



it's cool to be safe
explosion proof solution for the global market

Supermec

explosion proof electrical equipment





GUA

CSD

GUB - A

GUBA - A

GUBA - S

EJB - A

EJB - S

ECS

UH - UP

CSE - A

CSE - P

CSE - S

WH - WP - WA

UVB - UVD

it's cool to be safe
explosion proof electrical equipment



CSE S

The CSE S enclosures are normally used in the chemical and petrochemical plants, off-shore platforms, refineries and any other industry where hazardous atmospheres (gas and combustible dust) are potentially present.

The CSE S enclosures range has been designed to meet the main requirements of power distribution, monitoring and signaling, and other electrical functions inside the hazardous area of the plant





Function

The CSE S enclosures are normally used form the following main applications:

- control stations
- instrument housings
- switches and changeover switches
- terminal boxes
- battery containers
- emergency call units
- circuit breakers
- lighting controls
- electrical housing
- panel sockets

The CSE S enclosures are available in different sizes so to create a large and modular range with different heights.

The CSE S enclosures, joined together through dedicated flanges, can become a large panel, maintaining the original IP protection.

The CSE S series can be equipped with Ex ed operators (pilot lights, push buttons, switches, etc.) on cover.

Construction

The materials used to manufacture the CSE S series have been studied to grant the maximum protection against the highly corrosive agents present in these industries:

- body and cover of stainless steel AISI 316;
- antiloosening screws on cover of stainless steel AISI 316;
- gasket on cover of polyuretane or silicone;
- internal fixing screws of stainless steel

The CSE S are available in three different executions:

CSE S: cover is fixed to body by antiloosening screws

CSE SD: cover is jointed to body by hinges and locking keys

CSE SX: cover is jointed to body by hinges and by antiloosening screws

All systems provide the right pressure on gasket to grant the IP66 protection to the enclosure.

CSE SD and CSE SX can be provided with gland plates on each side wall to facilitate the execution of extra cable entries in case of future necessities.

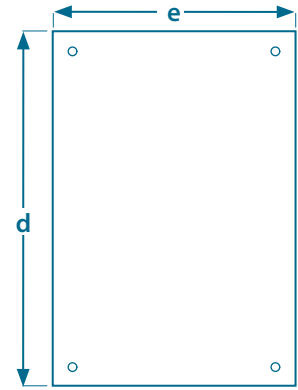
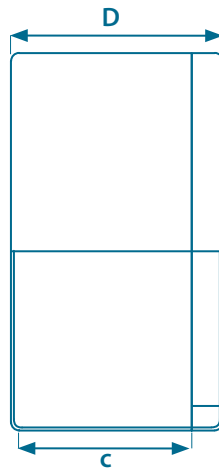
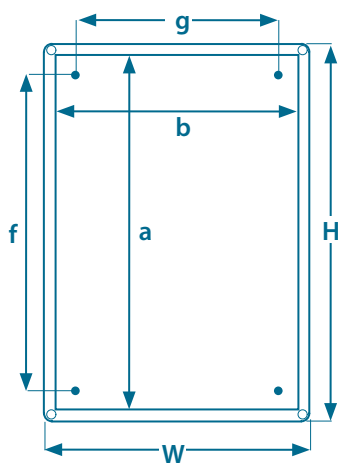
Accessories

To CSE S series enclosures can be completed with the following accessories:

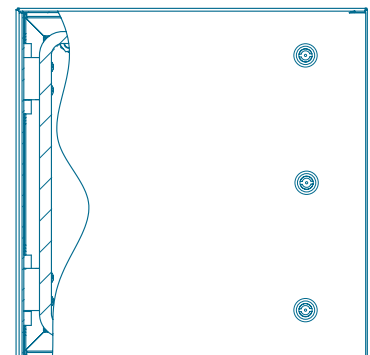
- internal mounting plate of galvanized steel or stainless steel;
- mounting brackets of stainless steel with integrated earth connection
- internal and external earth screws of stainless steel AISI 316;
- hinges on cover of stainless steel (only for CSE S series)

