S	2684158
RD38,1S	2684160
RD40,5S	2684162
RD41,3S	2684164
RD43,2S	2684168
RD44,5S	2684170
RD47S	2684172
RF-BF4	2051630
RF-BM4	2051660
RF-F305	2051560
RF-F305P	2051565
RF-F308	2051580
RF-F308P	2051585
RF-F405	2051600
RF-F405P	2051605
RF-F408	2051590
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RF-F608	2051610
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RF-FM608	2051690
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RF-M12	2050430
RF-M2	2050010
RF-M3	2050030
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RF-M3,5/1	2050110
RF-M4	2050150
RF-M4/3	2050170

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RF-M608P	2051655
RF-M7	2050310
RF-M8	2050350
RF-P10	2051250
RF-P12	2051290
RF-P8	2051210
RF-PP12	2051330
RF-PP12/1	2051340
RF-PP12/19	2051370
RF-PP12/23	2051380
RF-PP14	2051410
RF-PP16/23	2051450
RF-PPL30	2051460
RF-PPL46	2051465
RF-U10	2050950
RF-U12	2050990
RF-U3	2050630
RF-U3,5	2050670
RF-U3,5/1	2050680
RF-U3,5/2	2050681
RF-U4	2050710
RF-U4/1	2050730
RF-U4/2	2050750
RF-U5	2050790
RF-U5/1	2050791
RF-U6	2050830
RF-U6/1	2050870
RF-U8	2050910
RH50	2670050
RHC131	2619010
RHC131L	2619018
RH-FC47	2592595
RHM132	2619410
RHM50	2670035
RHT160	2592422
RHT160-60N	2592584
RHTD1724	2682482
RHTD3241	2682502
RHTD3241T	2682517
RHU131-C	2619210
RHU520	2640151
RHU81	2600045
RKF-F608	2051612
RK-M10	2140390
RK-M12	2140430
RK-M3	2140030
RK-M3,5	2140070
RK-M3,5/1	2140110
RK-M4	2140150
RK-M5	2140190
RK-M6	2140230
RK-M6/1	2140270
RK-M7	2140310
RK-M8	2140350
RK-P10	2141190
RK-P12	2141230
RK-PP12	2141270
RK-PP12/19	2141310
RK-PPL30	2141460
RK-PPL46	2141465
RK-U10	2140910
RK-U12	2140950
RK-U3	2140630
RK-U3,5	2140670
RK-U4	2140710
RK-U5	2140750
RK-U6	2140790
RK-U6/1	2140830
RK-U8	2140870
RN-FA305	3031610
RN-FA405	3031615
RN-FA608	3031620
RN-M10	2150430

REFERENCE/CODE CROSS-REFERENCE CHART

Ref.	Code
RN-M12	2150470
RN-M2	2150010
RN-M3	2150030
RN-M3,5	2150070
RN-M3,5/1	2150110
RN-M4	2150150
RN-M4/3	2150170
RN-M5	2150190
RN-M6	2150230
RN-M6/1	2150270
RN-M7	2150350
RN-M8	2150390
RN-MA305	3031710
RN-MA405	3031715
RN-MA608	3031720
RN-P10	2151270
RN-P12	2151310
RN-P8	2151230
RN-PP12	2151350
RN-PP12/1	2151370
RN-PP12/19	2151390
RN-PP14	2151400
RN-PP16/23	2151410
RN-U10	2150990
RN-U12	2151030
RN-U3	2150670
RN-U3,5	2150710
RN-U3,5/2	2150720
RN-U4	2150750
RN-U4/1	2150760
RN-U4/2	2150790
RN-U5	2150830
RN-U5/1	2150840
RN-U6	2150870
RN-U6/1	2150910
RN-U8	2150950
RP-M10	2046045
RP-M12	2046050
RP-M2	2046005
RP-M3	2046010
RP-M3,5	2046015
RP-M3,5/1	2046016
RP-M4	2046020
RP-M4/3	2046023
RP-M5	2046025
RP-M6	2046030
RP-M6/1	2046031
RP-M7	2046035
RP-M8	2046040
RP-P10	2046115
RP-P12	2046120
RP-P8	2046110
RP-PP12	2046140
RP-PP12/1	2046145
RP-PP12/19	2046150
RP-PP12/23	2046155
RP-PP14	2046160
RP-PP16/23	2046165
RP-PPL30	2046180
RP-PPL46	2046185
RP-U10	2046265
RP-U12	2046270
RP-U3	2046210
RP-U3,5	2046215
RP-U3,5/2	2046217
RP-U4	2046230
RP-U4/1	2046231
RP-U4/2	2046240
RP-U5	2046245
RP-U5/1	2046246
RP-U6	2046255
RP-U6/1	2046256
RP-U8	2046260
RS0305.07	3008006
RS0407.M12	3008050
RS0507.09	3008008
RS0509.M16	3008052

