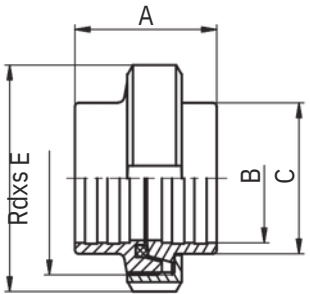
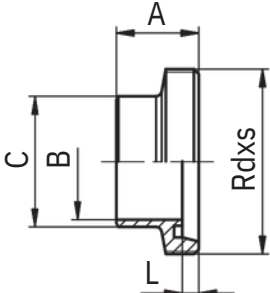
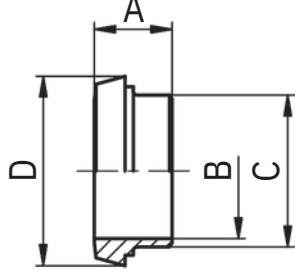
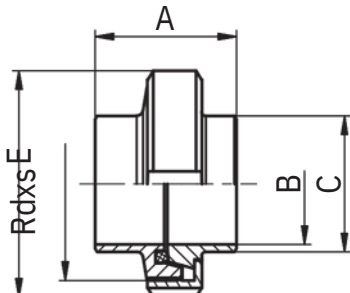
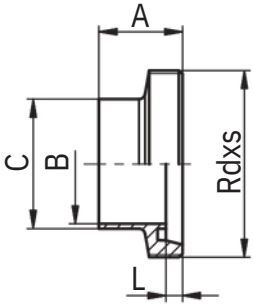


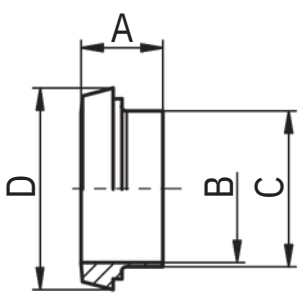
Expanding union - complete Einwalzverschraubung - komplett	20090											
	DIN 11 851	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
		25	45	28,2	35		63				52x1/6"	0,16
		32	51	34,2	41		70				58x1/6"	0,19
		40	53	40,3	48		78				65x1/6"	0,24
		50	57	52,3	61		92				78x1/6"	0,34
		65	65	70,4	79		112				95x1/6"	0,51
		80	75	85,4	93		127				110x1/4"	0,72

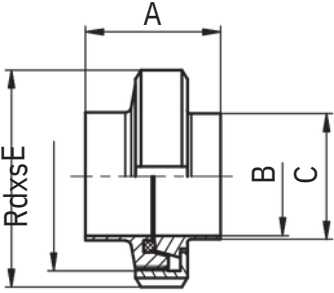
Welding male Anschweißgewindestutzen	20100	Dimensions • Baumaße										
	DIN 11 851	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
		10	21	10	15					4	28 x 1/8"	0,044
		15	21	16	21					4	34 x 1/8"	0,046
		20	24	20	25					6	44 x 1/6"	0,084
		25	29	26	31					7	52 x 1/6"	0,104
		32	32	32	37					7	58 x 1/6"	0,112
		40	33	38	43					7	65 x 1/6"	0,164
		50	35	50	55					7	78 x 1/6"	0,296
		65	40	66	72					8	95 x 1/6"	0,280
		80	45	81	87					8	110 x 1/4"	0,540
		100	54	100	106					10	130 x 1/4"	0,780
		125	46	125	132					12	160 x 1/4"	1,140
	150	50	150	157					13	190 x 1/4"	1,800	

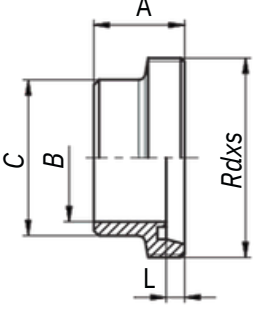
Welding liner Anschweißkegelstutzen	20110	Dimensions • Baumaße											
	DIN 11 851	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg	
		10	17	10	15	22,5						0,060	
		15	17	16	21	28,5							0,062
		20	18	20	25	36,5							0,100
		25	22	26	31	44							0,120
		32	25	32	37	50							0,160
		40	26	38	43	56							0,165
		50	28	50	55	68,5							0,220
		65	32	66	72	86							0,320
		80	37	81	87	100							0,400
		100	44	100	106	121							0,600
		125	34	125	132	150							0,930
	150	37	150	157	176							1,060	

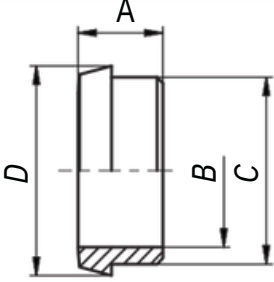
Welding union - complete Anschweißverschraubung - komplett	20120	Dimensions • Baumaße										
	DIN 11 851	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
		10	35	10	15		38				28 x 1/8"	0,17
		15	35	16	21		44				34 x 1/8"	0,18
		20	37	20	25		54				44 x 1/6"	0,32
		25	45	26	31		63				52 x 1/6"	0,40
		32	51	32	37		70				58 x 1/6"	0,49
		40	53	38	43		78				65 x 1/6"	0,58
		50	57	50	55		92				78 x 1/6"	0,84
		65	65	66	72		112				95 x 1/6"	1,15
		80	75	81	87		127				110 x 1/4"	1,74
		100	89	100	106		148				130 x 1/4"	2,46
		125	69	125	132		178				160 x 1/4"	3,52
	150	74	150	157		210				190 x 1/4"	4,74	

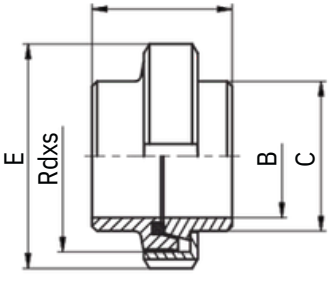
Welding male Anschweißgewindestutzen	20100 R											
	DIN 11 851		DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s
	10	21	10	13						4	28 x 1/8"	0,04
	15	21	16	19						4	34 x 1/8"	0,05
	20	24	20	23						6	44 x 1/6"	0,09
	25	29	26	29						7	52 x 1/6"	0,11
	32	32	32	35						7	58 x 1/6"	0,13
	40	33	38	41						7	65 x 1/6"	0,16
	50	35	50	53						7	78 x 1/6"	0,22
	65	40	66	70						8	95 x 1/6"	0,35
	80	45	81	85						8	110 x 1/4"	0,52
	100	54	100	104						10	130 x 1/4"	0,67
	125	46	125	129						12	160 x 1/4"	0,99
	150	50	150	154						13	190 x 1/4"	1,71

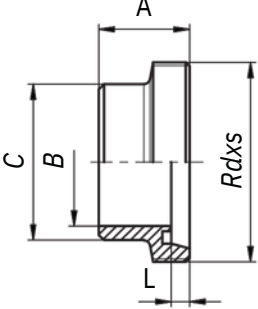
Welding liner Anschweißkegelstutzen	20110 R		Dimensions • Baumaße									
	DIN 11 851		DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s
	10	17	10	13	22,5							0,02
	15	17	16	19	28,5							0,03
	20	18	20	23	36,5							0,06
	25	22	26	29	44							0,08
	32	25	32	35	50							0,10
	40	26	38	41	56							0,12
	50	28	50	53	68,5							0,17
	65	32	66	70	86							0,29
	80	37	81	85	100							0,35
	100	44	100	104	121							0,57
	125	34	125	129	150							0,77
	150	37	150	154	176							1,01

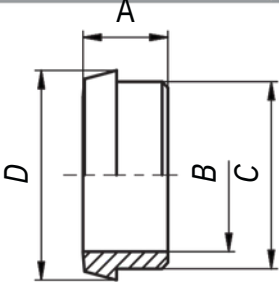
Welding union - complete Anschweißverschraubung-komplett	20120 R		Dimensions • Baumaße										
	DIN 11 851		DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
	10	35	10	13			38					28 x 1/8"	0,13
	15	35	16	19			44					34 x 1/4"	0,16
	20	37	20	23			54					44 x 1/6"	0,28
	25	45	26	29			63					52 x 1/6"	0,37
	32	51	32	35			70					58 x 1/6"	0,45
	40	53	38	41			78					65 x 1/6"	0,53
	50	57	50	53			92					78 x 1/6"	0,67
	65	65	66	70			112					95 x 1/6"	1,19
	80	75	81	85			127					110 x 1/4"	1,67
	100	89	100	104			148					130 x 1/4"	2,32
	125	69	125	129			178					160 x 1/4"	3,21
	150	74	150	154			210					190 x 1/4"	4,60

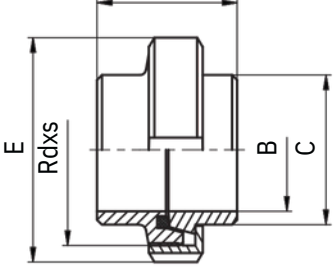
Welding male Anschweißgewindestutzen	20100 T											
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
	10	21	10	18					4	28x1/8"	0,05	
	15	21	16	24					4	34x1/8"	0,07	
	20	24	20	30					6	44x1/6"	0,13	
	25	29	26	35					7	52x1/6"	0,17	
	32	32	32	41					7	58x1/6"	0,21	
	40	33	38	48					7	65x1/6"	0,27	
	50	35	50	61					7	78x1/6"	0,38	
	65	40	66	79					8	95x1/6"	0,61	
	80	45	81	93					8	110x1/4"	0,86	
	100	54	100	114					10	130x1/4"	1,15	

Welding liner Anschweißkegelstutzen	20110 T Dimensions • Baumaße											
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
	10	17	10	18	22,5						0,03	
	15	17	16	24	28,5						0,04	
	20	18	20	30	36,5						0,07	
	25	22	26	35	44						0,10	
	32	25	32	41	50						0,14	
	40	26	38	48	56						0,17	
	50	28	50	61	68,5						0,25	
	65	32	66	79	86						0,42	
	80	37	81	93	100						0,54	
	100	44	100	114	121						0,89	

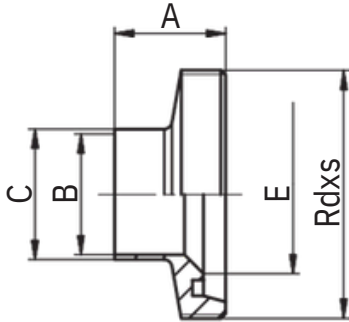
Welding union - complete Anschweißverschraubung-komplett	20120 T Dimensions • Baumaße											
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
	10	35	10	18		38				28x1/8"	0,19	
	15	35	16	24		44				34x1/4"	0,19	
	20	37	20	30		54				44x1/6"	0,34	
	25	45	26	35		63				52x1/6"	0,45	
	32	51	32	41		70				58x1/6"	0,57	
	40	53	38	48		78				65x1/6"	0,69	
	50	57	50	61		92				78x1/6"	0,96	
	65	65	66	79		112				95x1/6"	1,58	
	80	75	81	93		127				110x1/4"	2,20	
	100	89	100	114		148				130x1/4"	3,12	

Welding male Anschweißgewindestutzen	20100 T											
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
	10	21	10	18					4	28x1/8"	0,05	
	15	21	16	24					4	34x1/8"	0,07	
	20	24	20	30					6	44x1/6"	0,13	
	25	29	26	35					7	52x1/6"	0,17	
	32	32	32	41					7	58x1/6"	0,21	
	40	33	38	48					7	65x1/6"	0,27	
	50	35	50	61					7	78x1/6"	0,38	
	65	40	66	79					8	95x1/6"	0,61	
	80	45	81	93					8	110x1/4"	0,86	
	100	54	100	114					10	130x1/4"	1,15	

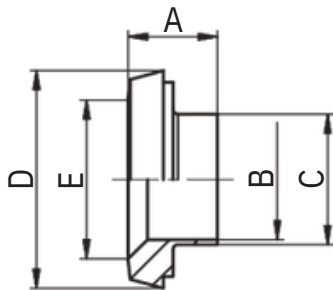
Welding liner Anschweißkegelstutzen	20110 T											
	Dimensions • Baumaße											
DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg		
	10	17	10	18	22,5						0,03	
	15	17	16	24	28,5						0,04	
	20	18	20	30	36,5						0,07	
	25	22	26	35	44						0,10	
	32	25	32	41	50						0,14	
	40	26	38	48	56						0,17	
	50	28	50	61	68,5						0,25	
	65	32	66	79	86						0,42	
	80	37	81	93	100						0,54	
	100	44	100	114	121						0,89	

Welding union - complete Anschweißverschraubung-komplett	20120 T											
	Dimensions • Baumaße											
DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg		
	10	35	10	18		38				28x1/8"	0,19	
	15	35	16	24		44				34x1/4"	0,19	
	20	37	20	30		54				44x1/6"	0,34	
	25	45	26	35		63				52x1/6"	0,45	
	32	51	32	41		70				58x1/6"	0,57	
	40	53	38	48		78				65x1/6"	0,69	
	50	57	50	61		92				78x1/6"	0,96	
	65	65	66	79		112				95x1/6"	1,58	
	80	75	81	93		127				110x1/4"	2,20	
	100	89	100	114		148				130x1/4"	3,12	

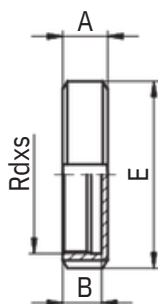
Reducing male part Reduziergewindestutzen	20230	Dimensions • Baumaße											
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
		20/10	24	10	13		20					44x1/6"	
		20/15	24	16	19		20					44x1/6"	
		25/10	29	10	13		26					52x1/6"	
		25/15	29	16	19		26					52x1/6"	
		25/20	29	20	23		26					52x1/6"	
		32/15	32	16	19		32					58x1/6"	
		32/20	32	20	23		32					58x1/6"	
		32/25	32	26	29		32					58x1/6"	
		40/20	33	20	23		38					65x1/6"	
		40/25	33	26	29		38					65x1/6"	
		40/32	33	32	35		38					65x1/6"	
		50/20	35	20	23		50					78x1/6"	
		50/25	35	26	29		50					78x1/6"	
		50/32	35	32	35		50					78x1/6"	
		50/40	35	38	41		50					78x1/6"	
		65/40	40	38	41		66					95x1/6"	
		65/50	40	50	53		66					95x1/6"	
		80/40	45	38	41		81					110x1/4"	
		80/50	45	50	53		81					110x1/4"	
		80/65	45	66	70		81					110x1/4"	
		100/50	54	50	53		100					130x1/4"	
		100/65	54	66	70		100					130x1/4"	
		100/80	54	81	85		100					130x1/4"	

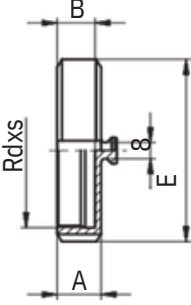


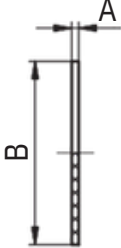
Reducing liner Reduzierkegelstutzen	20240	Dimensions • Baumaße											
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
		20/10	18	10	13	36,5	20						
		20/15	18	16	19	36,5	20						
		25/10	22	10	13	44	26						
		25/15	22	16	19	44	26						
		25/20	22	20	23	44	26						
		32/15	25	16	19	50	32						
		32/20	25	20	23	50	32						
		32/25	25	26	29	50	32						
		40/20	26	20	23	56	38						
		40/25	26	26	29	56	38						
		40/32	26	32	35	56	38						
		50/20	28	20	23	68,5	50						
		50/25	28	26	29	68,5	50						
		50/32	28	32	35	68,5	50						
		50/40	28	38	41	68,5	50						
		65/40	32	38	41	86	66						
		65/50	32	50	53	86	66						
		80/40	37	38	41	100	81						
		80/50	37	50	53	100	81						
		80/65	37	66	70	100	81						
		100/50	44	50	53	121	100						
		100/65	44	66	70	121	100						
		100/80	44	81	85	121	100						

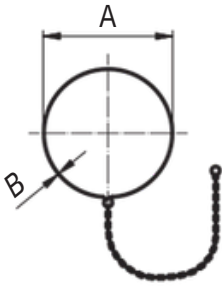


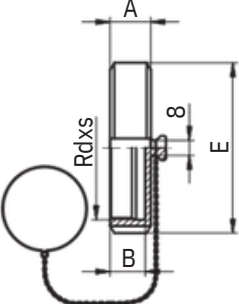
Blind nut Blindmutter	20250	Dimensions • Baumaße											
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
		10	18	15			38					28x1/8"	0,08
		15	18	15			44					34x1/8"	0,10
		20	20	17			54					44x1/6"	0,14
		25	21	18			63					52x1/6"	0,19
		32	21	18			70					58x1/6"	0,23
		40	21	18			78					65x1/6"	0,26
		50	22	19			92					78x1/6"	0,38
		65	25	21			112					95x1/6"	0,66
		80	29	25			127					110x1/4"	1,00
		100	31	26			148					130x1/4"	1,40
		125	35	30			178					160x1/4"	1,97
		150	40	34			210					190x1/4"	2,87

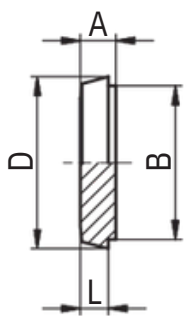


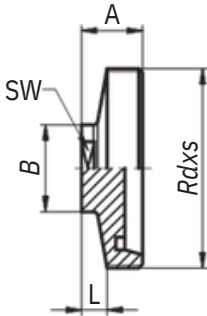
Blind nut with boss Blindmutter mit Knopf	20260										
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
	10	18	15			38				28x1/8"	0,09
	15	18	15			44				34x1/8"	0,11
	20	20	17			54				44x1/6"	0,15
	25	21	18			63				52x1/6"	0,20
	32	21	18			70				58x1/6"	0,24
	40	21	18			78				65x1/6"	0,27
	50	22	19			92				78x1/6"	0,39
	65	25	21			112				95x1/6"	0,67
	80	29	25			127				110x1/4"	1,01
	100	31	26			148				130x1/4"	1,41
	125	35	30			178				160x1/4"	1,98
	150	40	34			210				190x1/4"	2,88