Protection

certificate number:	IECEX IMQ 15.0006X	IMQ 15 ATEX 013 X	TC RU C-IT.AA87.B.00509
marking:	⊕ II 2GD Ex e ia IIC T6/T5 Gb Ex tb IIIC T85/T100°C Db (terminal boxes)		
	⊕ II 2GD Ex d e [ia/ib] mb IIC T6/T5/T4 Gb Ex tb IIIC T85/T100/T135°C Db (control stations)		
ambient temperature:	-20°C +60°C (polyuretane gasket) -50°C +90°C (silicone gasket)		
degree of protection:	IP66		
conformity:	Directive ATEX 2014/34/EU		TP TC 012/2011
standards:	IEC-EN60079-0	IEC-EN60079-1	IEC-EN60079-7
	ГОСТ 31610.0	ГОСТ IEC 60079-1	ГОСТ P МЭК 60079-7
	IEC-EN60079-11	IEC-EN 60079-18	IEC-EN60079-31
	ГОСТ 31610.11	ГОСТ P МЭК 60079-18	ГОСТ P МЭК 60079-31
category:	suitable for Zone 1- 2 (gas) and Zone 21 - 22 (dust)		



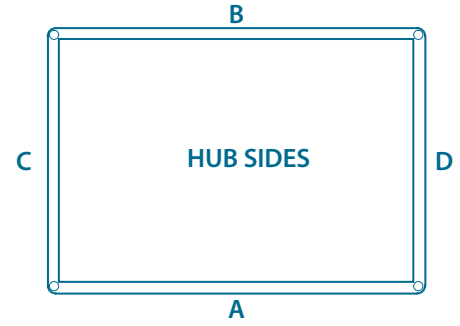
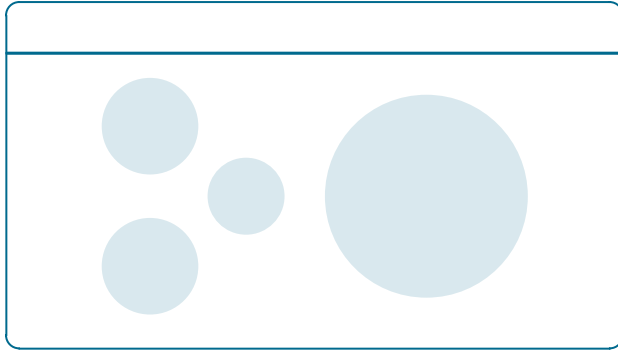
Code	overall dimensions			internal dimensions			mounting plate		fixing dimensions			weight
	H	W	D	a	b	c	d	e	f	g	screw	Kg.
CSE 101009S	100	100	90	97	97	70	65	65	50	-	2 x M5	0,7
CSE 151009S	150	100	90	147	97	70	115	65	100	-	2 x M5	0,9
CSE 151509S	150	150	90	147	147	70	115	115	100	-	2 x M5	1,2
CSE 201009S	200	100	90	197	97	70	165	65	150	-	2 x M5	1,2
CSE 202009S	200	200	90	197	197	70	165	165	150	150	4 x M5	1,9
CSE 301509S	300	150	90	297	147	70	265	115	250	100	2 x M5	2,1
CSE 302009S	300	200	90	297	197	70	265	165	250	150	4 x M5	2,6
CSE 151512S	150	150	120	147	147	100	115	115	100	100	2 x M5	1,4
CSE 202012S	200	200	120	197	197	100	165	165	150	150	4 x M5	2,1
CSE 301512S	300	150	120	297	147	100	265	115	250	100	2 x M5	2,4
CSE 302012S	300	200	120	297	197	100	265	165	250	150	4 x M5	2,9
CSE 303012S	300	300	120	297	297	100	265	265	250	250	4 x M5	3,8
CSE 402012S	400	200	120	397	197	100	365	165	350	150	4 x M5	3,6
CSE 403015S	400	300	150	397	297	130	365	265	350	250	4 x M5	5,2
CSE 404015S	400	400	150	397	397	130	365	365	350	350	4 x M5	6,4
CSE 604015S	600	400	150	597	397	130	565	357	550	350	4 x M5	9,0
CSE 606020S	600	600	200	597	597	180	565	557	550	550	4 x M5	13,7