Ref.	Code
RS0710.11	3008010
RS0813.M20	3008054
RS1014.16	3008012
RS1117.M25	3008056
RS1420.21	3008014
RS1520.M32	3008058
RS1928.M40	3008060
RS2026.29	3008016
RS2635.36	3008018
RS2735.M50	3008062
RT10,5	2592470
RT13	2592490
RT15	2592510
RT17	2592530
RT6,5	2592430
RT8,5	2592450
S10-M4	2165130
S10-M5	2165150
S10-M6	2165190
S10-M7	2165230
S1,5-M10	2160390
S1,5-M12	2160430
S1,5-M2	2160010
S1,5-M3	2160030
S1,5-M3,5	2160070
S1,5-M3,5/1	2160110
S1,5-M4	2160150
S1,5-M4/3	2160160
S1,5-M5	2160190
S1,5-M6	2160230
S1,5-M6/1	2160270
S1,5-M7	2160310
S1,5-M8	2160350
S1,5-P10	2161190
S1,5-P12	2161230
S1,5-P8	2161150
S1,5-PP12	2161310
S1,5-PP12/1	2161330
S1,5-PP12/19	2161350
S1,5-PP14	2161360
S1,5-U10	2160950
S1,5-U12	2160990
S1,5-U3	2160630
S1,5-U3,5	2160670
S1,5-U3,5/2	2160682
S1,5-U4	2160710
S1,5-U4/1	2160730
S1,5-U4/2	2160750
S1,5-U5	2160790
S1,5-U5/1	2160800
S1,5-U6	2160830
S1,5-U6/1	2160870
S1,5-U8	2160910
S2,5-M10	2162170
S2,5-M12	2162210
S2,5-M2	2161800
S2,5-M3	2161810
S2,5-M3,5	2161850
S2,5-M3,5/1	2161890
S2,5-M4	2161930
S2,5-M5	2161970
S2,5-M6	2162010
S2,5-M6/1	2162050
S2,5-M7	2162090
S2,5-M8	2162130
S2,5-P10	2163050
S2,5-P12	2163090
S2,5-P8	2163010
S2,5-PP12	2163170
S2,5-PP12/25	2163210
S2,5-PP16/25	2163250
S2,5-U10	2162730
S2,5-U12	2162770
S2,5-U3	2162410
S2,5-U3,5	2162450
S2,5-U3,5/1	2162460
S2,5-U4	2162490

Ref.	Code
S2,5-U4/1	2162510
S2,5-U4/2	2162530
S2,5-U5	2162570
S2,5-U6	2162610
S2,5-U6/1	2162650
S2,5-U8	2162690
S6-M10	2163830
S6-M10/1	2163850
S6-M12	2163890
S6-M14	2163930
S6-M16	2163970
S6-M3	2163510
S6-M3,5	2163550
S6-M4	2163590
S6-M5	2163630
S6-M6	2163670
S6-M6/1	2163710
S6-M7	2163750
S6-M8	2163790
S6-M8/1	2163800
S6-P10	2164710
S6-P12	2164750
S6-P14	2164790
S6-PP12	2164830
S6-PP17	2164870
S6-U10	2164370
S6-U10/1	2164390
S6-U12	2164430
S6-U14	2164470
S6-U16	2164510
S6-U3,5	2164170
S6-U4	2164210
S6-U5	2164250
S6-U6	2164290
S6-U8	2164330
SC1	2591261
SC3X	2591264
SH-B70	2596080
SS4,8-3,7	3041670
SS4,8-4,5	3041672
SS9-4,5	3041675
SS9-5	3041677
SS9-6,4	3041679
TC025	2591895
TC04	2591396
TC050	2597050
TC050Y	2597056
TC085	2597150
TC096	2597360
TC120	2597250
TCP10	3019220
TCP12	3019225
TCP15	3019230
TCP18	3019235
TCP20	3019240
TCP25	3019250
TCP30	3019260
TCP35	3019270
TCP40	3019280
TCP45	3019290
TCP5	3019210
TCP50	3019300
TCP55	3019305
TCP60	3019310
TCP65	3019315
TCP70	3019320
TF300-Q38F	2592862
TF300-Q38FM	2592863
TF600-Q38FM	2592981
TGM38	3016155
TGM48	3016157
TGM513	3016165
TGM58	3016159
TGM613	3016167
TGM713	3016169
TGM817	3016171
TN120S	2590270

Ref.	Code
TN70	2590230
TN71	2590231
TNN120	2590290
TNN70	2590240
TNN71	2590241
TRS-B70	2593280
UP130-120	2616520
UP130-150	2616530
UP130-185	2616550
UP130-240	2616560
UP130-50	2616470
UP130-70	2616490
UP130-95	2616500
VAL04	2593310
VAL096	2593669
VAL130	2610450
VAL130-U	2610451
VAL160	2593405
VAL22	2593370
VAL22-3	2593406
VAL22-C	2593402
VAL520	2593410
VAL75	2600110
VALB-TC04	2593705
VALB-TC095	2593703
VALCP096	2593671
VALECW-H3D	2593421
VALMAT520	2593411
VALP1	2590595
VALP3	2590610
VALP4	2590612
VALP5	2590614
VALP7	2590616
VALP8	2590618
VALP9	2590619
VALP9-C	2590609
VALP19	2590629
VAL P21	2874156
VAL P22	2874157
VALSTAR V3-F	2590577
VALTC085	2593323
VALTC120	2593322
VP-M2	2048010
VP-M3	2048030
VP-M3,5	2048070
VP-M4	2048150
VP-M5	2048190
VP-M6	2048210
VP-PP12/19	2049370
VP-U3	2048630
VP-U3,5	2048670
VP-U4	2048710
WL03-M	8440100
WL06-M	8440101
WL1-M	8440102
WT2-3D	2636970
Z10-1	2845030
Z16-1	2845040
Z16-12	2844156
Z16-12D	2844157
Z16-3	2844115
Z16-3D	2844116
Z16-4	2844130
Z16-4D	2844131
Z16-5N	2844122
Z16-5ND	2844123
Z16-8	2844140
Z16-8D	2844141
Z25-1	2845050
Z25-DP7-100	2845180
Z2,5-1	2845010
Z35-1	2845060
Z35-26D	2844216
Z35-3	2844205
Z35-3D	2844206
Z35-4	2844201
Z35-4D	2844202