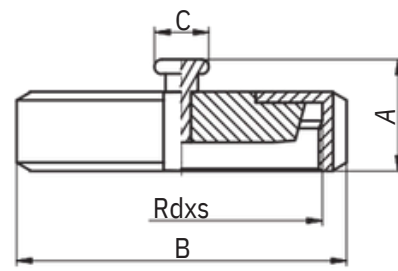
Gasket disc - blind nut Dichtscheibe - blindmutter	20270										
	Dimensions • Baumaße										
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
	10	3	28								
	15	3	34								
	20	3	44								
	25	3	52								
	32	3	58								
	40	3	65								
	50	3	78								
	65	3	95								
	80	3	110								
	100	3	130								
	125	4	160								
	150	4	190								

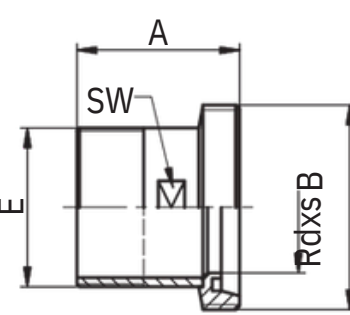
Chain with hook and eye Kette mit haken und öse	20280										
	Dimensions • Baumaße										
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
	10	18	1,25								
	15	24	1,25								
	20	28	1,25								
	25	34	1,25								
	32	41	1,25								
	40	46	1,25								
	50	57	1,25								
	65	75	1,4								
	80	93	1,6								
	100	113	1,6								
	125	136	3								
	150	166	3								

Blind nut - complete Blindmutter (komplett)	20290										
	Dimensions • Baumaße										
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
	10	18	15			38				28x1/8"	0,12
	15	18	15			44				34x1/8"	0,15
	20	20	17			54				44x1/6"	0,19
	25	21	18			63				52x1/6"	0,25
	32	21	18			70				58x1/6"	0,29
	40	21	18			78				65x1/6"	0,33
	50	22	19			92				78x1/6"	0,46
	65	25	21			112				95x1/6"	0,85
	80	29	25			127				110x1/4"	1,11
	100	31	26			148				130x1/4"	1,53
	125	35	30			178				160x1/4"	2,12
	150	40	34			210				190x1/4"	3,05

Liner blank Blindkegel	20300											
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	9	18		22,5				6		0,02
		15	9	24		28,5				6		0,04
		20	11	30		36,5				8		0,07
		25	13	35		44				10		0,13
		32	13	41		50				10		0,17
		40	13	48		56				10		0,22
		50	14	61		68,5				11		0,35
		65	16	79		86				12		0,67
		80	16	93		100				12		0,92
		100	20	114		121				15		1,34
		125	22	137		150				17		1,68
		150	24	163		176				18		4,30

Male part blank Blindgewinde	20330	Dimensions • Baumaße										
		DN	A	B	C	D	E	F	L	SW	threadDIN 405 Rd x s	kg
		10	22	22					10	19	28x1/8"	0,06
		15	22	25					10	22	34x1/8"	0,09
		20	24	25					10	22	44x1/6"	0,13
		25	24	34					10	27	52x1/6"	0,19
		32	24	34					10	27	58x1/6"	0,22
		40	24	34					10	27	65x1/6"	0,25
		50	24	34					10	27	78x1/6"	0,35
		65	28	34					10	27	95x1/6"	0,64
		80	30	34					10	27	110x1/4"	1,30
		100	30	34					10	27	130x1/4"	2,10

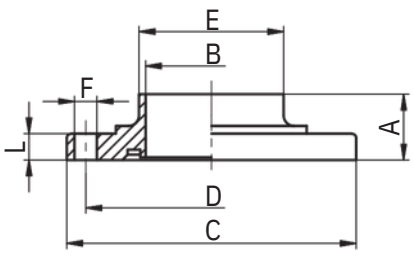
Blind nut with liner blank (complete) Blindmutter mit blindkegel (komplett)	20340	Dimensions • Baumaße										
		DN	A	B	C	D	E	F	L	SW	threadDIN 405 Rd x s	kg
		10	27	38	15						28x1/8"	0,12
		15	27	44	15						34x1/8"	0,15
		20	29	54	15						44x1/6"	0,22
		25	30	63	15						52x1/6"	0,32
		32	30	70	15						58x1/6"	0,40
		40	30	78	15						65x1/6"	0,49
		50	31	92	15						78x1/6"	0,73
		65	34	112	20						95x1/6"	1,25
		80	38	127	20						110x1/4"	1,70
		100	40	148	20						130x1/4"	2,79
		125	44	178	20						160x1/4"	4,39
	150	49	210	20						190x1/4"	6,54	

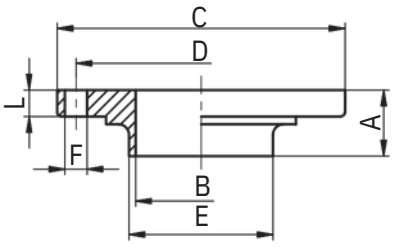
Male threaded outside Einschraub gewindestutzen	20350	Dimensions • Baumaße										
		DN	A	B	C	D	E	F	R	SW	threadDIN 405 Rd x s	kg
		10	40	10			3/8"			15	28x1/8"	0,06
		15	43	16			1/2"			20	34x1/8"	0,09
		20	47	20			3/4"			25	44x1/6"	0,15
		25	52	26			1"			32	52x1/6"	0,21
		25	54	26			3/4"			25	52x1/6"	0,20
		32	54	32			1"			32	58x1/6"	0,23
		32	54	32			1 1/4"			40	58x1/6"	0,25
		40	64	38			1 1/4"			40	65x1/6"	0,31
		40	54	38			1 1/2"			45	65x1/6"	0,32
		50	57	50			2"			57	78x1/6"	0,43
		65	66	66			2 1/2"			73	95x1/6"	0,65
		80	75	81			3"			86	110x1/4"	1,00
		100	83	100			4"			110	130x1/4"	1,33

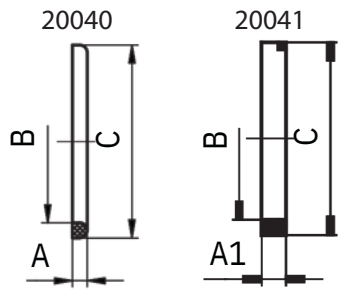
Liner threaded outside Einschraub kegelstutzen		20360										
		DN	A	B	C	D	E	F	R	SW	threadDIN 405 Rd x s	kg
	10	37	10		22,5	3/8"				15		0,04
	15	40	16		28,5	1/2"				20		0,06
	20	47	20		36,5	3/4"				25		0,11
	25	50	26		44	1"				32		0,16
	32	54	32		50	1 1/4"				40		0,19
	40	54	38		56	1 1/2"				45		0,25
	50	57	50		68,5	2"				57		0,35
	65	66	66		86	2 1/2"				73		0,55
	80	75	81		100	3"				86		0,72
	100	83	100		121	4"				110		1,12

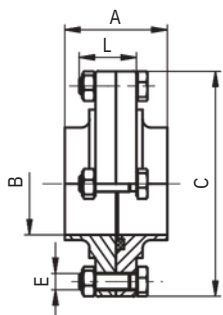
Male threaded inside Aufschraub gewindestutzen		20370										
		Dimensions • Baumaße										
		DN	A	B	C	D	E	F	R	SW	threadDIN 405 Rd x s	kg
	10	31	10	20,5		3/8"				19	28x1/8"	0,06
	15	31	16	25		1/2"				24	34x1/8"	0,08
	20	35	20	32		3/4"				30	44x1/6"	0,15
	25	38	26	37		1"				35	52x1/6"	0,19
	32	40	32	46		1 1/4"				44	58x1/6"	0,23
	40	41	38	52,5		1 1/2"				51	65x1/6"	0,28
	50	43	50	65,5		2"				63	78x1/6"	0,41
	65	50	66	81		2 1/2"				78	95x1/6"	0,60
	80	56	81	95		3"				92	110x1/4"	0,92
	100	55	100	125		4"				120	130x1/4"	1,32

Liner threaded inside Aufschraub kegelstutzen		20380										
		Dimensions • Baumaße										
		DN	A	B	C	D	E	F	R	SW	threadDIN 405 Rd x s	kg
	10	44	10	20,5		3/8"				19	28x1/8"	0,13
	15	50	16	25		1/2"				24	34x1/8"	0,17
	20	53	20	32		3/4"				30	44x1/6"	0,26
	25	53	26	37		1"				35	52x1/6"	0,35
	32	60	32	46		1 1/4"				44	58x1/6"	0,43
	40	65	38	52,5		1 1/2"				51	65x1/6"	0,52
	50	67	50	65,5		2"				63	78x1/6"	0,75
	65	76	66	81		2 1/2"				78	95x1/6"	1,27
	80	80	81	95		3"				92	110x1/4"	1,62
	100	100	100	125		4"				120	130x1/4"	2,54

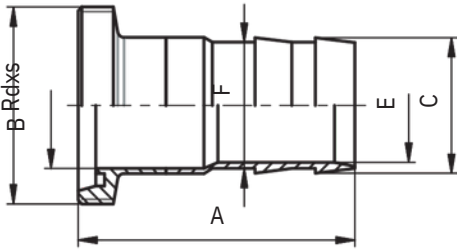
Flange PN 10 with groove KleinflanschPNmitnut	20400										
		DN	A	B	C	D	E	F	R	L	kg
	10	20	10	62	44	15	8,5x4		10	0,20	
	15	20	16	68	50	21	8,5x4		10	0,26	
	20	20	20	75	59	25	8,5x4		10	0,29	
	25	20	26	87	73	31	8,5x4		10	0,39	
	32	20	32	92	78	37	8,5x4		10	0,46	
	40	25	38	97	82,5	43	8,5x4		10	0,47	
	50	25	50	110	95,5	55	8,5x4		10	0,59	
	65	25	66	127	112,5	72	8,5x4		10	0,75	
	80	30	81	142	127,5	87	8,5x4		16	1,28	
	100	30	100	162	147,5	106	8,5x4		16	1,72	
	125	40	125	200	180	132	11x6		16	2,87	
	150	45	150	230	210	157	11x6		16	3,85	

Flange PN 10 without groove KleinflanschPNohneut	20410	Dimensions • Baumaße									
		DN	A	B	C	D	E	F	R	L	kg
	10	20	10	62	44	15	8,5x4		10	0,20	
	15	20	16	68	50	21	8,5x4		10	0,26	
	20	20	20	75	59	25	8,5x4		10	0,29	
	25	20	26	87	73	31	8,5x4		10	0,39	
	32	20	32	92	78	37	8,5x4		10	0,46	
	40	25	38	97	82,5	43	8,5x4		10	0,47	
	50	25	50	110	95,5	55	8,5x4		10	0,59	
	65	25	66	127	112,5	72	8,5x4		10	0,75	
	80	30	81	142	127,5	87	8,5x4		16	1,28	
	100	30	100	162	147,5	106	8,5x6		16	1,72	
	125	40	125	200	180	132	11x6		16	2,87	
	150	45	150	230	210	157	11x6		16	3,85	

Gasket Dichtung	20040	20041	Dimensions • Baumaße									
	DN	A	A1	B	C	kg	F	R	L	threadDIN 405 Rd x s	kg	
	10	4,5		12	20	0,0012					0,0012	
	15	4,5		18	26	0,0016					0,0016	
	20	4,5		23	33	0,0026					0,0026	
	25	5	8	30	40	0,0036					0,0036	
	32	5	8	36	46	0,0040					0,0040	
	40	5	8	42	52	0,0048					0,0048	
	50	5	8	54	64	0,0062					0,0062	
	65	5	8	71	81	0,0070					0,0070	
	80	5	8	85	95	0,0080					0,0080	
	100	6	8	104	114	0,0134					0,0134	
	125	7	8	130	142	0,0236					0,0236	
	150	7	8	155	167	0,0276					0,0276	

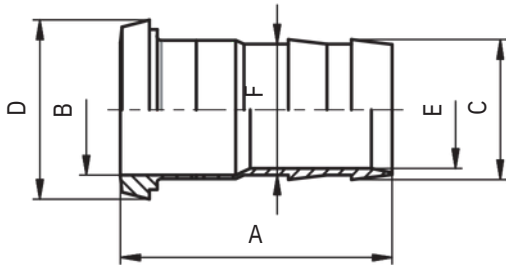
Flange connection PN 10 - complete FlanschverbindungPN10 - komplett	20420	Dimensions • Baumaße									
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s
	10	40	10	62		4 x M8			28	0,40	
	15	40	16	68		4 x M8			28	0,52	
	20	40	20	75		4 x M8			28	0,58	
	25	40	26	87		4 x M8			28	0,78	
	32	40	32	92		4 x M8			28	0,92	
	40	50	38	97		4 x M8			28	0,94	
	50	50	50	110		4 x M8			28	1,18	
	65	50	66	127		4 x M8			28	1,50	
	80	60	81	142		4 x M8			40	2,56	
	100	60	100	162		4 x M8			40	3,44	
	125	80	125	200		6 x M10			45	5,74	
	150	90	150	230		6 x M10			45	7,70	

Liner hose fitting - P Schlauchstutzen - G		20510											
DN	A	B	C	D	E	F	R	L	thread	DIN 405	kg		
											Rd x s		
10	60	10	12		7	10				28x1/8"	0,05		
15	61	16	18,5		13	15				34x1/8"	0,08		
20	65	20	23		16	20				44x1/6"	0,17		
25	70	26	28		20	25				52x1/6"	0,23		
32	84	32	35,6		27	32				58x1/6"	0,33		
40	95	38	43,6		35	40				65x1/6"	0,52		
50	110	50	53,6		45	50				78x1/6"	0,66		
65	133	66	66,6		58	65				95x1/6"	1,14		
80	145	81	83,6		75	80				110x1/4"	1,50		
100	161	100	103,6		95	100				130x1/4"	2,40		

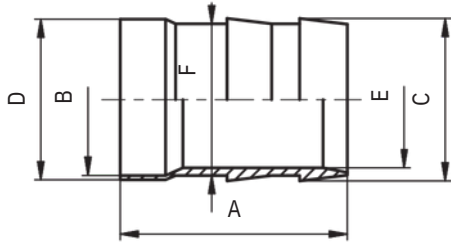


Liner hose fitting - K Schlauchstutzen - K		20520		Dimensions • Baumaße									
DN	A	B	C	D	E	F	R	L	thread	DIN 405	kg		
											Rd x s		
10	60	10	12	22,5	7	10					0,04		
15	61	16	18,5	28,5	13	15					0,06		
20	65	20	23	36,5	16	20					0,13		
25	70	26	28	44	20	25					0,19		
32	77	32	35,6	50	27	32					0,27		
40	88	38	43,6	56	35	40					0,42		
50	103	50	53,6	68,5	45	50					0,58		
65	125	66	66,6	86	58	65					1,08		
80	137	81	83,6	100	75	80					1,32		
100	151	100	103,6	121	95	100					2,13		

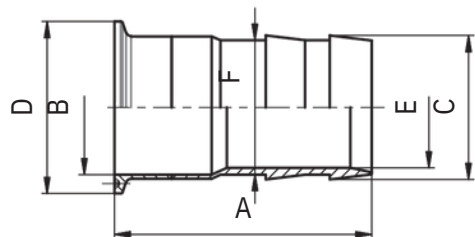
20520



Liner hose fitting - S Schlauchstutzen - S		20530		Dimensions • Baumaße									
DN	A	B	C	D	E	F	R	L	thread	DIN 405	kg		
											Rd x s		
10	43	10	12	13	7	10					0,02		
15	44	16	18,5	19	13	15					0,04		
20	47	20	23	23	16	20					0,06		
25	48	26	28	29	20	25					0,06		
32	52	32	35,6	35	27	32					0,08		
40	62	38	43,6	41	35	40					0,12		
50	75	50	53,6	53	45	50					0,22		
65	93	66	66,6	70	58	65					0,58		
80	100	81	83,6	85	75	80					0,68		
100	107	100	103,6	104	95	100					1,72		

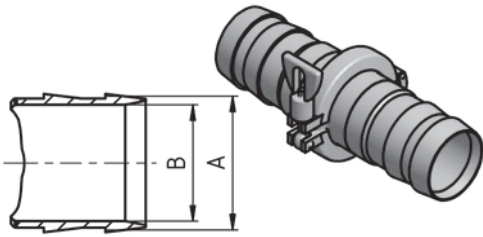


Liner hose fitting - C Schlauchstutzen - C		20540		Dimensions • Baumaße									
DN	A	B	C	D	E	F	R	L	thread	DIN 405	kg		
											Rd x s		
10	61	10	12	34	7	10					0,05		
15	62	16	18,5	34	13	15					0,08		
20	65	20	23	34	16	20					0,17		
25	69,5	26	28	50,5	20	25					0,23		
32	73,5	32	35,6	50,5	27	32					0,33		
40	83,5	38	43,6	50,5	35	40					0,52		
50	96,5	50	53,6	64	45	50					0,66		
65	121	66	66,6	91	58	65					1,14		
80	128	81	83,6	106	75	80					1,50		
100	135	100	103,6	119	95	100					2,40		



Connecting clamp/clamp for hoses
CupplungsstückC/Czuschlauch

20549

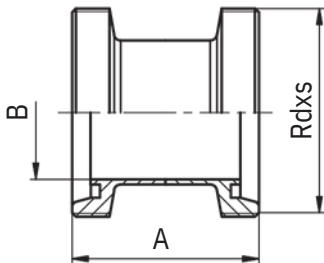


DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	12	7								0,30
15	18,5	13								0,32
20	23	16								0,36
25	28	20								0,41
32	35,6	27								0,43
40	43,6	35								0,49
50	53,6	45								0,61
65	66,6	58								1,47
80	83,6	75								1,63
100	103,6	95								2,71

Connecting piece G - G
KupplungsstückG - G

20570

Dimensions • Baumaße

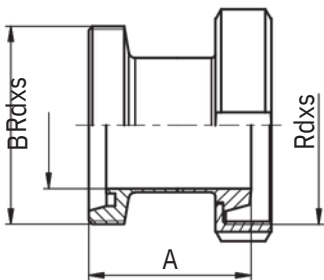


DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	42	10							28x1/8"	0,09
15	42	16							34x1/8"	0,11
20	48	20							44x1/6"	0,21
25	58	26							52x1/6"	0,28
32	64	32							58x1/6"	0,36
40	66	38							65x1/6"	0,46
50	70	50							78x1/6"	0,67
65	80	66							95x1/6"	1,06
80	90	81							110x1/4"	1,41
100	108	100							130x1/4"	2,13