CSE-SD Series closing system:
 - 2 or 3 hinges
 - 1, 2 or 3 keys



Code	overall dimensions			internal dimensions			mounting plate		fixing dimensions			cover closings			weight
	H	W	D	a	b	c	d	e	f	g	screw	SD/SX	SD	SX	Kg.
												hinges	keys	screw	
CSE 302015SD/SX	300	200	150	297	197	115	270	147	240	110	4 x M6	2	1	2 x M5	4,0
CSE 303015SD/SX	300	300	150	297	297	115	270	247	240	210	4 x M6	2	1	2 x M5	5,5
CSE 304015SD/SX	300	400	150	297	397	115	270	347	240	310	4 x M6	2	1	2 x M5	7,0
CSE 403015SD/SX	400	300	150	397	297	115	370	247	340	210	4 x M6	2	1	2 x M5	7,0
CSE 303020SD/SX	300	300	210	297	297	175	270	247	240	210	4 x M6	2	1	2 x M5	6,5
CSE 403020SD/SX	400	300	210	397	297	175	370	247	340	210	4 x M6	2	1	2 x M5	8,0
CSE 404020SD/SX	400	400	210	397	397	175	370	347	340	310	4 x M6	2	1	2 x M5	10,0
CSE 406020SD/SX	400	600	210	397	597	175	370	547	340	510	4 x M6	2	1	2 x M5	14,0
CSE 454520SD/SX	450	450	210	447	447	175	420	397	390	360	4 x M6	2	2	2 x M5	12,0
CSE 504020SD/SX	500	400	210	497	397	175	470	347	440	310	4 x M6	2	2	2 x M5	12,0
CSE 505020SD/SX	500	500	210	497	497	175	470	447	440	410	4 x M6	2	2	2 x M5	14,5
CSE 604020SD/SX	600	400	210	597	397	175	570	347	540	310	4 x M6	2	2	2 x M5	14,0
CSE 605020SD/SX	600	500	210	597	497	175	570	447	540	410	4 x M6	2	2	2 x M5	18,0
CSE 606020SD/SX	600	600	210	597	597	175	570	547	540	510	4 x M6	2	2	2 x M5	20,0
CSE 705020SD/SX	700	500	210	697	497	175	670	447	640	410	4 x M6	2	2	2 x M5	20,0
CSE 806020SD/SX	800	600	210	797	597	175	770	547	740	510	4 x M6	3	3	3 x M5	26,5
CSE 454525SD/SX	450	450	250	447	447	215	420	397	390	360	4 x M6	2	2	2 x M5	13,0
CSE 406025SD/SX	400	600	250	397	597	215	370	547	340	510	4 x M6	2	1	2 x M5	15,5
CSE 456025SD/SX	450	600	250	447	597	215	420	547	390	510	4 x M6	2	2	2 x M5	16,0
CSE 504025SD/SX	500	400	250	497	397	215	470	347	440	310	4 x M6	2	2	2 x M5	12,5
CSE 505025SD/SX	500	500	250	497	497	215	470	447	440	410	4 x M6	2	2	2 x M5	15,0
CSE 604525SD/SX	600	450	250	597	447	215	570	397	540	360	4 x M6	2	2	2 x M5	16,5
CSE 606025SD/SX	600	600	250	597	597	215	570	547	540	510	4 x M6	2	2	2 x M5	21,0
CSE 705025SD/SX	700	500	250	697	497	215	670	447	640	410	4 x M6	2	2	2 x M5	20,5
CSE 806025SD/SX	800	600	250	797	597	215	770	547	740	510	4 x M6	2	2	2 x M5	28,0
CSE 906025SD/SX	900	600	250	897	597	215	870	547	840	510	4 x M6	2	2	2 x M5	33,0
CSE 606030SD/SX	600	600	300	597	597	265	570	547	540	510	4 x M6	2	2	2 x M5	22,0
CSE 608030SD/SX	600	800	300	597	797	265	570	747	540	710	4 x M6	2	2	2 x M5	28,5
CSE 806030SD/SX	800	600	300	797	597	265	770	547	740	510	4 x M6	2	2	2 x M5	29,5
CSE 808030SD/SX	800	800	300	797	797	265	770	747	740	710	4 x M6	2	2	2 x M5	42,0
CSE 906030SD/SX	900	600	300	897	597	265	870	547	840	510	4 x M6	2	2	2 x M5	33,0
CSE 1006030SD/SX	1000	600	300	997	597	265	970	547	470 x 2	510	6 x M6	3	3	3 x M5	40,0
CSE 1008030SD/SX	1000	800	300	997	797	265	970	747	470 x 2	710	6 x M6	3	3	3 x M5	51,0
CSE 1206030SD/SX	1200	600	300	1197	597	265	1170	547	570 x 2	510	6 x M6	3	3	3 x M5	47,0
CSE 1208030SD/SX	1200	800	300	1197	797	265	1170	747	570 x 2	710	6 x M6	3	3	3 x M5	59,5
CSE 1406030SD/SX	1400	600	300	1397	597	265	1370	547	670 x 2	510	6 x M6	3	3	3 x M5	54,5
CSE 1408030SD/SX	1400	800	300	1397	797	265	1370	747	670 x 2	710	6 x M6	3	3	3 x M5	70,0
CSE 1608030SD/SX	1600	800	300	1597	797	265	1570	747	770 x 2	710	6 x M6	4	4	4 x M5	77,0
CSE 606040SD/SX	600	600	400	597	597	365	570	547	540	510	4 x M6	2	2	2 x M5	25,0
CSE 806040SD/SX	800	600	400	797	597	365	770	547	740	510	4 x M6	2	2	2 x M5	32,5
CSE 1206040SD/SX	1200	600	400	1197	597	365	1170	547	570 x 2	510	6 x M6	3	3	3 x M5	52,0
CSE 1208040SD/SX	1200	800	400	1197	797	365	1170	747	570 x 2	710	6 x M6	3	3	3 x M5	65,0
CSE 1406040SD/SX	1400	600	400	1397	597	365	1370	547	670 x 2	510	6 x M6	3	3	3 x M5	59,5
CSE 1408040SD/SX	1400	800	400	1397	797	365	1370	747	670 x 2	710	6 x M6	3	3	3 x M5	75,0
CSE 1608040SD/SX	1600	800	400	1597	797	365	1570	747	770 x 2	710	6 x M6	4	4	4 x M5	84,0