Ref.	Code
Z35-6	2844210
Z35-6D	2844211
Z35-DP14-125	2845210
Z35-DP14B-125	2845212
Z35T-11	2844220
Z50-10D	2844230
Z50-DP12-160	2845220
Z6-1	2845020
Z6-10	2844106
Z6-10D	2844107
Z6-3	2844080
Z6-3D	2844081
Z6-5	2844100
Z6-5D	2844101
Z6-6	2844108
Z6-6D	2844109
ZKE2	2590710
ZKE610	2590718
ZKE6-F	2590716
ZP2	2590760
ZS-B16	2842185
ZS-B4	2842115
ZS-B6	2842155
ZS-T16	2842190
ZS-T4	2842120
ZS-T6	2842160
ZS-U16	2842180
ZS-U4	2842110
ZS-U6	2842150

COMPARISON OF AWG, MCM AND METRIC CONDUCTOR CROSS SECTIONS

AWG comparison to Metric		
AWG	Actual conductor csa mm²	Comparable metric csa mm²
27	0,10	
26	0,13	0,14
25	0,16	-
24	0,21	0,2
23	0,26	0,25
22	0,33	0,34
21	0,41	-
20	0,52	0,5
19	0,65	-
18	0,82	0,75
17	1,04	1
16	1,31	-
15	1,65	1,5
14	2,08	-
13	2,63	2,5
12	3,31	-
11	4,15	4
10	5,27	6
9	6,62	-
8	8,35	-
7	10,6	10
6	13,3	-
5	16,8	16
4	21,2	-
3	26,7	25
2	33,6	35
1	42,4	-
1/0	53,4	50
2/0	67,5	70
3/0	85,0	95
4/0	107,2	120

MCM comparison to Metric		
MCM	Actual conductor csa mm²	Comparable metric csa mm²
250	127	120
300	152	150
350	177	185
400	203	-
500	253	240
600	304	300
700	355	-
800	405	400
900	456	-
1000	507	500
1250	633	625
1500	760	800
1750	887	-
2000	1010	1000

MAXIMUM DIAMETERS OF CIRCULAR COPPER CONDUCTORS: SOLID, NON COMPACTED STRANDED AND FLEXIBLE

Cross sectional area [mm²]	Conductors in cables for fixed installations		Flexible conductors (Classes 5 and 6) Maximum diameter [mm]
	Solid (Class 1) Maximum diameter [mm]	Stranded (Class 2) Maximum diameter [mm]	
0,5	0,9	1,1	1,1
0,75	1,0	1,2	1,3
1	1,2	1,4	1,5
1,5	1,5	1,7	1,8
2,5	1,9	2,2	2,4
4	2,4	2,7	3,0
6	2,9	3,3	3,9
10	3,7	4,2	5,1
16	4,6	5,3	6,3
25 [a]	5,7	6,6	7,8
35 [a]	6,7	7,9	9,2
50 [a]	7,8	9,1	11,0
70 [a]	9,4	11,0	13,1
95 [a]	11,0	12,9	15,1
120 [a]	12,4	14,5	17,0
150 [a]	13,8	16,2	19,0
185	15,4	18,0	21,0
240	17,6	20,6	24,0
300	19,8	23,1	27,0
400	22,2	26,1	31,0
500	-	29,2	35,0
630	-	33,2	39,0
800	-	37,6	-
1000	-	42,2	-

NOTE The values given for flexible conductors represent both class 5 and class 6 conductors.

[a] Solid copper conductor shaving cross-sectional areas of 25 mm² and above are for particular types of cable, e.g. mineral insulated, and not for general purposes.

MINIMUM AND MAXIMUM DIAMETERS OF STRANDED COMPACTED CIRCULAR COPPER, ALUMINIUM AND ALUMINIUM ALLOY CONDUCTORS

Cross-sectional area [mm²]	Stranded compacted circular conductors (Class 2)	
	Minimum diameter [mm]	Maximum diameter [mm]
10	3,6	4,0
16	4,6	5,2
25	5,6	6,5
35	6,6	7,5
50	7,7	8,6
70	9,3	10,2
95	11,0	12,0
120	12,3	13,5
150	13,7	15,0
185	15,3	16,8
240	17,6	19,2
300	19,7	21,6
400	22,3	24,6
500	25,3	27,6
630	28,7	32,5

NOTES: - The dimensional limits of aluminium conductors with cross-sectional areas above 630 mm² are not given as the compaction technology is not generally estabilished.
- The values are given for compacted copper conductors in the size range 1,5 mm² to 6 mm².

MINIMUM AND MAXIMUM DIAMETERS OF CIRCULAR ALUMINIUM CONDUCTORS

Cross-sectional area [mm²]	Solid conductors (Class 1)	
	Minimum diameter [mm]	Maximum diameter [mm]
10	3,4	3,7
16	4,1	4,6
25	5,2	5,7
35	6,1	6,7
50	7,2	7,8
70	8,7	9,4
95	10,3	11,0
120	11,6	12,4
150	12,9	13,8
185	14,5	15,4
240	16,7	17,6
300	18,8	19,8
400	21,2	22,2
500	24,0	25,1
630	27,3	28,4
800	30,9	32,1
1000	34,8	36,0
1200	37,8	39,0

CLASS 1:

SOLID CONDUCTORS FOR SINGLE-CORE AND MULTI-CORE CABLES

Nominal cross-sectional [mm²]	Maximum resistance of conductor at 20 °C		
	Circular, annealed copper conductors		Aluminium and aluminium alloy conductors, circular or shaped [c] [ohm/km]
	Plain [ohm/km]	Metal [ohm/km]	
0,5	36	36,7	-
0,75	24,5	24,8	-
1	18,1	18,2	-
1,5	12,1	12,2	-
2,5	7,41	7,56	-
4	4,61	4,70	-
6	3,08	3,11	-
10	1,83	1,84	3,08 [a]
16	1,15	1,16	1,91 [a]
25	0,727 [b]	-	1,20 [a]
35	0,524 [b]	-	0,868 [a]
50	0,387 [b]	-	0,641
70	0,268 [b]	-	0,443
95	0,193 [b]	-	0,320 [d]
120	0,153 [b]	-	0,253 [d]
150	0,124 [b]	-	0,206 [d]
185	0,101 [b]	-	0,164 [d]
240	0,0775 [b]	-	0,125 [d]
300	0,0620 [b]	-	0,100 [d]
400	0,0465 [b]	-	0,0778
500	-	-	0,0605
630	-	-	0,0469
800	-	-	0,0367
1000	-	-	0,0291
1200	-	-	0,0247