Connecting piece K/M - G
KupplungsstückK/M - G

20580

Dimensions • Baumaße

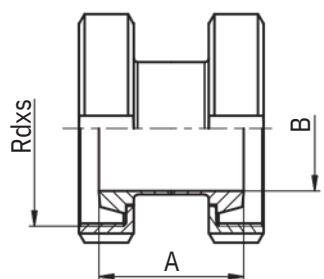


DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	42	10							28x1/8"	0,13
15	42	16							34x1/8"	0,16
20	48	20							44x1/6"	0,28
25	58	26							52x1/6"	0,39
32	64	32							58x1/6"	0,47
40	66	38							65x1/6"	0,55
50	70	50							78x1/6"	0,77
65	80	66							95x1/6"	1,24
80	90	81							110x1/4"	1,73
100	108	100							130x1/4"	2,40

Connecting piece K/M - K/M
KupplungsstückK/M - K/M

20590

Dimensions • Baumaße



DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	34	10							28x1/8"	0,18
15	34	16							34x1/8"	0,22
20	36	20							44x1/6"	0,38
25	44	26							52x1/6"	0,54
32	50	32							58x1/6"	0,66
40	52	38							65x1/6"	0,76
50	56	50							78x1/6"	1,06
65	64	66							95x1/6"	1,72
80	74	81							110x1/4"	2,36
100	88	100							130x1/4"	3,38

Recucing piece G - G Reduzierstück G - G		20630											
		DN	A	B	C	D	E	F	threadDIN 405 Rd x s	threadDIN 405 Rd x s1	kg		
		32/25	55	32	26				58x1/6"	52x1/6"	0,36		
		40/25	66	38	25				65x1/6"	52x1/6"	0,40		
		40/32	55	38	32				65x1/6"	58x1/6"	0,46		
		50/32	78	50	32				78x1/6"	58x1/6"	0,61		
		50/40	68	50	38				78x1/6"	65x1/6"	0,67		
		65/40	98	66	38				95x1/6"	65x1/6"	1,00		
		65/50	77	66	50				95x1/6"	78x1/6"	1,06		
		80/50	104	81	50				110x1/4"	78x1/6"	1,37		
		80/65	77	81	66				110x1/4"	95x1/6"	1,41		
		100/65	116	100	66				130x1/4"	95x1/6"	2,08		
100/80	89	100	81				130x1/4"	110x1/4"	2,13				

Recucing piece G - K/M Reduzierstück G - K/M		20640		Dimensions • Baumaße									
		DN	A	B	C	D	E	F	threadDIN 405 Rd x s	threadDIN 405 Rd x s1	kg		
		32/25	51	32	26				58x1/6"	52x1/6"	0,47		
		40/25	62	38	26				65x1/6"	52x1/6"	0,50		
		40/32	59	38	32				65x1/6"	58x1/6"	0,55		
		50/32	74	50	32				78x1/6"	58x1/6"	0,71		
		50/40	64	50	38				78x1/6"	65x1/6"	0,77		
		65/40	94	66	38				95x1/6"	65x1/6"	1,19		
		65/50	73	66	50				95x1/6"	78x1/6"	1,24		
		80/50	100	81	50				110x1/4"	78x1/6"	1,68		
		80/65	73	81	66				110x1/4"	95x1/6"	1,73		
		100/65	112	100	66				130x1/4"	95x1/6"	2,35		
100/80	85	100	81				130x1/4"	110x1/4"	2,40				

Recucing piece K/M - K/M Reduzierstück K/M - K/M		20650		Dimensions • Baumaße									
		DN	A	B	C	D	E	F	threadDIN 405 Rd x s	threadDIN 405 Rd x s1	kg		
		32/25	47	32	26				58x1/6"	52x1/6"	0,66		
		40/25	58	38	26				65x1/6"	52x1/6"	0,71		
		40/32	47	38	32				65x1/6"	58x1/6"	0,76		
		50/32	70	50	32				78x1/6"	58x1/6"	1,01		
		50/40	60	50	38				78x1/6"	65x1/6"	1,06		
		65/40	90	66	38				95x1/6"	65x1/6"	1,67		
		65/50	69	66	50				95x1/6"	78x1/6"	1,72		
		80/50	96	81	50				110x1/4"	78x1/6"	2,30		
		80/65	69	81	66				110x1/4"	95x1/6"	2,36		
		100/65	107	100	66				130x1/4"	95x1/6"	3,32		
100/80	80	100	81				130x1/4"	110x1/4"	3,38				

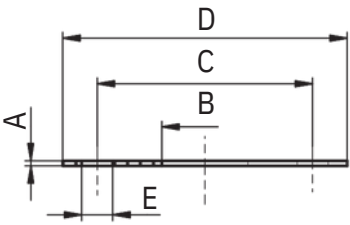
Recucing piece K/M - G Reduzierstück K/M - G		20660		Dimensions • Baumaße									
		DN	A	B	C	D	E	F	threadDIN 405 Rd x s	threadDIN 405 Rd x s1	kg		
		32/25	51	32	26				58x1/6"	52x1/6"	0,47		
		40/25	62	38	25				65x1/6"	52x1/6"	0,50		
		40/32	59	38	32				65x1/6"	58x1/6"	0,55		
		50/32	74	50	32				78x1/6"	58x1/6"	0,71		
		50/40	64	50	38				78x1/6"	65x1/6"	0,77		
		65/40	94	66	38				95x1/6"	65x1/6"	1,19		
		65/50	73	66	50				95x1/6"	78x1/6"	1,24		
		80/50	100	81	50				110x1/4"	78x1/6"	1,68		
		80/65	73	81	66				110x1/4"	95x1/6"	1,73		
		100/65	112	100	66				130x1/4"	95x1/6"	2,35		
100/80	85	100	81				130x1/4"	110x1/4"	2,40				

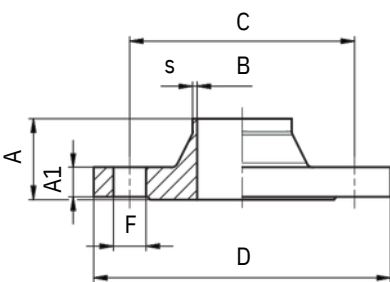
Flange PN 10 Flansch PN 10	20700											
	DIN 2576	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	14	10	12,2	90	60	14x4				0,50
		15	14	16	18,2	95	65	14x4				0,60
		20	14	20	22,2	105	75	14x4				0,85
		25	14	26	28,2	115	85	14x4				1,11
		32	14	32	34,2	140	100	18x4				1,64
		40	14	38	40,2	150	110	18x4				1,80
		50	14	50	52,2	165	125	18x4				2,30
		65	14	66	70,3	185	145	18x4				2,88
		80	16	81	85,3	200	160	18x8				3,20
		100	16	100	104,3	220	180	18x8				4,00
		125	20	125	129,5	250	210	18x8				5,00
		150	24	150	154,5	285	240	22x8				6,70

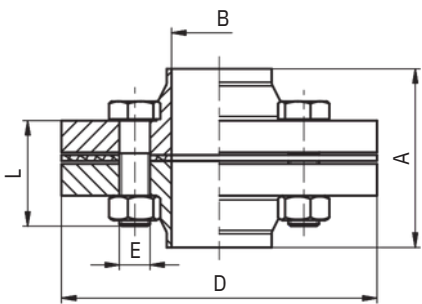
Flange PN 10 ECO Flansch PN 10 ECO	20700 ECO	Dimensions • Baumaße										
	DIN 2576	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		25	10	29	85	115	14x4					0,69
		32	10	35	100	140	18x4					1,00
		40	10	41,5	110	150	18x4					1,16
		50	10	52,8	125	165	18x4					1,23
		65	10	71,2	145	185	18x4					1,68
		80	10	86,5	160	200	18x8					1,62
		100	10	105,5	180	220	18x8					1,89
		125	12	131	210	250	18x8					3,33
		150	12	155,5	240	285	22x8					4,12

Flange connection PN 10 - complete Flanschverbindung PN10 - komplett	20720	Dimensions • Baumaße										
	DIN 2576	DN	A	B	C	D	E	F	R	L	Rd x s	kg
		10	31	10		90	4 x M12			40		1,30
		15	31	16		95	4 x M12			40		1,40
		20	31	20		105	4 x M12			45		2,00
		25	31	26		115	4 x M12			45		2,30
		32	31	32		140	4 x M16			50		3,50
		40	31	38		150	4 x M16			50		4,00
		50	31	50		165	4 x M16			55		5,10
		65	32	66		185	4 x M16			55		6,00
		80	36	81		200	8 x M16			55		7,50
		100	36	100		220	8 x M16			55		8,30
		125	44	125		250	8 x M16			60		13,00
		150	52	150		285	8 x M20			65		16,70

Flange connection PN 10 ECO- complete Flanschverbindung PN 10 ECO - kompltt	20720 ECO	Dimensions • Baumaße										
	DIN 2576	DN	A1	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	23	17,7		90	4 x M12			35		1,20
		15	23	18,6		95	4 x M12			35		1,30
		20	23	26		105	4 x M12			35		1,60
		25	23	31		115	4 x M12			35		1,80
		32	23	39		140	4 x M16			40		2,80
		40	23	45,5		150	4 x M16			40		3,10
		50	23	54,5		165	4 x M16			40		3,80
		65	24	71		185	4 x M16			40		4,20
		80	24	85		200	8 x M16			40		4,80
		100	24	105,5		220	8 x M16			40		5,30
		125	28	130,5		250	8 x M16			45		8,30
		150	28	155,5		285	8 x M20			50		11,00

Flat seal for flange PN 10 Flanschdichtung PN 10	20710	Dimensions • Baumaße										
	DIN 2576	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	3	10	60	90	14x4					
		15	3	16	65	95	14x4					
		20	3	20	75	105	14x4					
		25	3	26	85	115	14x4					
		32	3	32	100	140	18x4					
		40	3	38	110	150	18x4					
		50	3	50	125	165	18x4					
		65	4	66	145	185	18x4					
		80	4	81	160	200	18x8					
		100	4	100	180	220	18x8					
		125	4	125	210	250	18x8					
	150	4	150	240	285	22x8						

Flange PN 16 Flansch PN 16	20730	Dimensions • Baumaße										
	DIN 2633	DN	A	A1	B	C	D	F	s			kg
		10	35	14	10	60	90	14x4	1,5			0,58
		15	35	14	16	65	95	14x4	1,5			0,65
		20	38	16	20	75	105	14x4	1,5			0,95
		25	38	16	26	85	115	14x4	1,5			1,14
		32	40	16	32	100	140	18x4	1,5			1,60
		40	42	16	38	110	150	18x4	1,5			1,80
		50	45	18	50	125	165	18x4	1,5			2,53
		65	45	18	66	145	185	18x4	2			3,06
		80	50	20	81	160	200	18x8	2,5			3,70
		100	52	20	100	180	220	18x8	2,5			4,62
		125	55	22	125	210	250	18x8	2,5			6,30
	150	55	22	150	240	285	22x8	2,5			7,75	

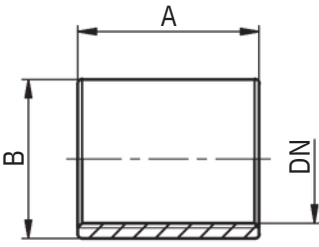
Flange connection PN 16 - complete FlanschverbindungPN16 - komplett	20740	Dimensions • Baumaße										
	DIN 2633	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	73	10		90	4 x M12			45		1,16
		15	73	16		95	4 x M12			45		1,30
		20	79	20		105	4 x M12			45		1,90
		25	79	26		115	4 x M12			50		2,28
		32	83	32		140	4 x M16			50		3,20
		40	88	38		150	4 x M16			50		3,60
		50	94	50		165	4 x M16			55		5,06
		65	94	66		185	4 x M16			55		6,12
		80	104	81		200	8 x M16			60		7,40
		100	108	100		220	8 x M16			60		9,24
		125	114	125		250	8 x M16			65		12,60
	150	114	150		285	8 x M20			70		15,5	

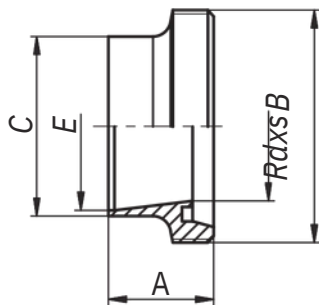
Flange AL Flansch AL	20780 AL										
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
	10	14	19	60	90	14x4					0,59
	15	14	24	65	95	14x4					0,68
	20	16	24	75	105	14x4					0,80
	25	16	36	85	115	14x4					1,11
	32	16	46	100	140	18x4					1,64
	40	16	54	110	150	18x4					1,86
	50	16	65	125	165	18x4					2,20
	65	16	81	145	185	18x4					2,62
	80	18	94	160	200	18x8					3,32
	100	18	119	180	220	18x8					3,67
	125	18	145	210	250	18x8					4,54
	150	18	173	240	285	22x8					5,60

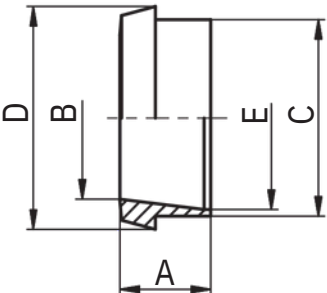
Welding neck DIN Vorschweissbördel DIN	20790 Dimensions • Baumaße											
	DIN	DN	A	B	C	D	E	F	R	s	threadDIN 405 Rd x s	kg
		10		12		40				1,5		
		15		18		45				1,5		
		20		23		58				1,5		
		25		28		68				1,5		
		32		35		78				1,5		
		40		40		88				1,5		
		50		52		102				1,5		
		65		70		122				2,0		
		80		85		138				2,0		
		100		104		158				2,0		
		125		129		188				2,0		
		150		154		212				2,0		

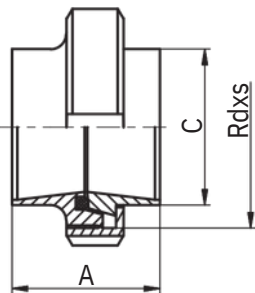
Welding neck ISO Vorschweissbördel ISO	20795 Dimensions • Baumaße											
	ISO	DN	A	B	C	D	E	F	R	s	threadDIN 405 Rd x s	kg
		10		17,2		40				2		
		15		21,3		45				2		
		20		26,9		58				2		
		25		33,7		68				2		
		32		42,4		78				2		
		40		48,3		88				2		
		50		60,3		102				2		
		65		76,1		122				2		
		80		88,9		138				3		
		100		114,3		158				3		
		125		139,7		188				3		
		150		168,3		212				3		

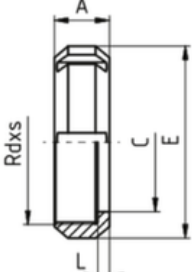
Nipple Nippel	20800 Dimensions • Baumaße										
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
	1/8"	30	7		10,5				10		0,02
	1/4"	30	9,3		13,6				11		0,02
	3/8"	30	13		17,1				10,5		0,03
	1/2"	35	16		21,5				15,5		0,04
	3/4"	40	21,6		27				16,5		0,06
	1"	40	27,5		33,6				20		0,10
	1 1/4"	50	36,6		42,2				20		0,15
	1 1/2"	50	41,5		48,5				22,5		0,16
	2"	50	53,6		60,6				25,5		0,22
	2 1/2"	60	68,9		76,1				30		0,42
	3"	70	81,5		89,4				34		0,68
	4"	80	105,8		114,3				39		0,97

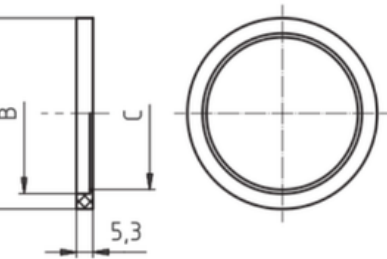
Muff Muffe	20840											
	ISO	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		1/8"	15	15								0,02
		1/4"	25	18								0,02
		3/8"	26	20,5								0,03
		1/2"	33	25								0,08
		3/4"	35	32								0,11
		1"	42	37								0,17
		1 1/4"	45	46								0,32
		1 1/2"	45	52,5								0,40
		2"	55	65,5								0,48
		2 1/2"	63	81								1,20
		3"	69	95								1,57
		4"	80	114,6								2,40

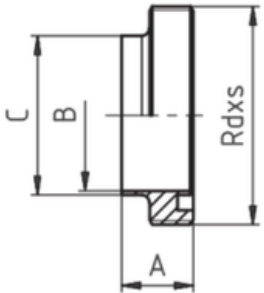
Welding male ISO Anschweißgewindestutzen ISO	21010	Dimensions • Baumaße										
	ISO	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	21	10	18		14			4	28x1/8"	0,04
		15	21	16	21,3		18,1			4	34x1/8"	0,05
		20	24	20	26,9		23,7			6	44x1/6"	0,10
		25	29	26	33,7		29,7			7	52x1/6"	0,13
		32	32	32	42,4		38,4			7	58x1/6"	0,16
		40	33	38	48,3		44,3			7	65x1/6"	0,21
		50	35	50	60,3		56,3			7	78x1/6"	0,30
		65	40	66	76,1		71,5			8	95x1/6"	0,45
		80	45	81	88,9		84,3			8	110x1/4"	0,60
		100	54	100	114,3		109,1			10	130x1/4"	0,78

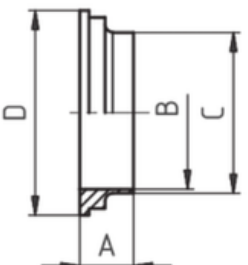
Welding liner ISO Anschweißkegelstutzen ISO	21020	Dimensions • Baumaße										
	ISO	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	17	10	18	22,5	14					0,02
		15	17	16	21,3	28,5	18,1					0,03
		20	18	20	26,9	36,5	23,7					0,06
		25	22	26	33,7	44	29,7					0,09
		32	25	32	42,4	50	38,4					0,11
		40	26	38	48,3	56	44,3					0,14
		50	28	50	60,3	68,5	56,3					0,21
		65	32	66	76,1	86	71,5					0,32
		80	37	81	88,9	100	84,3					0,39
		100	44	100	114,3	121	109,1					0,59