Code	maximum number of hubs side A-B							maximum number of hubs side C-D						
	M16	M20	M25	M32	M40	M50	M63	M16	M20	M25	M32	M40	M50	M63
CSE 101009S	3	2	1	1	-	-	-	3	2	1	1	-	-	-
CSE 151009S	4	3	3	2	-	-	-	3	2	2	1	-	-	-
CSE 151509S	4	3	3	2	-	-	-	4	3	3	2	-	-	-
CSE 201009S	6	5	4	3	-	-	-	3	2	2	1	-	-	-
CSE 202009S	6	5	4	3	-	-	-	6	5	4	3	-	-	-
CSE 301509S	10	8	6	5	-	-	-	4	3	3	2	-	-	-
CSE 302009S	10	8	6	5	-	-	-	6	5	4	3	-	-	-
CSE 151512S	8	6	6	3	2	1	1	8	6	6	3	2	1	1
CSE 202012S	11	9	7	4	2	2	2	11	9	7	4	2	2	-
CSE 301512S	17	14	12	6	4	3	3	8	6	6	3	2	1	1
CSE 302012S	17	14	12	6	4	3	3	11	9	7	4	2	2	2
CSE 303012S	17	14	12	6	4	3	3	17	14	12	6	4	3	3
CSE 402012S	23	18	16	9	5	5	4	11	9	7	4	2	2	2
CSE 403015S	30	24	16	12	7	5	5	22	18	12	9	5	4	3
CSE 404015S	30	24	16	12	7	5	5	30	24	16	12	7	5	5
CSE 604015S	48	38	25	20	11	9	7	30	24	16	12	7	5	5
CSE 606020S	63	58	50	26	17	14	11	63	58	50	26	17	14	11