[a] *Aluminium conductors 10 mm² to 35 mm² circular only*

[b] *Solid copper conductors having nominal cross-sectional area of 25 mm² and above are for particular types of cable, e.g. mineral insulated, and not for general purposes.*

[c] *For solid aluminium alloy conductors, having the same nominal cross-sectional area as an aluminium conductor, the resistance value given in the table should be multiplied by a factor of 1,162 unless otherwise agreed between the manufacturer and the purchaser.*

[d] *For single core cables, four sectoral shaped conductors may be assembled into a single circular conductor. The maximum resistance of the assembled conductor shall be 25% of that of the individual component conductors.*

CLASS 2:

STRANDED CONDUCTORS FOR SINGLE-CORE AND MULTI-CORE CABLES

Nominal cross-sectional area [mm²]	Minimum number of wires in the conductor						Maximum resistance of conductor at 20 °C		
	Circular		Circular compacted		Shaped		Annealed copper conductor		Aluminium or aluminium alloy conductor [c] [ohm/km]
	Cu	Al	Cu	Al	Cu	Al	Plain wires [ohm/km]	Metal-coated wires [ohm/km]	
0,5	7	-	-	-	-	-	36,0	36,7	-
0,75	7	-	-	-	-	-	24,5	24,8	-
1,0	7	-	-	-	-	-	18,1	18,2	-
1,5	7	-	6	-	-	-	12,1	12,2	-
2,5	7	-	6	-	-	-	7,41	7,56	-
4	7	-	6	-	-	-	4,61	4,70	-
6	7	-	6	-	-	-	3,08	3,11	-
10	7	7	6	6	-	-	1,83	1,84	3,08
16	7	7	6	6	-	-	1,15	1,16	1,91
25	7	7	6	6	6	6	0,727	0,734	1,20
35	7	7	6	6	6	6	0,524	0,529	0,868
50	19	19	6	6	6	6	0,387	0,391	0,641
70	19	19	12	12	12	12	0,268	0,270	0,443
95	19	19	15	15	15	15	0,193	0,195	0,320
120	37	37	18	15	18	15	0,153	0,154	0,253
150	37	37	18	15	18	15	0,124	0,126	0,206
185	37	37	30	30	30	30	0,0991	0,100	0,164
240	61	61	34	30	34	30	0,0754	0,0762	0,125
300	61	61	34	30	34	30	0,0601	0,0607	0,100
400	61	61	53	53	53	53	0,0470	0,0475	0,0778
500	61	61	53	53	53	53	0,0366	0,0369	0,0605
630	91	91	53	53	53	53	0,0283	0,0286	0,0469
800	91	91	53	53	-	-	0,0221	0,0224	0,0367
1000	91	91	53	53	-	-	0,0176	0,0177	0,0291
1200	[b]						0,0151	0,0151	0,0247
1400 [a]	[b]						0,0129	0,0129	0,0212
1600	[b]						0,0113	0,0113	0,0186
1800 [a]	[b]						0,0101	0,0101	0,0165
2000	[b]						0,0090	0,0090	0,0149
2500	[b]						0,0072	0,0072	0,0127

[a] *Non-preferred sizes. Other non-preferred sizes are recognized for some specialized applications but are not within the scope of this standard.*

[b] *The minimum number of wires for these sizes is not specified. These sizes may be constructed from 4, 5 or 6 equal segments (Milliken).*

[c] *For stranded aluminium alloy conductors having the same nominal cross-sectional area as an aluminium conductor the resistance value should be agreed between the manufacturer and the purchaser.*

CLASS 5:

FLEXIBLE COPPER CONDUCTORS FOR SINGLE-CORE AND MULTI-CORE CABLES

Nominal cross-sectional [mm²]	Maximum diameter of wires in conductor [mm]	Maximum resistance of conductor at 20 °C	
		Plain wires [ohm/km]	Metal-coated wires [ohm/km]
0,5	0,21	39,0	40,1
0,75	0,21	26,0	26,7
1,0	0,21	19,5	20,0
1,5	0,26	13,3	13,7
2,5	0,26	7,98	8,21
4	0,31	4,95	5,09
6	0,31	3,30	3,39
10	0,41	1,91	1,95
16	0,41	1,21	1,24
25	0,41	0,780	0,795
35	0,41	0,554	0,565
50	0,41	0,386	0,393
70	0,51	0,272	0,277
95	0,51	0,206	0,210
120	0,51	0,161	0,164
150	0,51	0,129	0,132
185	0,51	0,106	0,108
240	0,51	0,0801	0,0817
300	0,51	0,0641	0,0654
400	0,51	0,0486	0,0495
500	0,61	0,0384	0,0391
630	0,61	0,0287	0,0292

CLASS 6:

FLEXIBLE COPPER CONDUCTORS FOR SINGLE-CORE AND MULTI-CORE CABLES

Nominal cross-sectional [mm²]	Maximum diameter of wires in conductor [mm]	Maximum resistance of conductor at 20 °C	
		Plain wires [ohm/km]	Metal-coated wires [ohm/km]
0,5	0,16	39,0	40,1
0,75	0,16	26,0	26,7
1.0	0,16	19,5	20,0
1,5	0,16	13,3	13,7
2,5	0,16	7,98	8,21
4	0,16	4,95	5,09
6	0,21	3,30	3,39
10	0,21	1,91	1,95
16	0,21	1,21	1,24
25	0,21	0,780	0,795
35	0,21	0,554	0,565
50	0,31	0,386	0,393
70	0,31	0,272	0,277
95	0,31	0,206	0,210
120	0,31	0,161	0,164
150	0,31	0,129	0,132
185	0,41	0,106	0,108
240	0,41	0,0801	0,0817
300	0,41	0,0641	0,0654

SYSTEM OF DENOMINATION OF HARMONISED CABLES ACCORDING TO CENELEC HD 361

REFERENCE TO THE STANDARDS

- **H** Cable conforming to harmonised standards
- **A** Recognised national type of cable
- **N** Other type of national cable

RATED VOLTAGE

- **00** Less than 100 / 100 V
- **01** Above 100 / 100 V and less than 300 / 300 V
- **03** 300 / 300 V
- **05** 300 / 500 V
- **07** 450 / 750 V
- **1** 0,6 / 1 kV

INSULATION AND SHEATH MATERIAL

- **B** Ethylenpropylene rubber for working temperature of 60° C
- **N** Polychloroprene
- **N2** Polychloroprene for welding cables
- **Q** Polyurethane
- **R** Rubber
- **V** Common-quality PVC
- **V2** PVC for working temperatures of 90° C
- **V3** PVC for low temperature cables
- **V4** Reticulate PVC
- **V5** Oil-resistant PVC
- **Z** Polyolefine mixture

SCREENS

- **C** Concentric copper core
- **C4** Copper braid screen on multiple cores
- **C5** Copper braid screen on single cores
- **C7** Screen made of copper straps or ribbons

ARMOURS

- **Z2** Round steel strand armour
- **Z3** Steel strap armour
- **Z4** Steel ribbon armour
- **Z5** Steel strand braid

CONSTRUCTIVE FORM OF THE CABLE

- **H** Flat divisible cable with or without sheath
- **H2** Flat indivisible cable
- **H3** Flat cable with cores separated by a slat
- **H6** Flat cable with three or more cores
- **H7** Cable with double-layered insulation
- **H8** Extendable cord

CONDUCTOR FLEXIBILITY DEGREE

- **D** Flexible core for weldings cables
- **E** Very flexible core for welding cables
- **F** Flexible core for moving connections
- **H** Very flexible core for moving connections
- **K** Flexible core for fixed laying
- **R** Rigid round cord
- **U** Round rigid single strand

UL AND VDE MARKING OF CABLE GLANDS

MAXIblock® - spiralblock®

Ref. Light Grey	Thread	COMPRESSION RANGE Ø min-max				IMPACT CATEGORY (*)	MARKING
		Nominal	UL 514B		EN 50262		
		[mm]	[mm]	[inches]	[mm]		
1900.M12	M12x1,5	3,5-7	3,5	0.14	3,5-7	1	USR-CNR / VDE
1900.M16	M16x1,5	5-10	7	0.28	7-10	1	USR-CNR / VDE
1900.M20	M20x1,5	7-13	13	0.51	7-13	3	USL-CNL / VDE
1900.M25	M25x1,5	10-17	17	0.67	10-17	3	USL-CNL / VDE
1900.M32	M32x1,5	13-21	15-21	0.60-0.83	13-21	3	USL-CNL / VDE
1900.M40	M40x1,5	19-28	21-28	0.83-1.10	19-28	3	USL-CNL / VDE
1900.M50	M50x1,5	27-35	27-34	1.06-1.34	27-35	3	USL-CNL / VDE
1900.M63	M63x1,5	34-45	35-45	1.38-1.77	34-45	3	USL-CNL / VDE
1910.M12	M12x1,5	2-5	2-5	0.08-0.20	2-5	1	USR-CNR / VDE
1910.M16	M16x1,5	3-7	4-7	0.16-0.28	4-7	1	USR-CNR / VDE
1910.M20	M20x1,5	5-10	5-10	0.20-0.40	5-10	3	USR-CNR / VDE
1910.M25	M25x1,5	7-13	7-13	0.28-0.51	7-13	3	USR-CNR / VDE
1910.M32	M32x1,5	8-14	8-14	0.31-0.55	8-14	3	USR-CNR / VDE
1910.M40	M40x1,5	15-23	15-23	0.59-0.91	15-23	3	USL-CNL / VDE
1910.M50	M50x1,5	21-29	21-29	0.83-1.14	21-29	3	USL-CNL / VDE
1910.M63	M63x1,5	27-39	28-39	1.1-1.54	27-39	3	USL-CNL / VDE
1901.M12	M12x1,5	3,5-7	3,5	0.14	3,5-7	1	USR-CNR / VDE
1901.M16	M16x1,5	5-10	7	0.28	7-10	1	USR-CNR / VDE
1901.M20	M20x1,5	7-13	13	0.51	7-13	3	USL-CNL / VDE
1901.M25	M25x1,5	10-17	17	0.67	10-17	3	USL-CNL / VDE
1901.M32	M32x1,5	13-21	15-21	0.60-0.83	13-21	3	USL-CNL / VDE
1901.M40	M40x1,5	19-28	21-28	0.83-1.10	19-28	3	USL-CNL / VDE
1901.M50	M50x1,5	27-35	27-34	1.06-1.34	27-35	3	USL-CNL / VDE
1901.M63	M63x1,5	34-45	35-45	1.38-1.77	34-45	3	USL-CNL / VDE
1500.M12	M12x1,5	3,5-7	3,5	0.14	3,5-7	1	USR-CNR / VDE
1500.M16	M16x1,5	5-10	7	0.28	7-10	1	USR-CNR / VDE
1500.M20	M20x1,5	7-13	13	0.51	7-13	3	USL-CNL / VDE
1500.M25	M25x1,5	10-17	17	0.67	10-17	3	USL-CNL / VDE
1500.M32	M32x1,5	13-21	15-21	0.60-0.83	13-21	3	USL-CNL / VDE
1940.M16	M16x1,5	5-10	5.5-8	0.22-0.31	-	-	USR-CNR
1940.M20	M20x1,5	7-12	8-11.5	0.31-0.45	-	-	USL-CNL
1940.M25	M25x1,5	13-18	13-18	0.51-0.71	-	-	USL-CNL
1540.M16	M16x1,5	5-10	5.5-8	0.22-0.31	-	-	USR-CNR
1540.M20	M20x1,5	7-12	8-11.5	0.31-0.45	-	-	USL-CNL
1540.M25	M25x1,5	13-18	13-18	0.51-0.71	-	-	USL-CNL

