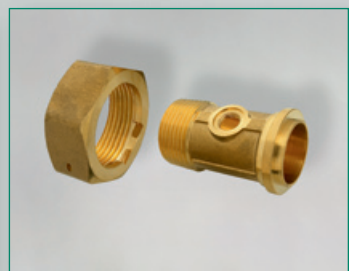


water in motion

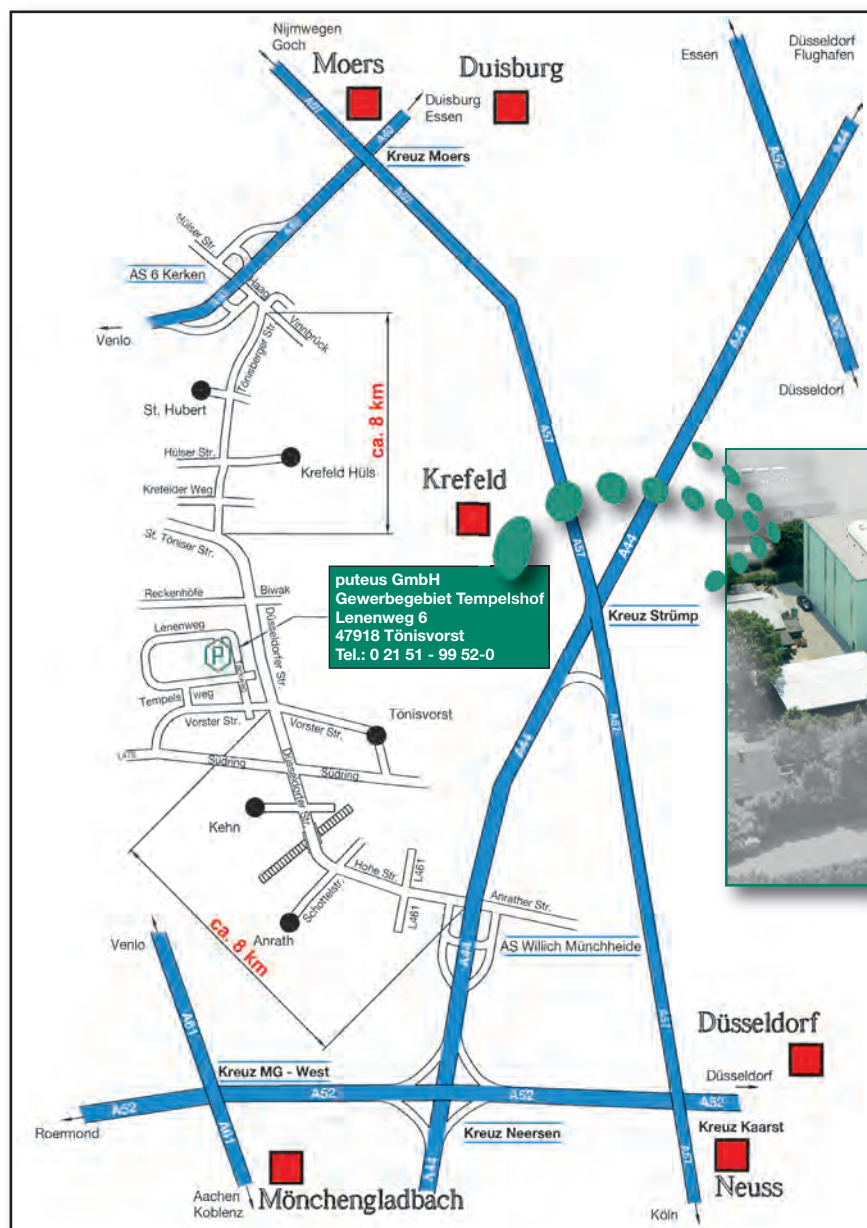


4 Fittings






How to find us?

How to reach us?

Phone: +49-(0) 2151-9952-0 • Fax: +49-(0)2151-9952-99 • e-mail: info@puteus.de



Distance Tönisvorst — airport

		
Düsseldorf		34 km
Weeze		66 km
Köln/Bonn		71 km
Dortmund		91 km

Contact:

Prefix:

+49(0)2151...