Code	maximum number of hubs side A-B							maximum number of hubs side C-D						
	M16	M20	M25	M32	M40	M50	M63	M16	M20	M25	M32	M40	M50	M63
CSE 302015SD/SX	24	21	11	8	4	4	3	15	14	8	5	3	2	2
CSE 303015SD/SX	24	21	11	8	4	4	3	24	21	11	8	4	4	3
CSE 304015SD/SX	24	21	11	8	4	4	3	30	29	15	12	6	5	4
CSE 403015SD/SX	30	29	15	12	6	5	4	24	21	11	8	4	4	3
CSE 303020SD/SX	32	28	17	12	7	6	6	32	28	17	12	7	6	6
CSE 403020SD/SX	40	38	25	18	11	8	8	32	28	17	12	7	6	6
CSE 404020SD/SX	40	38	25	18	11	8	8	40	38	25	18	11	8	8
CSE 406020SD/SX	40	38	25	18	11	8	8	64	58	40	27	17	14	12
CSE 454520SD/SX	48	42	30	20	12	10	10	48	42	30	20	12	10	10
CSE 504020SD/SX	52	48	33	22	13	12	10	40	38	25	18	11	8	8
CSE 505020SD/SX	52	48	33	22	13	12	10	52	48	33	22	13	12	10
CSE 604020SD/SX	64	58	40	27	17	14	12	40	38	25	18	11	8	8
CSE 605020SD/SX	64	58	40	27	17	14	12	52	48	33	22	13	12	10
CSE 606020SD/SX	64	58	40	27	17	14	12	64	58	40	27	17	14	12
CSE 705020SD/SX	76	70	48	33	19	18	14	52	48	33	22	13	12	10
CSE 806020SD/SX	88	80	55	38	23	20	16	64	58	40	27	17	14	12
CSE 454525SD/SX	60	53	36	26	18	14	11	60	53	36	26	18	14	11
CSE 456025SD/SX	60	53	36	26	18	14	11	80	73	48	36	24	18	15
CSE 504025SD/SX	65	60	39	30	18	15	12	50	47	30	22	15	12	9
CSE 505025SD/SX	65	60	39	30	18	15	12	65	60	39	30	18	15	12
CSE 604525SD/SX	80	73	48	36	24	18	15	60	53	36	26	18	14	11
CSE 606025SD/SX	80	73	48	36	24	18	15	80	73	48	36	24	18	15
CSE 705025SD/SX	95	85	57	42	27	21	18	65	60	39	30	18	15	12
CSE 806025SD/SX	105	100	66	50	33	25	20	80	73	48	36	24	18	15
CSE 906025SD/SX	120	113	72	56	36	29	22	80	73	48	36	24	18	15
CSE 606030SD/SX	112	105	64	45	28	23	20	112	105	64	45	28	23	20
CSE 608030SD/SX	112	105	64	45	28	23	20	147	140	88	60	38	30	27
CSE 806030SD/SX	147	140	88	60	38	30	27	112	105	64	45	28	23	20
CSE 808030SD/SX	147	140	88	60	38	30	27	147	140	88	60	38	30	27
CSE 906030SD/SX	168	158	96	70	42	35	30	112	105	64	45	28	23	20
CSE 1006030SD/SX	189	178	108	77	48	40	35	112	105	64	45	28	23	20
CSE 1008030SD/SX	189	178	108	77	48	40	35	147	140	88	60	38	30	27
CSE 1206030SD/SX	231	214	132	95	58	48	40	112	105	64	45	28	23	20
CSE 1208030SD/SX	231	214	132	95	58	48	40	147	140	88	60	38	30	27
CSE 1406030SD/SX	266	248	156	112	68	55	48	112	105	64	45	28	23	20
CSE 1408030SD/SX	266	248	156	112	68	55	48	147	140	88	60	38	30	27
CSE 1608030SD/SX	308	287	180	128	78	65	55	147	140	88	60	38	30	27
CSE 606040SD/SX	160	150	88	63	38	31	28	160	150	88	63	38	31	28
CSE 806040SD/SX	210	200	121	84	52	42	39	160	150	88	63	38	31	28
CSE 1206040SD/SX	330	305	181	133	80	66	56	160	150	88	63	38	31	28
CSE 1208040SD/SX	330	305	181	133	80	66	56	210	200	121	84	52	42	39
CSE 1406040SD/SX	380	355	215	158	94	77	66	160	150	88	63	38	31	28
CSE 1408040SD/SX	380	355	215	158	94	77	66	210	200	121	84	52	42	39
CSE 1608040SD/SX	440	410	247	178	108	91	77	210	200	121	84	52	42	39