*Add to Ref: **N** for Black, **G** for Dark Grey*

MAXIblock® - spiralblock®

Ref. Light Grey	Thread	COMPRESSION RANGE Ø min-max			MARKING
		Nominal	UL 514B		
		[mm]	[mm]	[inches]	
1900.07	Pg 7	3,5-7	4.5-6.5	0.18-0.25	USR-CNR
1900.09	Pg 9	5-8	5.5-8	0.22-0.31	USR-CNR
1900.11	Pg 11	5-10	6.5-9.5	0.26-0.37	USR-CNR
1900.13	Pg 13,5	7-12	8-11.5	0.31-0.45	USL-CNL
1900.16	Pg 16	10-14	10.5-14	0.41-0.55	USL-CNL
1900.21	Pg 21	13-18	13-18	0.51-0.71	USL-CNL
1900.29	Pg 29	18-25	18.5-25	0.73-0.98	USL-CNL
1900.36	Pg 36	20-32	21.5-32	0.85-1.26	USL-CNL
1900.42	Pg 42	28-38	28-38	1.10-1.49	USL-CNL
1900.48	Pg 48	37-45	40-44	1.57-1.73	USL-CNL
1901.09	Pg 9	5-8	5.5-8	0.22-0.31	USR-CNR
1901.11	Pg 11	5-10	6.5-9.5	0.26-0.37	USR-CNR
1901.13	Pg 13,5	7-12	8-11.5	0.31-0.45	USL-CNL
1901.16	Pg 16	10-14	10.5-14	0.41-0.55	USL-CNL
1901.21	Pg 21	13-18	13-18	0.51-0.71	USL-CNL
1901.29	Pg 29	18-25	18.5-25	0.73-0.98	USL-CNL
1901.36	Pg 36	20-32	21.5-32	0.85-1.26	USL-CNL
1500.07	Pg 7	3,5-7	4.5-6.5	0.18-0.25	USR-CNR
1500.09	Pg 9	5-8	5.5-8	0.22-0.31	USR-CNR
1500.11	Pg 11	5-10	6.5-9.5	0.26-0.37	USR-CNR
1500.13	Pg 13,5	7-12	8-11.5	0.31-0.45	USL-CNL
1500.16	Pg 16	10-14	10.5-14	0.41-0.55	USL-CNL
1500.21	Pg 21	13-18	13-18	0.51-0.71	USL-CNL
1900.14	G1/4"	3-6,5	4.5-6.5	0.18-0.25	USR-CNR
1900.38	G3/8"	4-8	5.5-8	0.22-0.31	USR-CNR
1900.12	G1/2"	7-12	8-11.5	0.31-0.45	USL-CNL
1900.34	G3/4"	13-18	13-18	0.51-0.71	USL-CNL
1901.12	G1/2"	7-12	8-11.5	0.31-0.45	USL-CNL
1500.14	G1/4"	3-6,5	4.5-6.5	0.18-0.25	USR-CNR
1500.38	G3/8"	4-8	5.5-8	0.22-0.31	USR-CNR
1500.12	G1/2"	7-12	8-11.5	0.31-0.45	USL-CNL
1500.34	G3/4"	13-18	13-18	0.51-0.71	USL-CNL