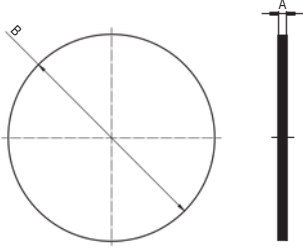
Welding union - complete ISO Anschweißverschraubung-komplett ISO	21030	Dimensions • Baumaße										
	ISO	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	34		18						28x1/8"	0,15
		15	34		21,3						34x1/8"	0,18
		20	36		26,9						44x1/6"	0,30
		25	45		33,7						52x1/6"	0,42
		32	51		42,4						58x1/6"	0,51
		40	53		48,3						65x1/6"	0,61
		50	57		60,3						78x1/6"	0,84
		65	65		76,1						95x1/6"	1,31
		80	75		88,9						110x1/4"	1,80
		100	89		114,3						130x1/4"	2,66

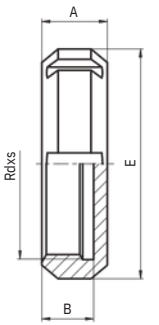
Nut SMS Nutmutter SMS	21080											
	SMS	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
		25	19		32		51			4	40 x 1/6"	0,11
		38	23		48		74			4	60 x 1/6"	0,26
		51	24		60,5		84			5	70 x 1/6"	0,31
		63,5	28		74		100			5	85 x 1/6"	0,41
		76	30		87		114			6	98 x 1/6"	0,57
		101,6	31		113		138			5	125 x 1/4"	1,20
		104	31		113		138			5	125 x 1/4"	1,22

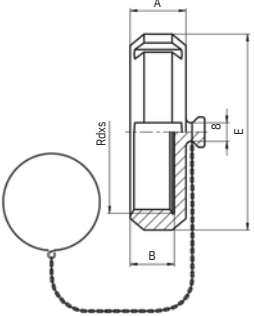
Gasket SMS Dichtung SMS	21090	Dimensions • Baumaße										
	SMS	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
		25		25,1	22,8	31,8						
		38		38,1	35,8	47,8						
		51		51,1	48,8	60,8						
		63,5		63,6	61	73,3						
		76		76,1	73,4	85,8						
		104		104	100,5	115,7						

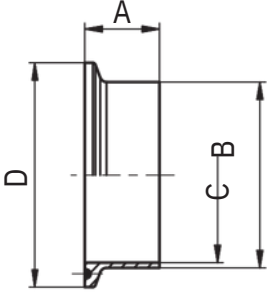
Welding male SMS Anschweißgewindestutzen SMS	21100	Dimensions • Baumaße										
	SMS	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
		25	19	22,5	25						40x1/6	0,05
		38	23	35,5	38						60x1/6	0,17
		51	23	48,5	51						70x1/6	0,18
		63,5	27	60,5	63,5						85x1/6	0,35
		76	27	72,9	76,1						98x1/6	0,44
		101,6	30	97,6	101,6						125x1/4	1,31
		104	30	100	104						125x1/4	1,32

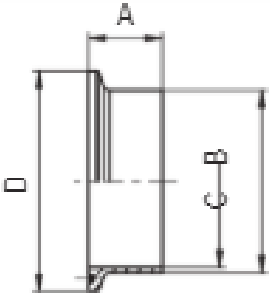
Welding liner SMS Anschweißkegelstutzen SMS	21110	Dimensions • Baumaße										
	SMS	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
		25	15,5	22,5	25	35,5						0,02
		38	16	35,5	38	55						0,04
		51	17	48,5	50,8	65						0,06
		63,5	17	60,5	63,5	80						0,08
		76	19	72,9	76,1	93						0,12
		101,6	19	97,6	101,6	118						0,27
		104	19	100	104	118						0,29

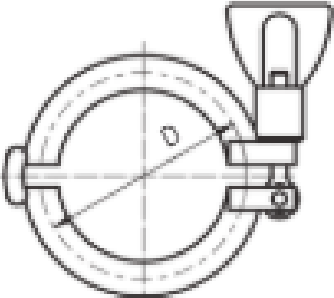
Gasket for SMS blind nuts Dichtung für SMS-Blindmuttern	21170											
	DIN 11 851	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		25	3	39								
		38	3	58								
		51	3	68								
		63,5	3	84								
		76	3	97								
		101,6	3	125								
		104	3	130								

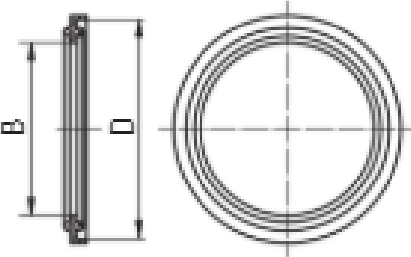
Blind nut SMS Blindmutter SMS	21180	Dimensions • Baumaße										
	DIN 11 851	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		25	19	15			51				40x1/6	
		38	23	19			74				60x1/6	
		51	24	19			84				70x1/6	
		63,5	28	23			100				85x1/6	
		76	30	24			114				98x1/6	
		101,6	31	26			138				124x1/4	

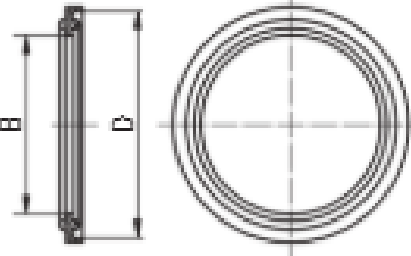
Blind nut SMS with chain Blindmutter SMS mit Kette	21190	Dimensions • Baumaße										
	DIN 11 851	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		25	19	15			51				40x1/6	
		38	23	19			74				60x1/6	
		51	24	19			84				70x1/6	
		63,5	28	23			100				85x1/6	
		76	30	24			114				98x1/6	
		101,6	31	26			138				124x1/4	

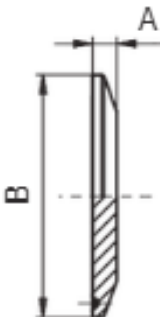
Clamp ferrule - S TC-Klemmstutzen - S	21200	Dimensions • Baumaße											
	DIN 32 676	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
		10	18	10	13	34						0,03	
		15	18	16	19	34							0,03
		20	18	20	23	34							0,03
		25	21,5	26	29	50,5							0,07
		32	21,5	32	35	50,5							0,07
		40	21,5	38	41	50,5							0,07
		50	21,5	50	53	64							0,07
		65	28	66	70	91							0,10
		80	28	81	85	106							0,20
		100	28	100	104	119							0,22
		125	28	125	129	155							0,52
	150	28	150	154	183							0,70	

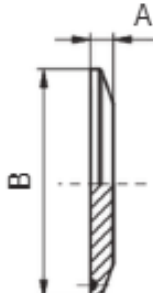
Clamp ferrule - S SMS TC-Klemmstutzen - SSMS	21202	Dimensions • Baumaße									
	SMS	DN- SMS	A	B	C	D	F	R	L	threadDIN 405 Rd x s	kg
		1/2"	12,7	21,5	9,4	12,7	25				0,03
		1/2"	12,7	28,6	9,4	12,7	25				0,03
		3/4"	19,05	21,5	15,75	19,05	25				0,03
		3/4"	19,05	28,6	15,75	19,05	25				0,03
		1"	25,4	21,5	22,1	25,4	50,5				0,07
		1"	25,4	28,6	22,1	25,4	50,5				0,07
		1 1/2"	38,1	28	35,5	38,1	50,5				0,07
		2"	51	28	48,5	51	64				0,07
		2 1/2"	63,5	28	60,5	63,5	77,5				0,1
		3"	76,1	28	72,9	76,1	91				0,2
		4"	101,6	28	97,6	101,6	119				0,22

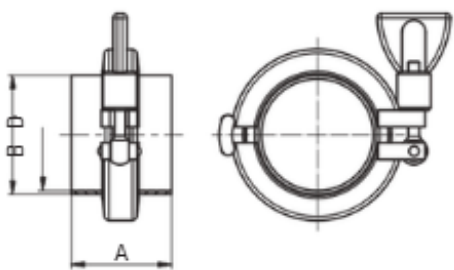
Clamp SMS TC-Klammerleichte Ausführung SMS	21220	Dimensions • Baumaße									
	DIN 32 676	DN	DIN	SMS	D	D	DN	SMS	DIN	D	
		1/2"-3/4"	-	12,7	25		125	-	125	155	
		1/2"-3/4"	-	19,05	25		6"	-	-	166,8	
		10-20	10-20	-	34		150	-	150	183	
		1"-1 1/2"	25	25	50,5		8"	-	-	217,6	
		1"-1 1/2"	32	-	50,5		200	-	200	233,5	
		1"-1 1/2"	40	38	50,5		250	-	250	268	
		2"	50	51	64		300	-	300	318,5	
		2 1/2"	-	63,5	77,5						
		3"	65	76,1	91						
		80	80	-	106						
		4"	100	101,6	119						

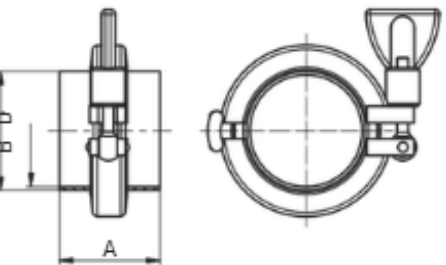
Clamp gasket Clamp Dichtung	21230	Dimensions • Baumaße										
	DIN 32 676	DN	A	B	C	D	E	F	R	L	DIN 405 Rd x s	kg
		10		10,2		34						
		15		16,2		34						
		20		20,2		34						
		25		26,2		50,5						
		32		32,2		50,5						
		40		38,2		50,5						
		50		50,2		64						
		65		66,2		91						
		80		81,2		106						
		100		100,2		119						

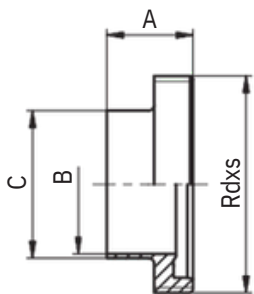
Clamp gasket SMS Clamp Dichtung SMS	21232	Dimensions • Baumaße									
	SMS	DN- SMS	B	D	E	F	R	L	DIN 405 Rd x s	kg	
		1/2"	12,7	9,3	25						
		3/4"	19,05	15,7	25						
		1"	25	22,3	50,5						
		1 1/2"	38,1	35	50,5						
		2"	51	47,7	64						
		2 1/2"	63,5	60,4	77,5						
		3"	76,1	73,1	91						
		4"	101,6	97,6	119						

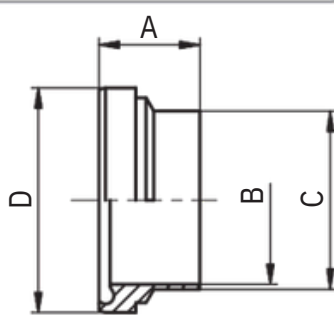
Clamp blank TC-Blindklemmstutzen	21240											
	DIN 32 676	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	6,35	34								0,04
		15	6,35	34								0,04
		20	6,35	34								0,04
		25	6,35	50,5								0,08
		32	6,35	50,5								0,08
		40	6,35	50,5								0,08
		50	6,35	64								0,14
		65	6,35	91								0,28
		80	6,35	106								0,46
		100	7,95	119								0,60
		125	7,95	155								1,15
		150	11,00	183								2,20

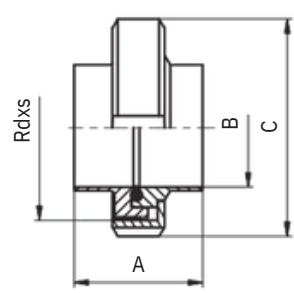
Clamp blank DIN/SMS TC-Blindklemmstutzen DIN/SMS	21242	Dimensions • Baumaße										
	SMS	DN- SMS	A	B	C	E	F	R	L	DIN 405 Rd x s	kg	
		1/2"	12,7	6,35	25						0,04	
		3/4"	19,05	6,35	25						0,04	
		1"	25	6,35	50,5						0,08	
		1 1/2"	38,1	6,35	50,5						0,08	
		2"	51	6,35	64						0,14	
		2 1/2"	63,5	6,35	77,5						0,28	
		3"	76,1	6,35	91						0,46	
		4"	101,6	7,95	119						0,6	

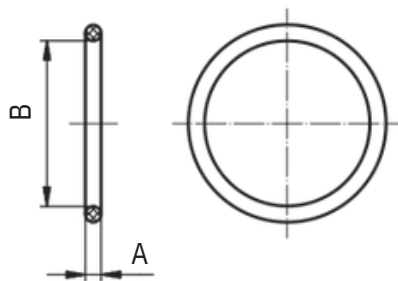
Clamp union - S - DIN - complete Clampverbindung - S - DIN - komplett	21250	Dimensions • Baumaße										
	DIN 32 676	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		10	45	10		13						0,28
		15	45	16		19						0,28
		20	45	20		23						0,30
		25	45	26		29						0,35
		32	45	32		35						0,35
		40	45	38		41						0,37
		50	45	50		53						0,39
		65	58	66		70						0,89
		80	58	81		85						0,95
		100	58	100		104						0,99
		125	58	125		129						1,15
		150	58	150		154						1,30

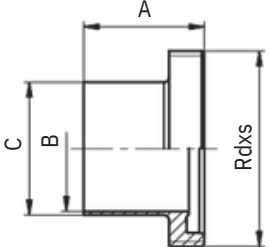
Clamp union - S - SMS - complete Clampverbindung - S - SMS - komplett	21252	Dimensions • Baumaße										
	SMS	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		25	43	22,5		25						0,35
		38	43	35,5		38,1						0,37
		51	43	48,5		51						0,39
		63,5	56	60,5		63,5						0,89
		76	56	72,9		76,1						0,95
		101,6	56	97,6		101,6						0,99

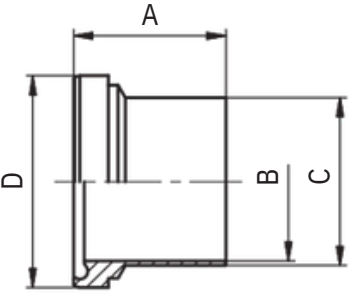
Welding male Anschweißgewindestutzen	22300	Anschweißerschraubung 22320, DIN 11 853-1											
	DIN 11 853		DN	A	B	C	D	E	F	R	L	závit DIN 405 Rd x s	kg
			10	19	10	13						28 x 1/8"	0,04
			15	19	16	19						34 x 1/8"	0,06
			20	21	20	23						44 x 1/6"	0,11
			25	26	26	29						52 x 1/6"	0,15
			32	30	32	35						58 x 1/6"	0,17
			40	31	38	41						65 x 1/6"	0,20
			50	31	50	53						78 x 1/6"	0,26
			65	36	66	70						95 x 1/6"	0,40
			80	42	81	85						110 x 1/4"	0,63
			100	50	100	104						130 x 1/4"	0,76

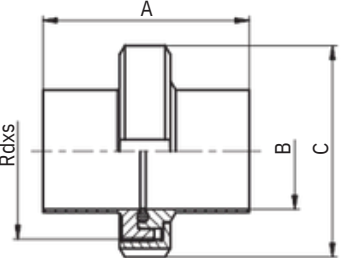
Welding liner Anschweißkegelstutzen	22310	Welding union 22320, DIN 11 853-1 Anschweißerschraubung 22320, DIN 11 853-1												
	DIN 11 853		DN	A	B	C	D	E	F	R	L	závit DIN 405 Rd x s	kg	
			10	17	10	13	21,9						0,02	
			15	17	16	19	27,9							0,03
			20	18	20	23	35,9							0,05
			25	22	26	29	42,9							0,08
			32	25	32	35	48,9							0,09
			40	26	38	41	54,9							0,11
			50	30	50	53	66,9							0,16
			65	34	66	70	84,9							0,30
			80	38	81	85	98,9							0,35
			100	46	100	104	118,9							0,57

Welding union - complete Anschweißerschraubung - komplett	22320	Welding union 22320, DIN 11 853-1 Anschweißerschraubung 22320, DIN 11 853-1											
	DIN 11 853		DN	A	B	C	D	E	F	R	L	závit DIN 405 Rd x s	kg
			10	32	10	38						28 x 1/8"	0,14
			15	32	16	44						34 x 1/8"	0,18
			20	34	20	54						44 x 1/6"	0,30
			25	42	26	63						52 x 1/6"	0,41
			32	48	32	70						58 x 1/6"	0,48
			40	50	38	78						65 x 1/6"	0,57
			50	54	50	92						78 x 1/6"	0,78
			65	62	66	112						95 x 1/6"	1,27
			80	72	81	127						110 x 1/4"	1,76
			100	86	100	148						130 x 1/4"	2,40

Gasket Dichtung	72020	Dimensions • Baumaße											
	DIN 11 853		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
			10	3,5	12								
			15	3,5	18								
			20	3,5	22								
			25	3,5	28								
			32	5	34								
			40	5	40								
			50	5	52								
			65	5	68								
			80	5	83								
			100	5	102								

Welding male Anschweißgewindestutzen	22460	Anschweißerschraubung 22490, DIN 11 864-1									
	DIN 11 864-1-A										
	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
	10	41	10	13						28 x 1/8"	0,05
	15	41	16	19						34 x 1/8"	0,07
	20	43	20	23						44 x 1/6"	0,13
	25	43	26	29						52 x 1/6"	0,16
	32	48	32	35						58 x 1/6"	0,19
	40	48	38	41						65 x 1/6"	0,22
	50	48	50	53						78 x 1/6"	0,30
	65	60	66	70						95 x 1/6"	0,48
	80	64	81	85						110 x 1/4"	0,72
	100	64	100	104						130 x 1/4"	0,84