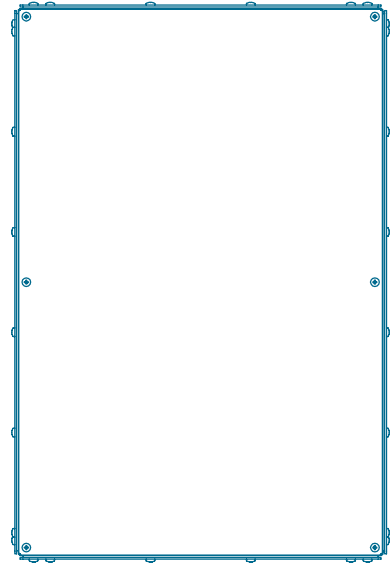
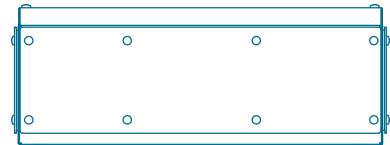
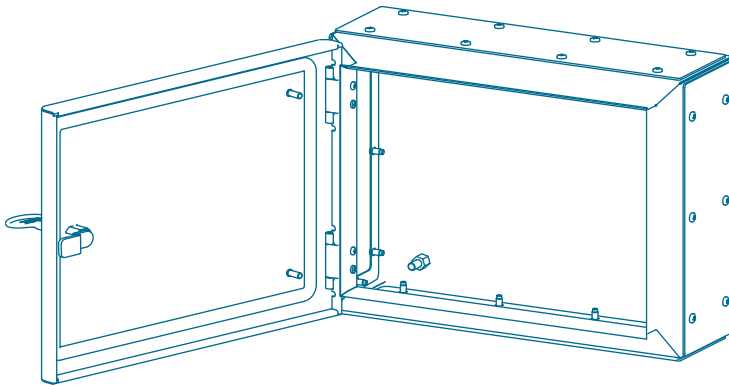


Gland Plate

The CSE SD and CSE SX enclosures can be equipped, on request, with removable gland plates on all four side walls.

The gland plates grant the possibility, in case of any unplanned requirement, to make additional entries after the installation without the necessity to remove the enclosure from the site.

Any modification must be done with the assistance of Supermec Technical Support.





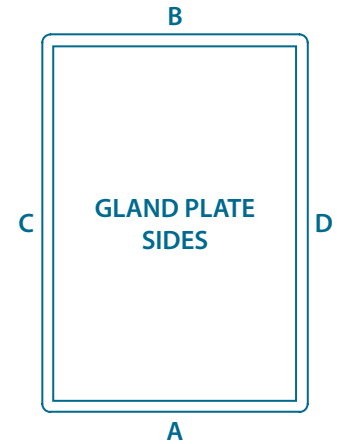
Ordering Code

The CSE SD and CSE SX enclosures equipped with removable gland plates can be ordered adding to their standard code one or more alphabetical letters as per below schemes showing the most common configurations.

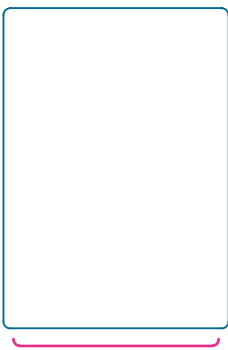
The following tables shows:

- the sizes of gland plates available as standard
- the sizes and the maximum number of entries for each gland plate
- the standard configuration of gland plate for each enclosure granting the maximum drilling surface on each side

Any other possible combination of gland plates is available on request and must submitted to our Technical Support.



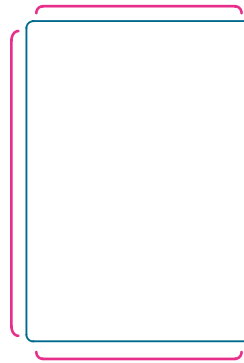
CSE 302015 SD (A)



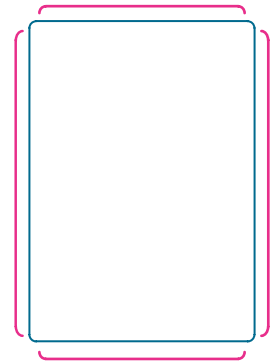
CSE 403015 SX (AB)



CSE 403020 SD (ABC)



CSE 604020 SX (ABCD)