*Add to Ref: **N** for Black, **G** for Dark Grey*

MAXIbrass®

Ref. Nickel Plated Brass	Thread	COMPRESSION RANGE Ø min-max				IMPACT CATEGORY (*)	MARKING
		Nominal	UL 514B		EN 50262		
		[mm]	[mm]	[inches]	[mm]		
2900.M12N	M12x1,5	3-7	3-7	0.12-0.28	3-7	5	USR-CNR / VDE
2900.M16N	M16x1,5	4,5-10	4,5-10	0.18-0.39	4,5-10	6	USL-CNL / VDE
2900.M20N	M20x1,5	7-13	8-13	0.31-0.51	7-13	6	USL-CNL / VDE
2900.M25N	M25x1,5	10-17	10-17	0.39-0.67	10-17	6	USL-CNL / VDE
2900.M32N	M32x1,5	11-21	11-21	0.43-0.83	11-21	6	USL-CNL / VDE
2900.M40N	M40x1,5	19-28	19-28	0.75-1.10	19-28	6	USL-CNL / VDE
2900.M50N	M50x1,5	26-35	27-35	1.06-1.38	26-35	6	USL-CNL / VDE
2900.M63N	M63x1,5	34-45	34-45	1.33-1.77	34-45	6	USL-CNL / VDE
2910.M12N	M12x1,5	1-5	2-5	0.08-0.20	1-5	5	USR-CNR / VDE
2910.M16N	M16x1,5	2,5-7	3,5-7	0.14-0.28	2,5-7	6	USR-CNR / VDE
2910.M20N	M20x1,5	5-10	5-10	0.20-0.39	5-10	6	USR-CNR / VDE
2910.M25N	M25x1,5	6-13	6-13	0.24-0.51	6-13	6	USR-CNR / VDE
2910.M32N	M32x1,5	7-14	7-14	0.28-0.55	7-14	6	USR-CNR / VDE
2910.M40N	M40x1,5	13-23	15-23	0.59-0.90	17-23	6	USL-CNL / VDE
2910.M50N	M50x1,5	20-29	20-29	0.79-1.14	22-29	6	USL-CNL / VDE
2910.M63N	M63x1,5	27-39	28-39	1.10-1.54	31-39	6	USL-CNL / VDE
2901.M12N	M12x1,5	3-7	3-7	0.12-0.28	3-7	5	USR-CNR/VDE
2901.M16N	M16x1,5	4,5-10	4,5-10	0.18-0.39	4,5-10	6	USL-CNL / VDE
2901.M20N	M20x1,5	7-13	8-13	0.31-0.51	7-13	6	USL-CNL / VDE
2901.M25N	M25x1,5	10-17	10-17	0.39-0.67	10-17	6	USL-CNL / VDE
2901.M32N	M32x1,5	11-21	11-21	0.43-0.83	11-21	6	USL-CNL / VDE
2901.M40N	M40x1,5	19-28	19-28	0.75-1.10	19-28	6	USL-CNL / VDE
2901.M50N	M50x1,5	26-35	27-35	1.06-1.38	26-35	6	USL-CNL / VDE
2911.M12N	M12x1,5	1-5	2-5	0.08-0.20	1-5	5	USR-CNR/VDE
2911.M16N	M16x1,5	2,5-7	3,5-7	0.14-0.28	2,5-7	6	USR-CNR / VDE
2911.M20N	M20x1,5	5-10	5-10	0.20-0.39	5-10	6	USR-CNR / VDE
2911.M25N	M25x1,5	6-13	6-13	0.24-0.51	6-13	6	USR-CNR / VDE
2911.M32N	M32x1,5	7-14	7-14	0.28-0.55	7-14	6	USR-CNR/VDE
2911.M40N	M40x1,5	13-23	15-23	0.59-0.90	13-23	6	USL-CNL / VDE
2911.M50N	M50x1,5	20-29	20-29	0.79-1.14	22-29	6	USL-CNL / VDE

MAXIbrass®

Ref. Nickel Plated Brass	Thread	COMPRESSION RANGE Ø min-max			MARKING
		Nominal	UL 514B		
		[mm]	[mm]	[inches]	
2900.09N	Pg 9	4-8	4-8	0.16-0.31	USR-CNR
2900.11N	Pg 11	4,5-10	4,5-10	0.18-0.39	USR-CNR
2900.13N	Pg 13,5	5-12	9-12	0.35-0.47	USL-CNL
2900.16N	Pg 16	7-13	10-13	0.39-0.51	USL-CNL
2900.21N	Pg 21	10-17	12-17	0.47-0.67	USL-CNL
2910.09N	Pg 9	2-6	3-6	0.12-0.24	USR-CNR
2910.11N	Pg 11	2,5-7	3,5-7	0.14-0.28	USR-CNR
2910.13N	Pg13,5	4-10	5,5-10	0.22-0.39	USR-CNR
2910.16N	Pg 16	5-10	6-10	0.24-0.39	USR-CNR
2910.21N	Pg 21	6-13	7-13	0.28-0.51	USR-CNR
2902.13N	Pg 13,5	5-12	9-12	0.35-0.47	USL-CNL

VDE: *Licence nos 40008472, 40008474, 40008475 and 40008476*

USL-CNL: *UL LISTING file no E220310; control no 48SB valid in USA & Canada*

USR-CNR: *UL RECOGNITION file no E220310 valid in USA & Canada (with reduced tightening force)*

(*) *EN 50262 § 9.4*

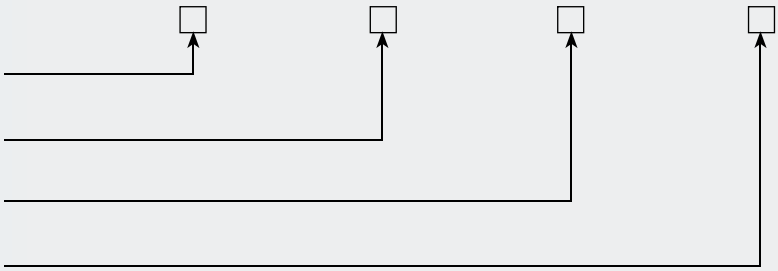
INGRESS PROTECTION (IP) RATING ACCORDING TO EN 60529 - CEI 70-1

The first digit (0-6 or X letter):
Protection against ingress of solid matter

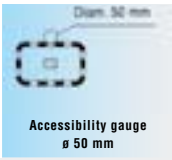
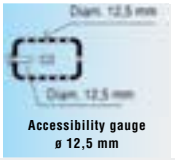
Second digit (0-8 or X letter):
Protection against ingress of liquids

(A, B, C, D) for future use.
Restricted entry to dangerous parts:

(H,M,S,W) for future use. Specific criteria:



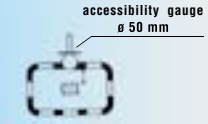
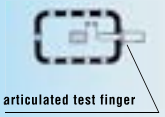
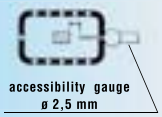
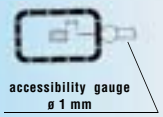
1st CHARACTERISTIC NUMBER:
PROTECTION AGAINST INGRESS OF SOLID MATTER