Welding liner Anschweißkegelstutzen	22470	Welding union 22490, DIN 11 864-1									
	DIN 11 864-1-A	Anschweißerschraubung 22490, DIN 11 864-1									
	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
	10	39	10	13	21,9						0,03
	15	39	16	19	27,9						0,04
	20	38	20	23	35,9						0,06
	25	40	26	29	42,9						0,10
	32	47	32	35	48,9						0,12
	40	47	38	41	54,9						0,14
	50	48	50	53	66,9						0,20
	65	61	66	70	84,9						0,38
	80	61	81	85	98,9						0,44
	100	66	100	104	118,9						0,67

Welding union - complete Anschweißerschraubung-komplett	22490	Welding union 22490, DIN 11 864-1									
	DIN 11 864-1-A	Anschweißerschraubung 22490, DIN 11 864-1									
	DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
	10	76	10	38						28x1/8"	0,08
	15	76	16	44						34x1/8"	0,11
	20	76	20	54						44x1/6"	0,19
	25	77	26	63						52x1/6"	0,26
	32	88	32	70						58x1/6"	0,31
	40	88	38	78						65x1/6"	0,36
	50	89	50	92						78x1/6"	0,50
	65	113	66	112						95x1/6"	0,86
	80	117	81	127						110x1/4"	1,16
	100	120	100	148						130x1/4"	1,51

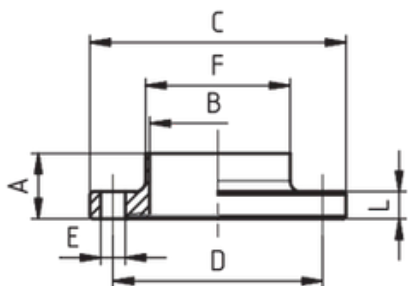
Hygienic flange "BF"
Hygiene Bundflansch "BF"

22850 (BF)

DIN 11 853

Hygienic flange connection PN10 DIN 11853

Hygiene flanschverbindung PN 10 DIN 11853



DN	A	B	C	D	E	F	R	L	závit DIN 405 Rd x s	kg
10	24	10	54	37	9x4	13		10		0,16
15	24	16	59	42	9x4	19		10		0,18
20	24	20	64	47	9x4	23		10		0,21
25	24	26	70	53	9x4	29		10		0,25
32	24	32	76	59	9x4	35		10		0,28
40	24	38	82	65	9x4	41		10		0,32
50	24	50	94	77	9x4	53		10		0,39
65	24	66	113	95	9x8	70		10		0,52
80	26	81	133	112	11x8	85		12		0,80
100	26	100	159	137	11x8	104		14		1,29
125	28	125	183	161	11x8	129		14		1,54
150	28	150	213	188	14x8	154		16		2,19

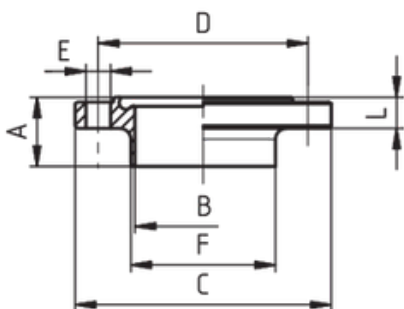
Hygienic flange "NF"
Hygiene Bundflansch "NF"

22860 (NF)

DIN 11 853

Hygienic flange connection PN10 DIN 11853

Hygiene flanschverbindung PN 10 DIN 11853



DN	A	B	C	D	E	F	R	L	závit DIN 405 Rd x s	kg
10	25,5	10	54	37	9x4	13		11,5		0,16
15	25,5	16	59	42	9x4	19		11,5		0,18
20	25,5	20	64	47	9x4	23		11,5		0,21
25	25,5	26	70	53	9x4	29		11,5		0,25
32	25,5	32	76	59	9x4	35		11,5		0,28
40	25,5	38	82	65	9x4	41		11,5		0,32
50	25,5	50	94	77	9x4	53		11,5		0,39
65	25,5	66	113	95	9x8	70		11,5		0,52
80	27,5	81	133	112	11x8	85		13,5		0,80
100	27,5	100	159	137	11x8	104		15,5		1,29
125	29,5	125	183	161	11x8	129		15,5		1,54
150	29,5	150	213	188	14x8	154		17,5		2,19

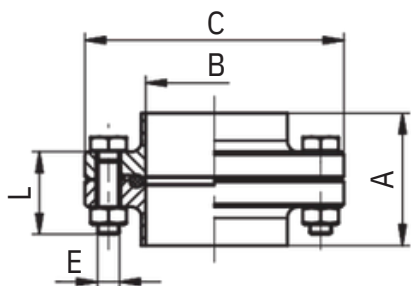
Hygienic flange connection PN10 -
complete

22870

DIN 11 853

Hygienic flange connection PN10 DIN 11853

Hygiene flanschverbindung PN 10 DIN 11853



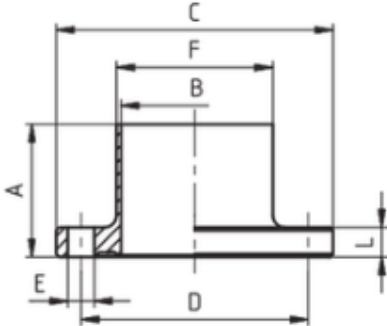
DN	A	B	C	D	E	F	R	L	závit DIN 405 Rd x s	kg
10	48	10	54		4 x M8			28		0,41
15	48	16	59		4 x M8			28		0,46
20	48	20	64		4 x M8			28		0,52
25	48	26	70		4 x M8			28		0,60
32	48	32	76		4 x M8			28		0,66
40	48	38	82		4 x M8			28		0,73
50	48	50	94		4 x M8			28		0,87
65	48	66	113		8 x M8			28		1,21
80	52	81	133		8 x M10			35		1,96
100	52	100	159		8 x M10			40		2,97
125	56	125	183		8 x M10			40		3,47
150	56	150	213		8 x M12			45		5,02

Welding aseptic flange "NF"
Aseptic Bundflansch "NF"

22910 (BF)

Aseptic flange connection PN 10 DIN 11864

DIN11864-2-AAAseptic flanschverbindung PN 10 DIN 11864



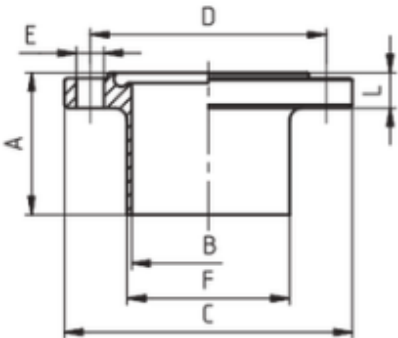
DN	A	B	C	D	E	F	R	L	závit DIN 405 Rd x s	kg
10	40	10	54	37	9x4	13		10		0,16
15	40	16	59	42	9x4	19		10		0,18
20	40	20	64	47	9x4	23		10		0,21
25	40	26	70	53	9x4	29		10		0,25
32	45	32	76	59	9x4	35		10		0,28
40	45	38	82	65	9x4	41		10		0,32
50	45	50	94	77	9x4	53		10		0,39
65	54	66	113	95	9x8	70		10		0,52
80	58	81	133	112	11x8	85		12		0,80
100	58	100	159	137	11x8	104		14		1,29
125	60	125	183	161	11x8	129		14		1,54
150	60	150	213	188	14x8	154		16		2,19

Welding aseptic neck "NF"
Aseptic Bundflansch "NF"

22920 (NF)

Aseptic flange connection PN 10 DIN 11864

DIN11864-2-AAAseptic flanschverbindung PN 10 DIN 11864



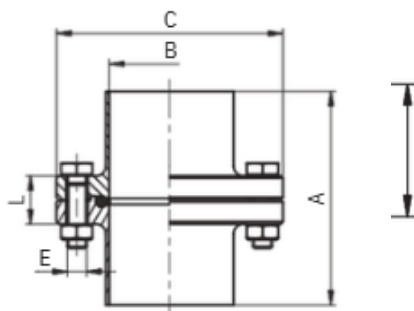
DN	A	B	C	D	E	F	R	L	závit DIN 405 Rd x s	kg
10	41,5	10	54	37	9x4	13		11,5		0,16
15	41,5	16	59	42	9x4	19		11,5		0,18
20	41,5	20	64	47	9x4	23		11,5		0,21
25	41,5	26	70	53	9x4	29		11,5		0,25
32	46,5	32	76	59	9x4	35		11,5		0,28
40	46,5	38	82	65	9x4	41		11,5		0,32
50	46,5	50	94	77	9x4	53		11,5		0,39
65	55,5	66	113	95	9x8	70		11,5		0,52
80	59,5	81	133	112	11x8	85		13,5		0,80
100	59,5	100	159	137	11x8	104		15,5		1,29
125	61,5	125	183	161	11x8	129		15,5		1,54
150	61,5	150	213	188	14x8	154		17,5		2,19

Aseptic flange connection PN10 -
complete
AsepticflanschverbindungPN10
- komplett

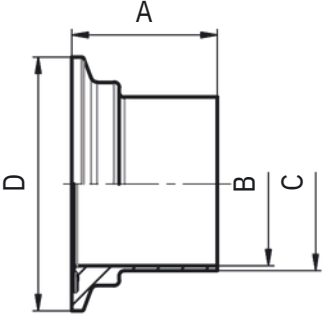
22930

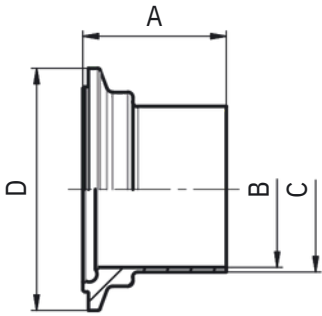
Aseptic flange connection PN 10 DIN 11864

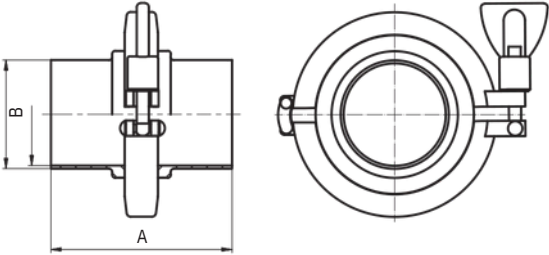
DIN11864-2-AAAseptic flanschverbindung PN 10 DIN 11864

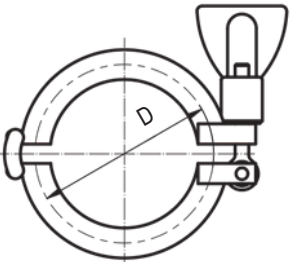


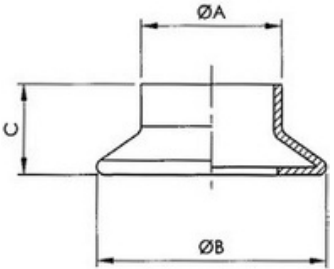
DN	A	B	C	D	E	F	R	L	závit DIN 405 Rd x s	kg
10	80	10	54		4 x M8			28		
15	80	16	59		4 x M8			28		
20	80	20	64		4 x M8			28		
25	80	26	70		4 x M8			28		
32	90	32	76		4 x M8			28		
40	90	38	82		4 x M8			28		
50	90	50	94		4 x M8			28		
65	108	66	113		8 x M8			28		
80	116	81	133		8 x M10			35		
100	116	100	159		8 x M10			40		
125	120	125	183		8 x M10			40		
150	120	150	213		8 x M12			45		

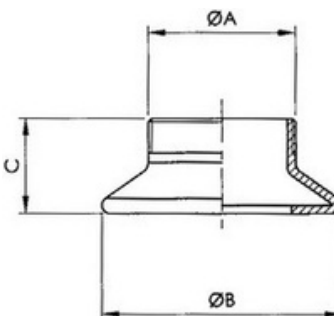
Clamp ferrule S (BKS) Klampsutizen S(BKS)	22950 (BKS)	Clamp union - S - DIN 11864-3									
	DIN 11864-3	Clampverbindung - S - DIN11864-3									
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
	10	38	10	13	34						
	15	38	16	19	34						
	20	38	20	23	50,5						
	25	38,5	26	29	50,5						
	32	44	32	35	50,5						
	40	44	38	41	64						
	50	44,5	50	53	77,5						
	65	56,5	66	70	91						
	80	58,5	81	85	106						
	100	60	100	104	130						

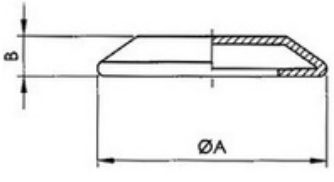
Clamp ferrule S (NKS) KlampsutizenS(NKS)	22960 (NKS)	Clamp union - S - DIN 11864-3									
	DIN 11864-3	Clampverbindung - S - DIN11864-3									
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
	10	39,5	10	13	34						
	15	39,5	16	19	34						
	20	39,5	20	23	50,5						
	25	40	26	29	50,5						
	32	45,5	32	35	50,5						
	40	45,5	38	41	64						
	50	46	50	53	77,5						
	65	58	66	70	91						
	80	60	81	85	106						
	100	61,5	100	104	130						

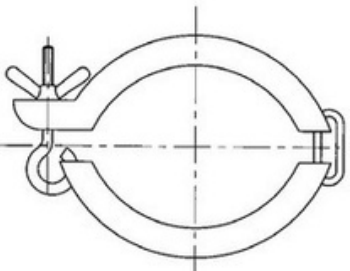
Clamp union S DIN 11964-3 - complete ClampverbindungenSDIN11864-3 - komplett	22970	Clamp union - S - DIN 11864-3									
	DIN 11864-3	Clampverbindung - S - DIN11864-3									
	DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
	10	77,5	10	13							
	15	77,5	16	19							
	20	77,5	20	23							
	25	78,5	26	29							
	32	89,5	32	35							
	40	89,5	38	41							
	50	90,5	50	53							
	65	114,5	66	70							
	80	118,5	81	85							
	100	121,5	100	104							

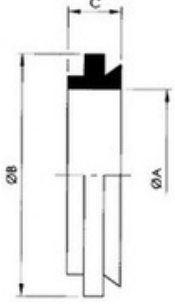
Clamp TC-Klammer leichte Ausführung	21220	Dimensions • Baumaße									
		DN	SMS	DIN	D	DIN 11864-3	R	L	závit DIN 405 Rd x s	kg	
	10-20	-	10-20	34	10-15						
	1"-1 1/2"	25	25	50,5	20						
	1"-1 1/2"	-	32	50,5	25						
	1"-1 1/2"	38	40	50,5	32						
	2"	51	50	64	40						
	2 1/2"	63,5	-	77,5	50						
	3"	76,1	65	91	65						
	80	-	80	106	80						
	115	-	-	130	100						

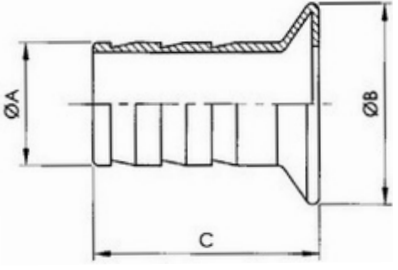
Long welding garolla fitting Anschw.Garollastutzen	23400												
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
		40	41	65	31							0,12	
		50	46	76	34								0,20
		60	58	87	35								0,20
		70	73	97	35								0,24
		80	86	108	36								0,28
		100	101	129	40								
		120	124	158	46								

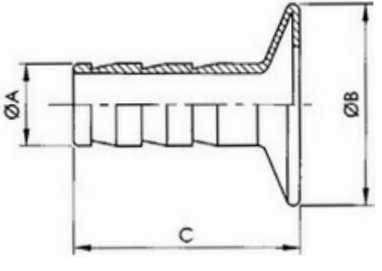
Half garolla fitting ext. thread Garollastutzen mit außengewinde	23440	Dimensions • Baumaße											
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
		40	1¼" G	65	31								
		50	1½" G	76	34								
		60	2" G	87	35								
		70	2½" G	97	35								
		80	3" G	108	36								
		100	4" G	129	40								
		120	5" G	158	46								

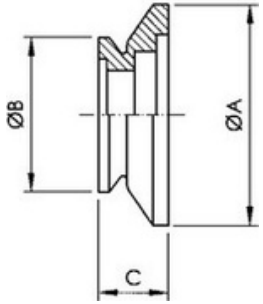
Garolla cap Klemmstöpsel	23480	Dimensions • Baumaße											
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg	
		40	65	19								0,10	
		50	76	19									0,14
		60	87	19									
		70	97	19									
		80	108	19									
		100	129	20									0,38
		120	158	25									

Clamp for connectors Klemmen für anschluss	23520	Dimensions • Baumaße											
		DN	A	B	C	D	E	F	R	SW	threadDIN 405 Rd x s	kg	
		40										0,26	
		50											0,28
		60											0,28
		70											0,30
		80											0,36
		100											0,40
		120											

Winery sealing ring Dichtung	2352 B											
		DN	A	B	C	D	E	F	R	SW	threadDIN 405 Rd x s	kg
		40	40	62								0,018
		50	50	72								0,018
		60	60	82								0,028
		70	70	94								0,040
		80	80	104								0,040
		100	100	124								
		120	120	154								

Garolla hose holder Halber klemmaschluss	23600	Dimensions • Baumaße										
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
		40	40	65	80							0,22
		50	50	76	90							0,32
		60	60	87	95							0,44
		70	70	97	100							0,54
		80	80	108	120							
		100	100	129	140							
		120	120	158	150							

Garolla hose holder for reduction Reduziertschlauchgarollastutzen	23640	Dimensions • Baumaße									
		DN	A	B	C	L	threadDIN 405 Rd x s	kg			
		40	40 x 20, 40 x 25, 40 x 30, 40 x 35	65	80						
		50	50 x 20, 50 x 25, 50 x 30, 50 x 35	76	90						
		60	60 x 30, 60 x 35, 60 x 40, 60 x 50	87	95						
		70	70 x 35, 70 x 40, 70 x 50, 70 x 60	97	100						
		80	80 x 40, 80 x 50, 80 x 60, 80 x 70	108	120						
		100	100 x 50, 100 x 60, 100 x 70, 100 x 80	129	140						
		120	120 x 80, 120 x 100	158	150						

Garolla reduction Garolla-reduzierstück	23680	Dimensions • Baumaße									
		DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s
		50/40	76	65	55						
		60/50	87	76	60						
		70/50	98	76	62						
		70/60	98	87	64						
		80/70	108	98	68						
		100/70	129	98	70						
		100/80	129	108	75						
	120/100	158	129	85							