Phone

Fax

E-Mail

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Purchasing/Finance
Peter de Gruyter
Distribution

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9952-25

h-degruyter@puteus.de

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Sales Manager

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Sales Department, Germany

9952-52

9952-55

verkauf@puteus.de

Sales Department, Export

9952-60

9952-55

export@puteus.de

Customer Service and order processing

9952-12

9952-15

vertrieb@puteus.de

Accounting Department

9952-22

9952-24

finanzen@puteus.de

Import/Export customs clearance

9952-23

9952-24

finanzen@puteus.de

Puteus GmbH, a manufacturing and distributing company, was founded in 1979 by the parents of the present share holders. Puteus experienced a rapid development - from a supplier for products of the gardening and irrigation sector to a large range of the heating, plumbing- and garden components.



The company is based in Tönisvorst



The high-bay warehouse

Our modern warehouse with a capacity of 10.000 pallets and a picking area for further 3.000 pallets allows short delivery times.

In addition to our standard product range we also design and manufacture lots of OEM products for the sanitary and heating industries in production sites spread all over the world. Many of our products meet the different requirements and regulations, e.g. DVGW, PA-certificates, KIWA, ACS or SVGW.



Whether the customer orders full pallet units ...



...we supply individually and promptly.

Qualified employees in all areas of the company use their skills to satisfy your individual needs – from the standard fitting to the construction of customer-specific items.

In our German production sites we own different production lines, electroplating and modern robot plants, tool- and mould making as well as turnery and metal-work departments.



...or wishes smaller packing units ...



Ready for shipment.

The owner-managed family company **puteus GmbH** was the starting point for a group of companies of, today, about 250 employees. It has set itself the target of combining optimal quality and service and -at the same time- responding flexibly and promptly to the changes in the market. We are distinguished both by continuous development of knowledge and quality improvements of our products that are in the interest of our customers as well as commitment and curiosity for what is new and feasible.

These following companies also belong to the de Gruyter-Stach-Group



► Schlösser Armaturen GmbH & Co. KG

Im Dohm 3 | D-57462 Olpe

Phone: +49-27 61-607-0 | Fax: +49-27 61-607-10

E-Mail: info@schloesser-armaturen.de

Commercial register entry:

AG Siegen | HRA 8076 | UST-IDNR DE 814 779 086 | Sitz Olpe

CEO: Henning de Gruyter | Olaf Stach

**Water and heating connection valves
bib taps · appliance connection fittings
heating fittings · water meters
state-certified calibration unit for water meters**



► Heinrich Schulte GmbH & Co. KG

Grünlandweg 11 | D-58640 Iserlohn

Phone: +49-23 71-90 90-0 | Fax: +49-23 71-90 90-99

E-Mail: info@heinrichschulte.com

Commercial register entry:

AG Iserlohn | HRA 2276

UST-IDNR DE 233 202 839 | Sitz Iserlohn

CEO: Henning de Gruyter | Olaf Stach

Exclusive sanitary taps and mixers



► Heinrich Schulte GmbH & Co. KG

Giesestrasse 30 | D-58636 Iserlohn

Phone: +49-23 71-90 90-0 | Fax: +49-23 71-90 90-99

E-Mail: info@heinrichschulte.com

Commercial register entry:

AG Iserlohn | HRA 2276

UST-IDNR DE 233 202 839 | Sitz Iserlohn

CEO: Henning de Gruyter | Olaf Stach

Exclusive sanitary taps and mixers

www.eine-starke-gruppe.de

4

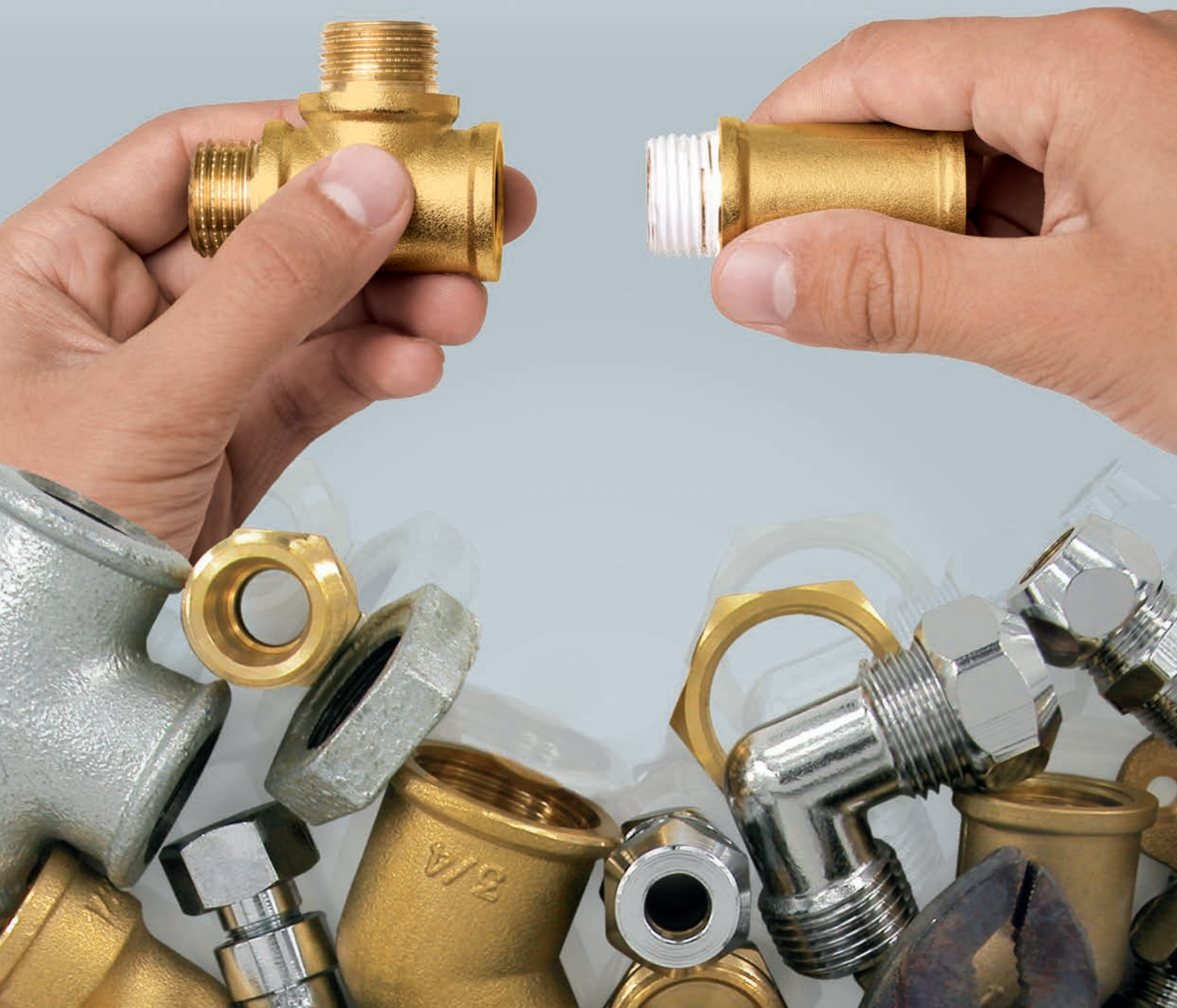


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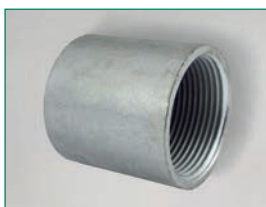
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Steel sockets and steel pipes

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Barrel nipples: galvanized and black

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Compression fittings of polypropylene

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Compression fittings of brass for corrugated pipes