PROTECTION	0	1	2	3	4	5	6
Protection against ingress of solid matter caused by		solid bodies measuring over 50 mm	solid bodies measuring over 12,5 mm	solid bodies measuring over 2,5 mm	solid bodies measuring over 1 mm	powder in harmful quantities	Powder (completely protected)
Test method		 Accessibility gauge ø 50 mm	 Accessibility gauge ø 12,5 mm	 Accessibility gauge ø 2,5 mm	 Accessibility gauge ø 1 mm	 talcum powder	 talcum powder

2nd CHARACTERISTIC NUMBER:
PROTECTION AGAINST INGRESS OF LIQUIDS

PROTECTION	0	1	2	3	4	5	6	7	8
Protection against ingress of liquids caused by		Drops of water falling vertically	Vertical drops of water with inclination of casing up to 15°	Rain	Sprays of water	Jets of water	Powerful jets of water	Temporary Immersion	Permanent Immersion
Test method									Agreement between manufacturer and user but more severe than 7

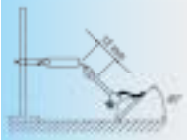
1st ADDITIONAL LETTER
RESTRICTED ENTRY TO DANGEROUS PARTS

RESTRICTED ENTRY	A	B	C	D
Restricted entry to dangerous parts caused by	back of hand	finger	tool	wire
Test method	 accessibility gauge ø 50 mm	 articulated test finger	 accessibility gauge ø 2,5 mm	 accessibility gauge ø 1 mm

2nd ADDITIONAL LETTER
MEANING OF THE SECOND ADDITIONAL LETTER

SPECIFIC CRITERIA	H	M	S	W
Specific criteria	High voltage equipment	Tested against negative effects of water penetration, when the moveable parts of the equipment (e.g. wheels of a revolving machine) are moving	Tested against the negative effects of water penetration, when the moveable parts of the equipment (e.g. wheels of a revolving machine) are stationary	Suitable for use in environmental conditions as specified and equipped with additional measures of protection

FLAMMABILITY TEST FOR PRODUCTS AND MATERIALS

TYPE OF TEST	TEST EQUIPMENT	COMPLIANCE WITH STANDARDS	OBJECTIVE OF TEST	TEST RESULTS	TEST CONDITIONS		
					heat source	length of test	characteristic features
CHARACTERISTIC FEATURES		IEC 695-2-1 CEI 50-11 DIN VDE 0471-2-1	Check that abnormal heating produced by overcurrent and bad contacts does not compromise the safety of the insulating material. Lighting test. The wire is pressed against the sample using force and penetrates up to 7 mm.	Any sign of flame starting must stop within 30 sec. of removing the glowing wire TEST TEMPERATURE • 650° for materials which do not support parts under tension • 750° for materials which support parts under tension of moving sockets and plugs • 850° for materials which support parts under tension of fixed sockets and switches	Glow-wire 4 mm in diameter	Wire applied for 30 seconds	Flame extinction time
NEEDLE FLAME		IEC 695-2-1 CEI 50-11	Simulates the effect small flames have which may occur due to internal faults of products in order to judge the fire risk.	• the sample does not catch fire • the flame and incandescent particles do not spread the fire • combustion lasts less than 30 seconds	Bunsen burner flame	Flame applied for (Ta) 5, 10, 20, 30, 60, 120 sec. According to particular standards	The degree of severity: flame application time (Ta)
UL *(UNDERWRITER' LABORATORIES)*		UL 94	Measuring of time the sample continues to burn after the direct flame has been removed	• V0 if the sample burns for less than 5 sec. before going out. • V1 if it burns for less than 25 sec. • V2 if it burns for less than 25 sec. With incandescent drops • HB if it burns for more than 25 sec. (horizontal sample and burning speed less than 38 mm per minute) Comparable to ASTM D-635	Bunsen burner flame	Flame applied for 10 seconds twice following	Length of combustion

MAXIblock®, spiralblock®, MAXIbrass®

to obtain IP68 ingress protection in accordance with EN 50262

Torque ratio values apply to mounting in a threaded entry and to use with a locknut

THREAD CABLE GLAND	CABLE GLAND metallic	CABLE GLAND non-metallic
	torque ratio Nm	
M12 x 1,5	6	2,7
M16 x 1,5	6	5,0
M20 x 1,5	8	7,0
M25 x 1,5	8	7,5
M32 x 1,5	12	8,0
M40 x 1,5	18	8,0
M50 x 1,5	18	10,0
M63 x 1,5	18	10,0

MAXIblock®, spiralblock®, MAXIbrass®

to obtain IP68 ingress protection in accordance with DIN VDE for Pg threads

Torque ratio values apply to mounting in a threaded entry and to use with a locknut

THREAD CABLE GLAND	CABLE GLAND metallic	CABLE GLAND non-metallic
	torque ratio Nm	
Pg 7	6,25	2,5
Pg 9	6,25	3,75
Pg 11	6,25	3,75
Pg 13,5	6,25	3,75
Pg 16	7,5	5
Pg 21	10	7,5
Pg 29	10	7,5
Pg 36	10	7,5
Pg 42	10	7,5
Pg 48	10	7,5

MAXIblock®, spiralblock®

to obtain IP68 with reduced tightening force for GAS threads

Torque ratio values apply to mounting in a threaded entry and to use with a locknut

THREAD CABLE GLAND	CABLE GLAND non-metallic
	torque ratio Nm
G1/4”	4
G3/8”	5
G1/2”	6
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The information contained in this catalogue is to aid the commercial selection of products. It is not intended for use as an instruction manual. Information concerning application and the correct operational use is provided by the specific manual delivered with the products.

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