Welding union
Anschweißverschraubung

20120

Description
Beschreibung

DIN 11 851



Expanding union 20120, DIN 11 851

- Simple instalation
- Easy gasket exchange

Einwalverschraubung 20120, DIN 11 851

- Einfache die Dichtung austauschen
- Einfache Installation

Dimensions/Baumaße: DN 10 - DN 150

Thread / Gewinde: DIN 405

Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtung: NBR
EPDM
Viton
Silikon
PTFE

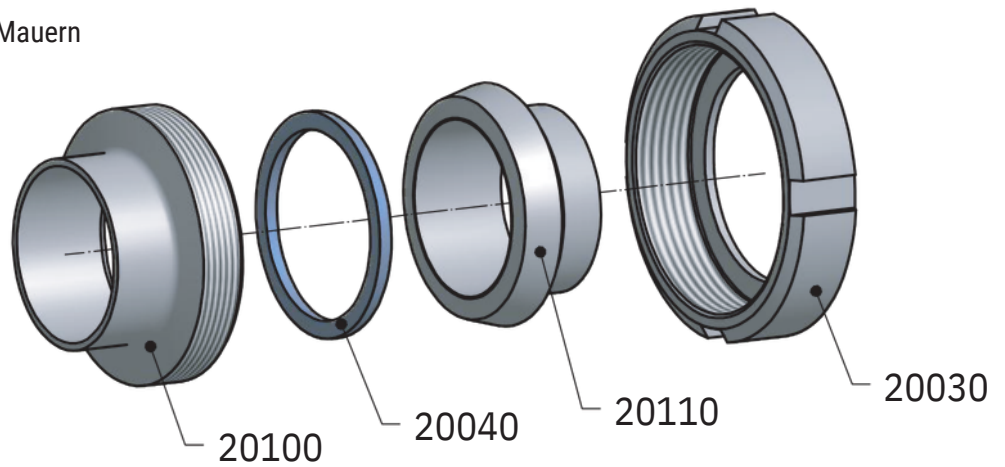
Komponents / Komponenten

Strength of the walls / Stärke der Mauern

DN 10	1,5 mm
DN 15 - 50	2,5 mm
DN 65 - 100	3,0 mm
DN 125 - 150	3,5 mm



Detail gasket
Detail der Dichtung



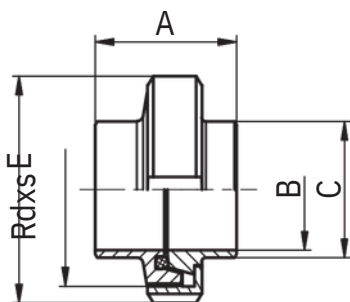
Standard gasket / Standard dichtung - NBR

Welding union - complete
Anschweißverschraubung - komplett

20120

Dimensions • Baumaße

DIN 11 851



DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
10	35	10	15		38				28 x 1/8"	0,17
15	35	16	21		44				34 x 1/8"	0,18
20	37	20	25		54				44 x 1/6"	0,32
25	45	26	31		63				52 x 1/6"	0,40
32	51	32	37		70				58 x 1/6"	0,49
40	53	38	43		78				65 x 1/6"	0,58
50	57	50	55		92				78 x 1/6"	0,84
65	65	66	72		112				95 x 1/6"	1,15
80	75	81	87		127				110 x 1/4"	1,74
100	89	100	106		148				130 x 1/4"	2,46
125	69	125	132		178				160 x 1/4"	3,52
150	74	150	157		210				190 x 1/4"	4,74

Welding union - Type "R"
Anschweißverschraubung - Typ "R"

20120 R
DIN 11 851

Description
Beschreibung



Welding union 20120 - R, DIN 11 851

- Simple installation
- Easy gasket exchange

Anschweißverschraubung 20120 - R, DIN 11 851

- Einfache die Dichtung austauschen
- Einfache Installation

Dimensions/Baumaße: DN 10 - DN 150

Thread / Gewinde: DIN 405

Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtung: NBR
EPDM
Viton
Silikon
PTFE

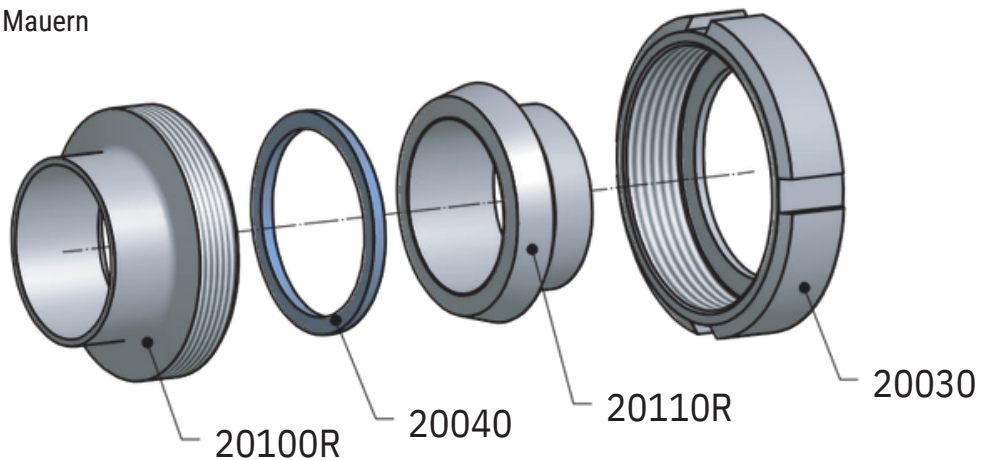
Komponents / Komponenten

Strength of the walls / Stärke der Mauern

DN 10 - 50 1,5 mm
DN 50 - 150 2,0 mm



Detail gasket
Detail der Dichtung

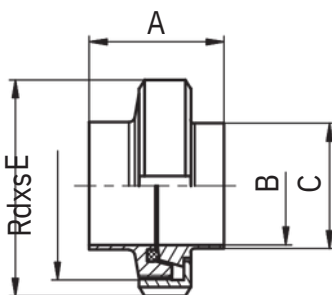


Standard gasket / Standard dichtung - NBR

Welding union - complete
Anschweißverschraubung -komplett

20120 R
DIN 11 851

Dimensions • Baumaße



DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
10	35	10	13		38				28 x 1/8"	0,13
15	35	16	19		44				34 x 1/4"	0,16
20	37	20	23		54				44 x 1/6"	0,28
25	45	26	29		63				52 x 1/6"	0,37
32	51	32	35		70				58 x 1/6"	0,45
40	53	38	41		78				65 x 1/6"	0,53
50	57	50	53		92				78 x 1/6"	0,67
65	65	66	70		112				95 x 1/6"	1,19
80	75	81	85		127				110 x 1/4"	1,67
100	89	100	104		148				130 x 1/4"	2,32
125	69	125	129		178				160 x 1/4"	3,21
150	74	150	154		210				190 x 1/4"	4,60

Welding union ISO
Anschweißverschraubung ISO

21030

Description
Beschreibung

ISO



Welding union 21030 ISO

- Simple installation
- Easy gasket exchange

Anschweißverschraubung 21030 ISO

- Einfache die Dichtung austauschen
- Einfache Installation

Dimensions/Baumaße: DN 10 - DN 150

Thread / Gewinde: DIN 405

Material / Material: 1.4301 (AISI 304)

1.4404 (AISI 316L)

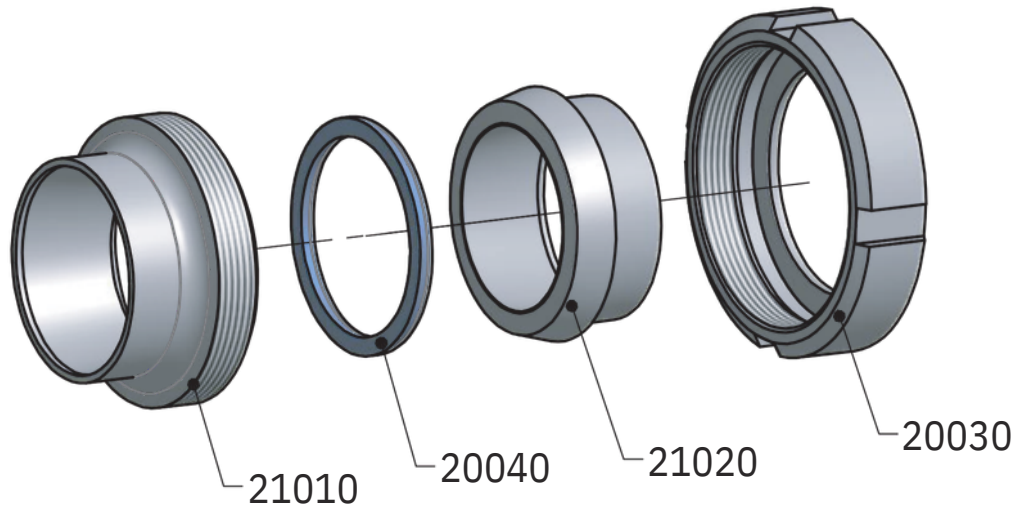
Gasket / Dichtung:

- NBR
- EPDM
- Viton
- Silikon
- PTFE

Komponents / Komponenten



Detail gasket
Detail der Dichtung



Standard gasket / Standard Dichtring - EPDM

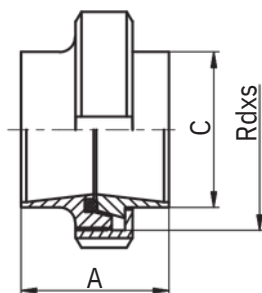
Welding union - complete ISO
Anschweißverschraubung-komplett
ISO

21030

Dimensions • Baumaße

ISO

DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	34		18						28x1/8"	0,15
15	34		21,3						34x1/8"	0,18
20	36		26,9						44x1/6"	0,30
25	45		33,7						52x1/6"	0,42
32	51		42,4						58x1/6"	0,51
40	53		48,3						65x1/6"	0,61
50	57		60,3						78x1/6"	0,84
65	65		76,1						95x1/6"	1,31
80	75		88,9						110x1/4"	1,80
100	89		114,3						130x1/4"	2,66



Welding union SMS
Anschweißverschraubung SMS

21120

Description
Beschreibung

SMS



Welding union SMS 21120

- Simple instalation
- Easy gasket exchange

Anschweißverschraubung SMS 21120

- Einfache die Dichtung austauschen
- Einfache Installation

Dimensions / Baumaße: DN 10 - DN 150

Thread / Gewinde: DIN 405

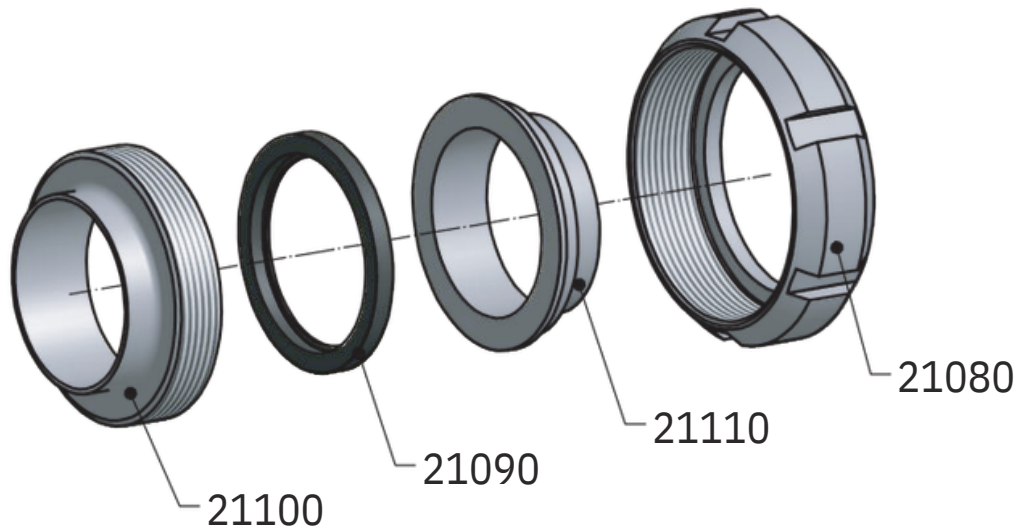
Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtring: NBR
EPDM
Viton
Silikon
PTFE

Komponents / Komponenten



Detail gasket
Detail der Dichtung



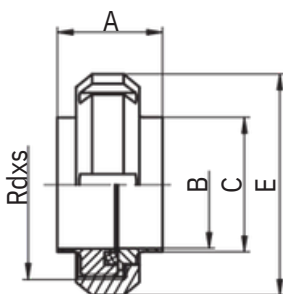
Standard gasket /Standard Dichtring - EPDM

Welding union - complete
Anschweißverschraubung - komplett

21120

Dimensions • Baumaße

SMS



DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
25	35,5	22,5	25		51				40x1/6	0,18
38	40	35,5	38		74				60x1/6	0,47
51	41	48,5	50,8		84				70x1/6	0,55
63,5	45	60,5	63,5		100				85x1/6	0,83
76	47	72,9	76,1		114				98x1/6	1,13
101,6	50	97,6	101,6		138				125x1/4	2,78
104	50	100	104		138				125x1/4	2,78

Clampunion - S - DIN
Clampverbindung - S - DIN

21250

Description
Beschreibung

DIN 32 676



Clamp union - S - DIN 21250

- Simple instalation
- Easy gasket exchange

Clampverbindung - S - DIN 21250

- Einfache die Dichtung austauschen
- Einfache Installation

Dimensions / Baumaße: DN 10 - DN 150

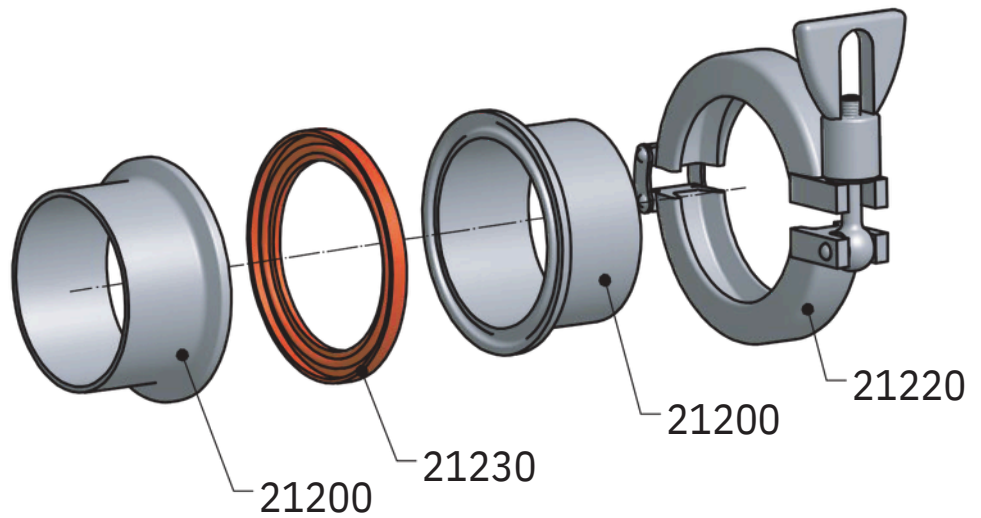
Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtring: Silikon
PTFE - Viton
Viton
EPDM

Komponents / Komponenten



Detail gasket
Detail der Dichtung



Standard gasket /Standard Dichtring - Silikon

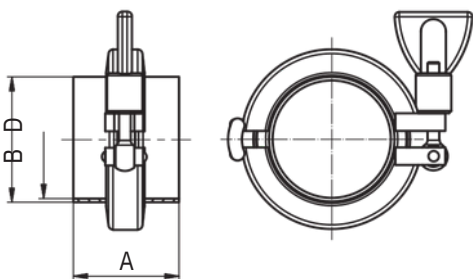
Clamp union - S - DIN - complete
Clampverbindung - S - DIN - komplett

21250

Dimensions • Baumaße

DIN 32 676

DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	45	10		13						0,28
15	45	16		19						0,28
20	45	20		23						0,30
25	45	26		29						0,35
32	45	32		35						0,35
40	45	38		41						0,37
50	45	50		53						0,39
65	58	66		70						0,89
80	58	81		85						0,95
100	58	100		104						0,99
125	58	125		129						1,15
150	58	150		154						1,30



Clampunion - S - SMS
Clampverbindung - S - SMS

21252

SMS

Description
Beschreibung



Clamp union - S - SMS 21252

- Simple instalation
- Easy gasket exchange

Clampverbindung - S - SMS 21252

- Einfache die Dichtung austauschen
- Einfache Installation

Dimensions / Baumaße: DN 10 - DN 150

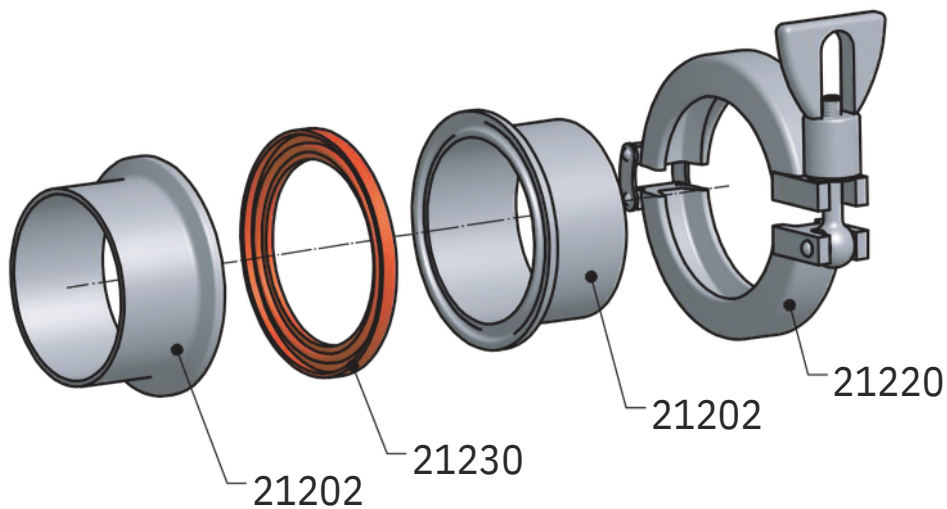
Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtring: Silikon
PTFE - Viton
Viton
EPDM