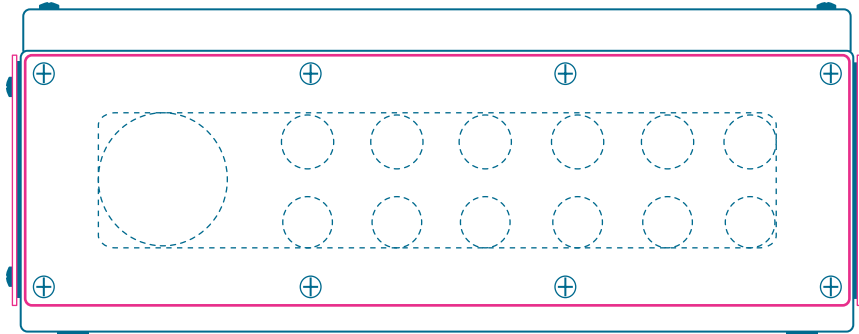


Code	Glande Plate	
	SIDE A, B	SIDE C, D
CSE 302015SD/SX	GP 00	GP 01
CSE 303015SD/SX	GP 01	GP 01
CSE 304015SD/SX	GP 02	GP 01
CSE 403015SD/SX	GP 01	GP 02
CSE 303020SD/SX	GP 11	GP 11
CSE 403020SD/SX	GP 11	GP 12
CSE 404020SD/SX	GP 12	GP 12
CSE 406020SD/SX	GP 14	GP 12
CSE 454520SD/SX	GP 12	GP 12
CSE 504020SD/SX	GP 12	GP 13
CSE 505020SD/SX	GP 13	GP 13
CSE 604020SD/SX	GP 12	GP 14
CSE 605020SD/SX	GP 13	GP 14
CSE 606020SD/SX	GP 14	GP 14
CSE 705020SD/SX	GP 13	GP 14
CSE 806020SD/SX	GP 14	GP 12 + GP 12
CSE 454525SD/SX	GP 21	GP 21
CSE 406025SD/SX	GP 21	GP 23
CSE 456025SD/SX	GP 23	GP 21
CSE 504025SD/SX	GP 21	GP 22
CSE 505025SD/SX	GP 22	GP 22
CSE 604525SD/SX	GP 21	GP 23
CSE 606025SD/SX	GP 23	GP 23

Code	Glande Plate	
	SIDE A, B	SIDE C, D
CSE 705025SD/SX	GP 22	GP 23
CSE 806025SD/SX	GP 23	GP 21 + GP 21
CSE 906025SD/SX	GP 23	GP 21 + GP 21
CSE 606030SD/SX	GP 23	GP 23
CSE 608030SD/SX	GP 31	GP 23
CSE 806030SD/SX	GP 23	GP 31
CSE 808030SD/SX	GP 31	GP 31
CSE 906030SD/SX	GP 23	GP 31
CSE 1006030SD/SX	GP 23	GP 31
CSE 1008030SD/SX	GP 31	GP 31
CSE 1206030SD/SX	GP 23	GP 23 + GP 23
CSE 1208030SD/SX	GP 31	GP 23 + GP 23
CSE 1406030SD/SX	GP 23	GP 23 + GP 23
CSE 1408030SD/SX	GP 31	GP 23 + GP 23
CSE 1608030SD/SX	GP 31	GP 31 + GP 31
CSE 606040SD/SX	GP 41	GP 41
CSE 806040SD/SX	GP 41	GP 42
CSE 1206040SD/SX	GP 41	GP 41 + GP 41
CSE 1208040SD/SX	GP 41	GP 41 + GP 41
CSE 1406040SD/SX	GP 41	GP 41 + GP 41
CSE 1408040SD/SX	GP 41	GP 41 + GP 41
CSE 1608040SD/SX	GP 41	GP 41 + GP 41



Gland Plate hubs



Code	Dimension Plate	maximum number of hubs						
		M16	M20	M25	M32	M40	M50	M63
GP 00	180X100	8	6	3	2	-	-	-
GP 01	280X100	14	11	6	4	-	-	-
GP 02	380X100	18	15	8	6	-	-	-
GP 11	280X160	20	18	14	8	5	4	3
GP 12	380X160	28	24	20	11	7	5	4
GP 13	480X160	36	33	26	15	10	7	5
GP 14	580X160	46	39	32	18	12	9	6
GP 21	380X200	36	32	26	14	8	8	7
GP 22	480X200	48	44	34	18	12	10	9
GP 23	580X200	60	52	42	22	14	12	11
GP 31	780X250	120	90	73	40	30	26	20
GP 41	580X350	120	104	74	44	28	24	22
GP 42	780X350	160	144	102	64	40	34	26