Komponents / Komponenten



Detail gasket
Detail der Dichtung



Standard gasket /Standard Dichtring - Silikon

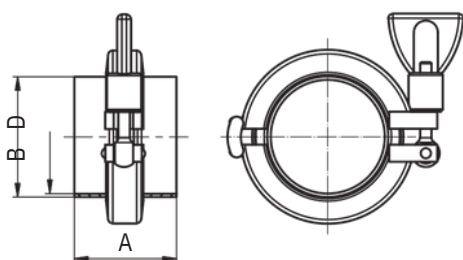
Clamp union - S - SMS - complete
Clampverbindung - S - SMS - komplett

21252

Dimensions • Baumaße

SMS

DN	A	B	C	D	E	F	R	L	thread	DIN 405 Rd x s	kg
25	43	22,5		25							0,35
38	43	35,5		38,1							0,37
51	43	48,5		51							0,39
63,5	56	60,5		63,5							0,89
76	56	72,9		76,1							0,95
101,6	56	97,6		101,6							0,99



Welding union
Anschweißverschraubung

22320

Description
Beschreibung

DIN 11 853

Welding union 22320, DIN 11 853-1

- Simple instalation
- Easy gasket exchange

Anschweißverschraubung 22320, DIN 11 853-1

- Einfache die Dichtung austauschen
- Einfache Installation

Baumaße / Dimensions: DN 10 - DN 100

Thread / Gewinde: DIN 405

Material / Material: 1.4301 (AISI 304)

1.4404 (AISI 316L)

Dichtring / Gasket:

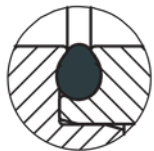
NBR

EPDM

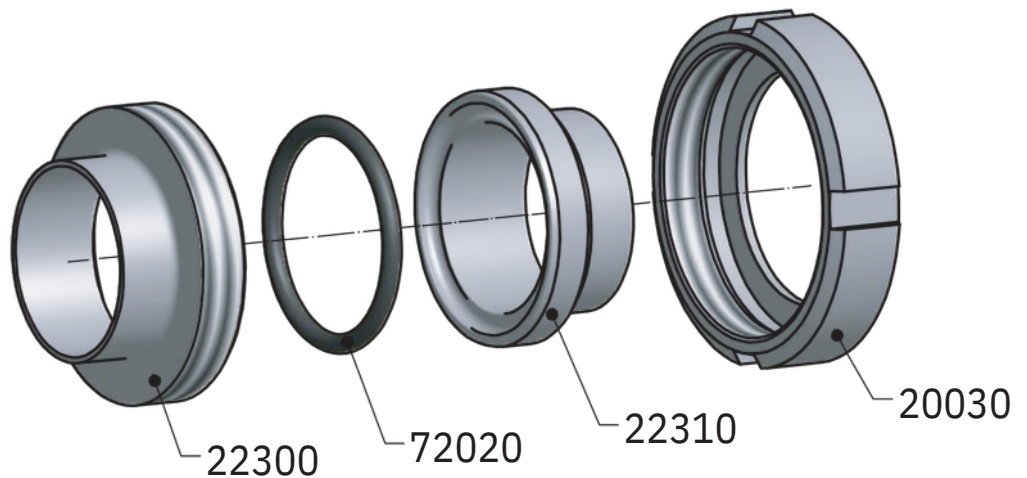
Viton



Komponents / Komponenten



Detail gasket
Detail der Dichtung



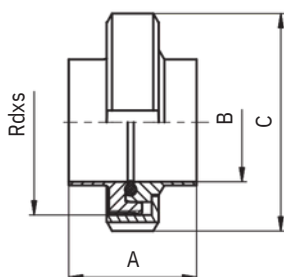
Standard gasket /Standard Dichtring - EPDM

Welding union - complete
Anschweißverschraubung - komplett

22320

Dimensions • Baumaße

DIN 11 853



DN	A	B	C	D	E	F	R	L	thread DIN 405 Rd x s	kg
10	32	10	38						28 x 1/8"	0,14
15	32	16	44						34 x 1/8"	0,18
20	34	20	54						44 x 1/6"	0,30
25	42	26	63						52 x 1/6"	0,41
32	48	32	70						58 x 1/6"	0,48
40	50	38	78						65 x 1/6"	0,57
50	54	50	92						78 x 1/6"	0,78
65	62	66	112						95 x 1/6"	1,27
80	72	81	127						110 x 1/4"	1,76
100	86	100	148						130 x 1/4"	2,40

Welding union
Anschweißverschraubung

22490
DIN 11 864-1-A

Description
Beschreibung



Welding union 22490, DIN 11 864-1

- Simple instalation
- Easy gasket exchange

Anschweißverschraubung 22490, DIN 11 864-1

- Einfache die Dichtung austauschen
- Einfache Installation

Baumaße / Dimensions: DN 10 - DN 100

Thread / Gewinde: DIN 405

Material / Material: 1.4301 (AISI 304)

1.4404 (AISI 316L)

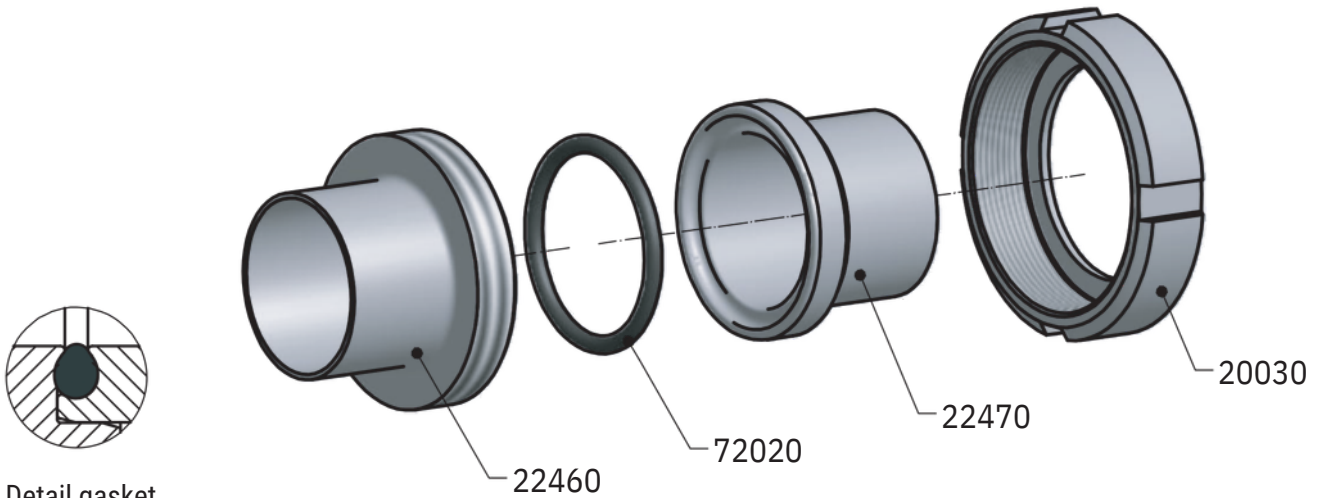
Dichtring / Gasket:

NBR

EPDM

Viton

Komponents / Komponenten



Detail gasket
Detail der Dichtung

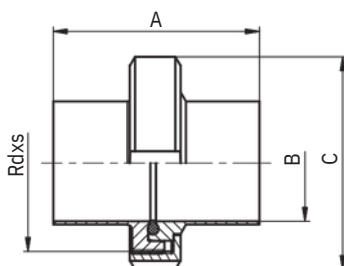
Standard gasket /Standard Dichtring - EPDM

Welding union - complete
Anschweißverschraubung - komplett

22490

Dimensions • Baumaße

DIN 11 864-1-A



DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	76	10	38						28x1/8"	0,08
15	76	16	44						34x1/8"	0,11
20	76	20	54						44x1/6"	0,19
25	77	26	63						52x1/6"	0,26
32	88	32	70						58x1/6"	0,31
40	88	38	78						65x1/6"	0,36
50	89	50	92						78x1/6"	0,50
65	113	66	112						95x1/6"	0,86
80	117	81	127						110x1/4"	1,16
100	120	100	148						130x1/4"	1,51

Flangeconnection PN10
Flanschverbindung PN 10

20720

DIN 2576

Description
Beschreibung



Flange connection PN 10

- Simple instalation
- Easy gasket exchange

FlanschverbindungPN 10

- Einfache installation
- Einfache die Dichtung austauschen

Dimensions / Baumaße: DN 10 - DN 150

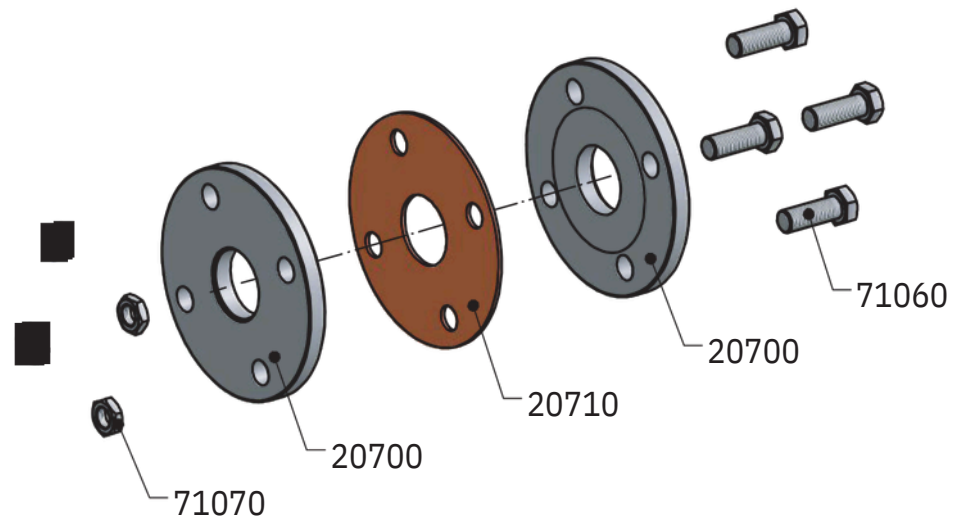
Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtring: NBR
EPDM
Viton

Komponents / Komponenten



Detail gasket
Detail der Dichtung



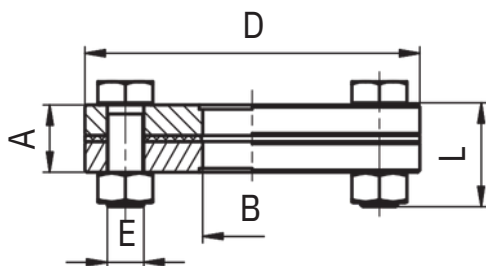
Standard gasket / Standard Dichtring -NBR

Flange connection PN 10 - complete
FlanschverbindungPN10 - komplett

20720

DIN 2576

Dimensions • Baumaße



DN	A	B	C	D	E	F	R	L	Rd x s	kg
10	31	10		90	4 x M12			40		1,30
15	31	16		95	4 x M12			40		1,40
20	31	20		105	4 x M12			45		2,00
25	31	26		115	4 x M12			45		2,30
32	31	32		140	4 x M16			50		3,50
40	31	38		150	4 x M16			50		4,00
50	31	50		165	4 x M16			55		5,10
65	32	66		185	4 x M16			55		6,00
80	36	81		200	8 x M16			55		7,50
100	36	100		220	8 x M16			55		8,30
125	44	125		250	8 x M16			60		13,00
150	52	150		285	8 x M20			65		16,70

FlangeconnectionPN16
Flanschverbindung PN 16

20740

DIN 2633

Description
Beschreibung



Flange connection PN 16 DIN 2633

- Simple instalation
- Easy gasket exchange

Flanschverbindung PN 16 DIN 2633

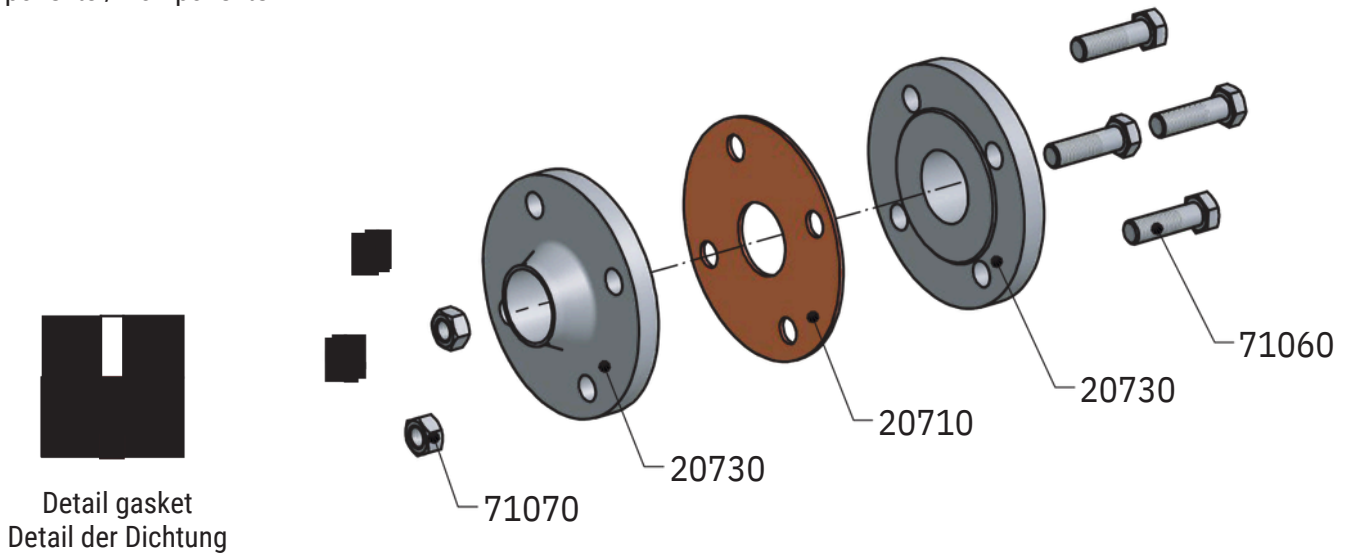
- Einfache installation
- Einfache die Dichtung austauschen

Dimensions / Baumaße: DN 10 - DN 150

Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtring: NBR
EPDM
Viton

Komponents / Komponenten



Detail gasket
Detail der Dichtung

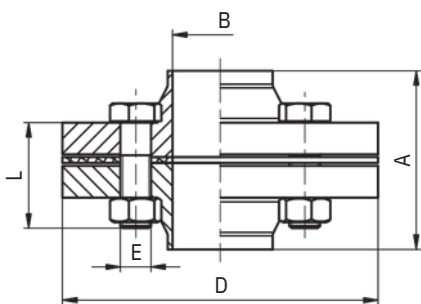
Standard gasket /Standard Dichtring -NBR

Flange connection PN 16 - complete
FlanschverbindungPN16 - komplett

20740

DIN 2633

Dimensions • Baumaße



DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	73	10		90	4 x M12			45		1,16
15	73	16		95	4 x M12			45		1,30
20	79	20		105	4 x M12			45		1,90
25	79	26		115	4 x M12			50		2,28
32	83	32		140	4 x M16			50		3,20
40	88	38		150	4 x M16			50		3,60
50	94	50		165	4 x M16			55		5,06
65	94	66		185	4 x M16			55		6,12
80	104	81		200	8 x M16			60		7,40
100	108	100		220	8 x M16			60		9,24
125	114	125		250	8 x M16			65		12,60
150	114	150		285	8 x M20			70		15,5

Flangeconnection complete PN 10
Flanschverbindung komplett PN10

20420

Description
Beschreibung



Flange connection PN 10

- Simple instalation
- Easy gasket exchange

Flanschverbindung PN 10

- Einfache installation
- Einfache die Dichtung austauschen

Dimensions / Baumaße: DN 10 - DN 150

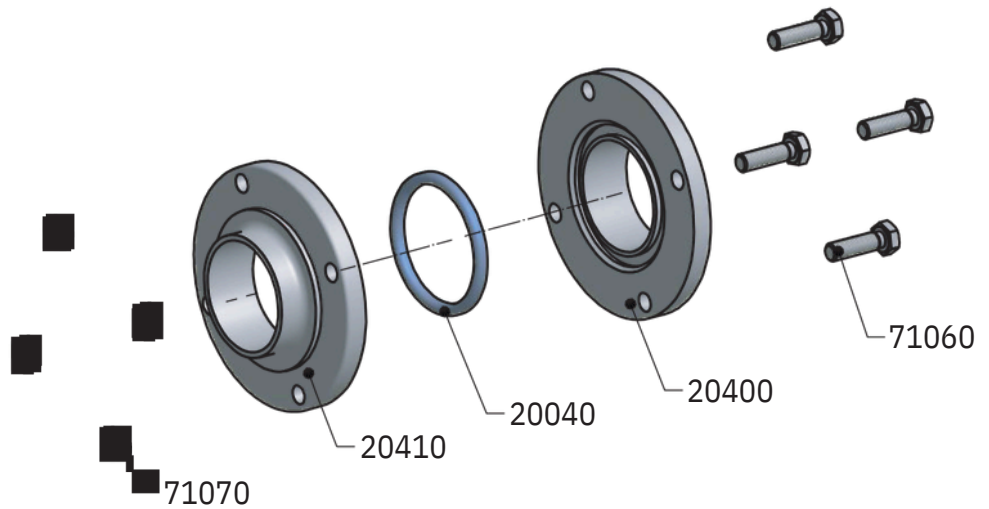
Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtring: NBR
EPDM
Viton

Komponents / Komponenten



Detail gasket
Detail der Dichtung

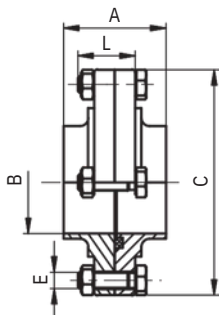


Standard gasket /Standard Dichtring -NBR

Flange connection PN 10 - complete
Flanschverbindung PN10 - komplett

20420

Dimensions • Baumaße



DN	A	B	C	D	E	F	R	L	thread	DIN 405 Rd x s	kg
10	40	10	62		4 x M8			28			0,40
15	40	16	68		4 x M8			28			0,52
20	40	20	75		4 x M8			28			0,58
25	40	26	87		4 x M8			28			0,78
32	40	32	92		4 x M8			28			0,92
40	50	38	97		4 x M8			28			0,94
50	50	50	110		4 x M8			28			1,18
65	50	66	127		4 x M8			28			1,50
80	60	81	142		4 x M8			40			2,56
100	60	100	162		4 x M8			40			3,44
125	80	125	200		6 x M10			45			5,74
150	90	150	230		6 x M10			45			7,70

HygienicflangeconnectionPN10
Hygiene flanschverbindung PN 10

22870

DIN 11 853

Description
Beschreibung



Hygienic flange connection PN10 DIN 11853

- Simple instalation
- Easy gasket exchange

Hygiene flanschverbindung PN 10 DIN 11853

- Einfache installation
- Einfache die Dichtung austauschen

Dimensions / Baumaße: DN 10 - DN 150

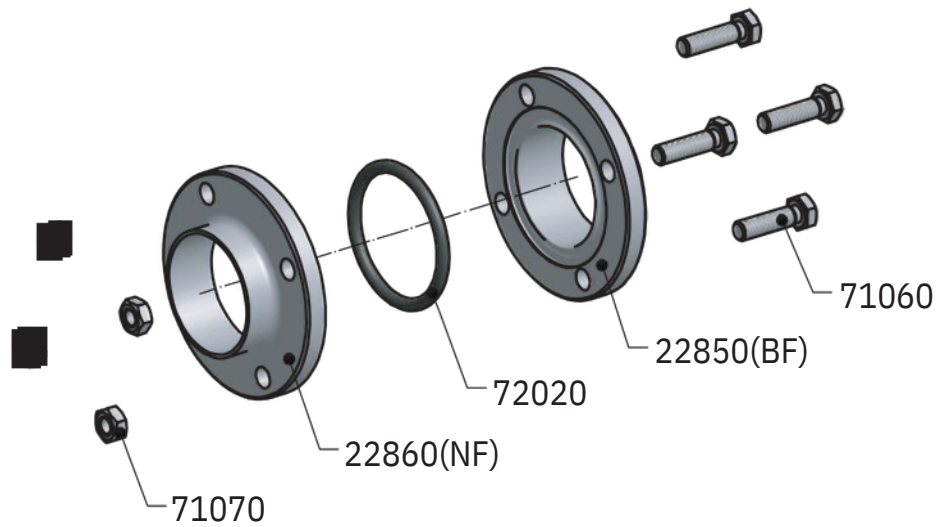
Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtring: EPDM
Viton

Komponents / Komponenten



Detail gasket
Detail der Dichtung



Standard gasket /Standard Dichtring - EPDM

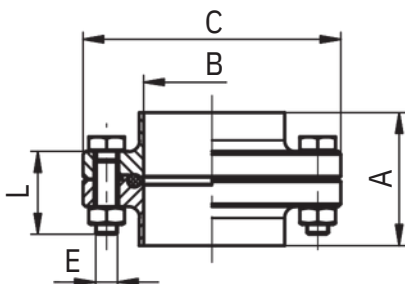
Hygienic flange connection PN10 - complete

22870

Dimensions • Baumaße

Hygiene flanschverbindung PN10 - komplett

DIN 11 853



DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	48	10	54		4 x M8			28		0,41
15	48	16	59		4 x M8			28		0,46
20	48	20	64		4 x M8			28		0,52
25	48	26	70		4 x M8			28		0,60
32	48	32	76		4 x M8			28		0,66
40	48	38	82		4 x M8			28		0,73
50	48	50	94		4 x M8			28		0,87
65	48	66	113		8 x M8			28		1,21
80	52	81	133		8 x M10			35		1,96
100	52	100	159		8 x M10			40		2,97
125	56	125	183		8 x M10			40		3,47
150	56	150	213		8 x M12			45		5,02

AsepticflangeconnectionPN10
Aseptic flanschverbindung PN 10

22930
DIN 11 864-2-A

Description
Beschreibung



Aseptic flange connection PN 10 DIN 11864
- Simple instalation
- Easy gasket exchange

Aseptic flanschverbindung PN 10 DIN 11864
- Einfache installation
- Einfache die Dichtung austauschen

Dimensions / Baumaße: DN 10 - DN 150

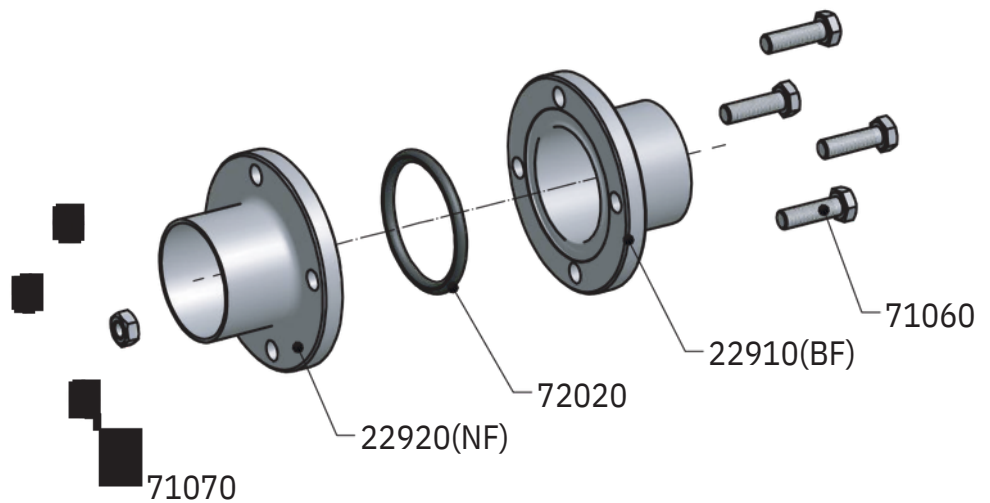
Material / Material: 1.4301 (AISI 304)
1.4404 (AISI 316L)

Gasket / Dichtring: EPDM
Viton

Komponents / Komponenten



Detail gasket
Detail der Dichtung



Standard gasket /Standard Dichtring - EPDM

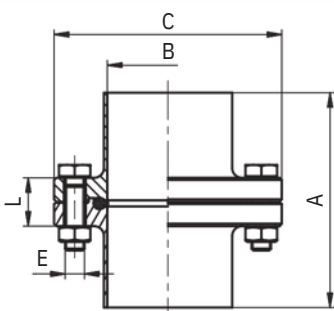
Aseptic flange connection PN10 - complete
AsepticflanschverbindungPN10 - komplett

22930

Dimensions • Baumaße

DIN 11 864-2-A

DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	80	10	54		4 x M8			28		
15	80	16	59		4 x M8			28		
20	80	20	64		4 x M8			28		
25	80	26	70		4 x M8			28		
32	90	32	76		4 x M8			28		
40	90	38	82		4 x M8			28		
50	90	50	94		4 x M8			28		
65	108	66	113		8 x M8			28		
80	116	81	133		8 x M10			35		
100	116	100	159		8 x M10			40		
125	120	125	183		8 x M10			40		
150	120	150	213		8 x M12			45		



ClampunionSDIN 11964-3
Clampverbindungen S DIN 11864-3

22970
DIN 11864-3

Description
Beschreibung



Clamp union - S - DIN 11864-3

- Simple instalation
- Easy gasket exchange

Clampverbindung - S - DIN 11864-3

- Einfache die Dichtung austauschen

- Einfache Installation **Dimensions / Baumaße:**

DN 10 - DN 100 **Material / Material:** 1.4404

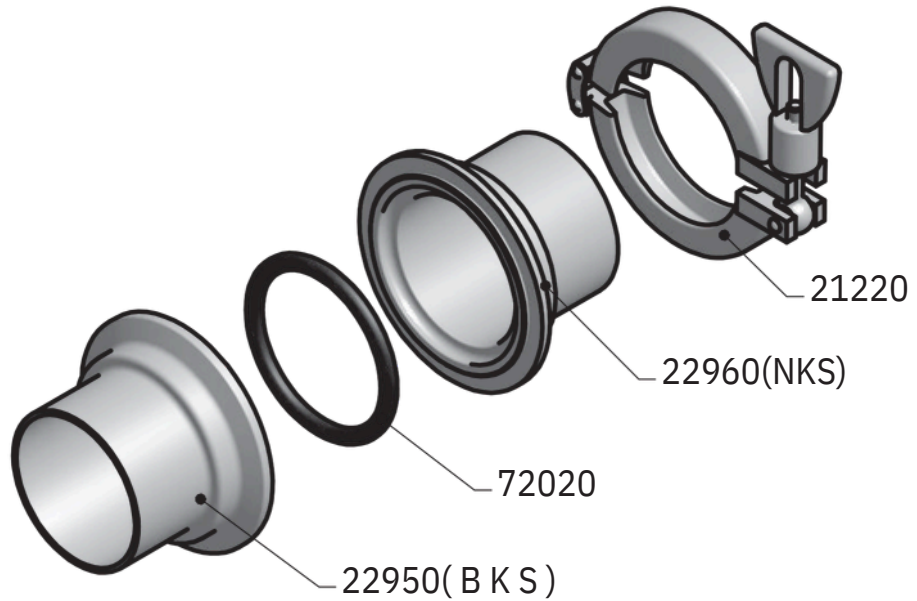
(AISI 316L) **Gasket / Dichtring:** Silikon, EPDM,

PTFE / Viton

Komponents / Komponenten



Detail gasket
Detail der Dichtung



Standard gasket /Standard Dichtring
- Silikon,EPDM,PTFE-Viton

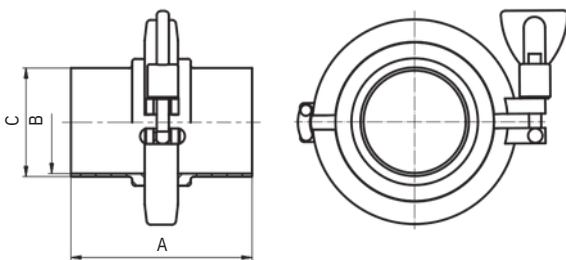
Clamp union S DIN 11964-3
- complete
Clampverbindungen S DIN 11864-3
- komplett

22970

DIN 11864-3

Dimensions • Baumaße

DN	A	B	C	D	E	F	R	L	threadDIN 405 Rd x s	kg
10	77,5	10	13							
15	77,5	16	19							
20	77,5	20	23							
25	78,5	26	29							
32	89,5	32	35							
40	89,5	38	41							
50	90,5	50	53							
65	114,5	66	70							
80	118,5	81	85							
100	121,5	100	104							



CONVERSION TABLE		UMRECHNUNGSTABELLE	
DN	(inch)	(mm)	
8	1/4"	6,35	
10	3/8"	9,25	
15	1/2"	12,7	
20	3/4"	19,0	
25	1"	25,4	
32	1 1/4"	31,7	
40	1 1/2"	38,1	
50	2"	51,0	
65	2 1/2"	63,5	
80	3"	76,1	
100	4"	104,0	

BAR CONVERSION CHARTS		BAR UMPRECHNUNGSTABELLE	
<h1>1 Bar</h1>		100000 Pascals	100 Kilopascals
		1000 Milibars	1000000 Microbars
		~0,98 Atmospheres	~401,46 Inches
		of water	10 Meters of water ~29,53
		Inches of mercury	~750 Milimeters
		of mercury	~14,5 Pounds per
		square inches	~1,02 Kilograms per
		square inches	

MATERIALS USED

All units and parts listed in this catalogue are produced from non-corrosive acid-resistant Cr – Ni steel ČSN 17 240, which is the equivalent of the German standard DIN 1.4301. If the corrosion-proof requirements of the parts are higher they are produced from non-corrosive Cr-Ni-Mo steel ČSN 17 349 which conforms to DIN 1.4404.

Chemical composition of the most frequently used non-corrosive steels

PN	%C max.	%Si max.	%Mn max.	%P max.	%S max.	%Cr max.	%Mo max.	%Ni max.	%Ti max.
17 240	0.07	1.00	2.00	0.045	0.030	17.0-20.0	-	9.0-11.5	-
17 249	0.03	1.00	2.00	0.045	0.030	17.0-20.0	-	10.0-12.5	-
17 346	0.07	1.00	2.00	0.045	0.030	16.5-18.5	2.0-2.5	10.5-13.5	-
17349	0.03	1.00	2.00	0.045	0.030	16.5-18.5	2.0-2.5	11.0-14.0	-
17 248	0.10	1.00	2.00	0.045	0.030	17.0-19.0	-	9.5-12.0	>=5xC
17 348	0.10	1.00	2.00	0.045	0.030	16.5-18.5	2.0-2.5	11.0-14.0	>=5xC

International standards conversion table for marking steels

Poldi	Czech Rep. PN	Germany DIN (W. Nr.)	USA ASTM	Italy UNI	France AFNOR	Russia GOST
AKV7	17240	1.4301	AISI 304	X5CrNi1810	Z7CN18-09	08Ch18N10
AKV2 AKV	17249	1.4306	AISI304L	X2CrNi1811	Z3CN19-121	03Ch18N11
EX7 AKV	17346	1.4401	AISI 316	X5CrNiMo1712.2	Z7CND17-12-02	-
EX2 AKVS7	17349	1.4404	AISI 316L	X2CrNiMo1713.2	Z3CND18-12-02	03Ch12N14M2
AKV EX S9	17248	1.4541	AISI 321	X6CrNiTi1811	Z6CNT18-10	08Ch18N10T
	17348	1.4571	AISI 316Ti	X6CrNiMoTi1712	Z6CNDT17-12	08Ch17N13M2

DESIGN

The bulk of products are produced from bars or forged material. The material is in such a state that after welding it is not necessary to carry out further treatment. Tubular adapting pipes in their basic finish are pickled – matt, or treated – ground (brushed).

PIPE CONNECTING PARTS – DIN SCREW COUPLINGS

These are produced according to the DIN 11 851 standard and the screw thread according to the DIN 405 (ČSN 01 4037) standard. Connection of the sockets (screw thread or ring) to the tubes can be done in two ways:

- butt welding
- flaring the inside diameter

From diameters of 50 mm and above it is necessary to ensure flaring of connections with a seam weld. Flared connections with a seam weld are hygienically unobjectionable and are suitable for pressures of 1 MPa (tested at a pressure of 2 MPa). Parts which do not correspond to any standards are produced according to branch or factory standards, and possibly workshop standards, and in some cases to approved technical drawings.

SEALING

Seals listed in this catalogue are produced from the following materials – SILICON, PERBUNAN, EPDM or VITON. They are supplied separately or as part of the set. Prices for tubular adapting pipes and sets of screw couplings do not include sealing rings.

MAINTENANCE

Without exception the materials used are suitable for general use in the food-processing industry. These materials are sensitive to high concentrations of chloride solutions and therefore we recommend that the instructions and recommendations of the manufacturer are heeded. Corrosion can only be prevented if these instructions are adhered to.

SPECIAL DESIGN

Apart from the standard parts listed in this catalogue we also supply special designs according to customer requirements and their technical documentation.

INSTRUCTIONS FOR ORDERING

For quick and simple processing of your order please supply the following data:

1 2 3

numerical labelling of goods dimension(DN) material

4
amount

If group "3" is not listed in the order we automatically supply material 17 240 (DIN 1.4301)

If you require other parts and units than those in this catalogue please send your specific requirements.

This issue nullifies all previous catalogues and delivery conditions listed in them.

We would be pleased to discuss your specific requirements and answer your questions in person. We look forward to your visit.

Technical Information for Gaskets					
Title	Silicon (VMQ siliconrubber)	EPDM (ethylene-propylene-diene rubber)	Viton (FPM fluorine rubber)	Perbunan (NBR nitrile rubber)	PTFE (polytetrafluorethylene)
Temperature of use	It is stable in water up to 100 °C Possibility of sterilisation by steam short-term up to 120 °C to 130 °C	Permanent operating use from -40 °C to +140 °C Possibility of sterilisation by steam up to 130 °C	Permanent operating use from -20 °C to +200 °C Possibility of sterilisation by steam short-term up to 130 °C to 140 °C	Permanent operating use from -25 °C to +110 °C Possibility of sterilisation by steam short-term up to 130 °C	Up to +200 °C it is physiologically harmless, use from -200 °C to +260 °C
Recommended use	High temperature load capacity It has good resistance to cold, suitable for food, it has dielectric properties. It has good resistance to alcohols.	It has good resistance to swelling for: • Diluted inorganic and organic acids, media, oxidising media, lyes, and ketones Hot water and steam up to 130 °C	It has good resistance to swelling for: • Mineral oils • Plant and animal oils • Lubricants (also some additives) • Fuels	It has good resistance to swelling for: • Aliphatic hydrocarbons (such as propane, butane, benzene, mineral oil) • Lubricants based on mineral oil	It has good resistance to swelling in almost all parts it has a smooth and repellent surface so sticking does not occur It has better chemical resistance than in all other elastomers Non-flammable material
Limited use (border)	Shows high swelling for: • Low-molecular esters and ethers • Aliphatic and aromatic hydrocarbons • Concentrated acids and alkali	Cannot be used for: • Plant and animal oils • Aliphatic, aromatic, and chlorinated hydrocarbons • Mineral oils	Shows high swelling for: • Polar solvents, such as acetone, methyl ketone, ethyl acetate, diethyl ether, and dioxane • Low-molecular organic acids (formic acid and acetic acid) • Gaseous ammonia, amines and alkanes • Overheated water steam	Not resistant to: • Polar solvents • Chlorinated hydrocarbons • Ketones • Aromatic hydrocarbons (benzol) • Esters	Not resistant to: • Liquid alkaline metals and some compounds of fluorine in connection with higher pressure and temperature The material does not show the flexibility of rubber.
Material approval	BGA/FDA	BGA/FDA	BGA/FDA	BGA/FDA	BGA/FDA
BGA = approval of the "Federal Health Authority" in Germany ("Bundesgesundheitsamt") FDA = approval of the "US Food and Drug Administration"					