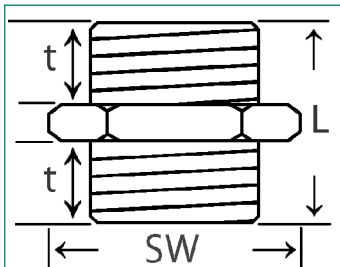
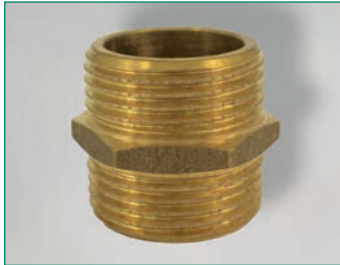
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Fittings made of brass

Material according to drinking water ordinance 50930-6, hot-pressed, thread to DIN EN ISO 228-1

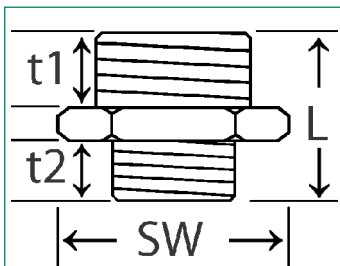
Double nipple



Both sides male threaded, hot-pressed

Item-No.: plain	Item-No.: chro.-plat.	Connection: male x male	Thread- length: t	Length: L	Wrench size: SW	Packing unit:
34408 4	-	1/8"	7	18	10	50/ 2000
34409 1	-	1/4"	8	20	14	25/ 1000
34410 7	35410 6	3/8"	9	22	17	50/ 800
34411 4	35411 3	1/2"	10	24	21	50/ 500
34412 1	35412 0	3/4"	11	26	27	15/ 240
34413 8	-	1"	12	29	34	15/ 180
34414 5	-	1 1/4"	15,5	37	42	10/ 150
34415 2	-	1 1/2"	17	38	48	10/ 70
34416 9	-	2"	18	48	60	1/ 36
34417 6	-	2 1/2"	22	50	76	1/ 36
34418-10948	-	3"	25	56	93	2/ 32
34419 0	-	4"	25	64	125	1/ 12

Double nipple, reduced

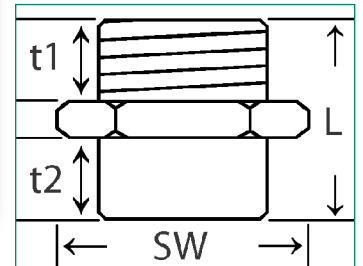


Both sides male threaded, hot-pressed

Item-No.: plain	Item-No.: chro.-plat.	Connection: male x male	Threadlength:		Length: L	W.s.: SW	Packing unit:
			t1	t2			
34418 3	-	1/8" x 1/4"	9	8	21	17	50/1200
34428 2	-	1/8" x 3/8"	10	9	23	17	50/ 700
34420 6	-	1/4" x 3/8"	10	9	23	17	50/ 700
34429 9	-	1/4" x 1/2"	10	9	23	21	25/ 500
34421 3	35421 2	3/8" x 1/2"	10	9	23	21	25/ 600
34427 5	35427 4	3/8" x 3/4"	10	9	24	27	25/ 500
34422 0	35422 9	1/2" x 3/4"	10,5	10,5	26	27	25/ 300
34877 8	-	1/2" x 1"	12	10,5	28	34	25/ 200
34875	-	1/2" x 1 1/4"	16	10,5	34	43	-/ -
34423 7	-	3/4" x 1"	12	11	28	34	10/ 150
34870 9	-	3/4" x 1 1/4"	15	10	35	42	10/ 150
34424 4	-	1" x 1 1/4"	14	12	32	42	10/ 100
34871 6	-	1" x 1 1/2"	18	13	39	50	10/ 70
34425 1	-	1 1/4" x 1 1/2"	18	14	38	48	10/ 80
34426 8	-	1 1/2" x 2"	18	14	44	60	1/ 48
34872 3	-	2" x 2 1/2"	22	22	54	80	1/ 54
34873 0	-	2" x 3"	20	22	52	89	1/ 18
34874 7	-	2 1/2" x 3"	30	27	67	89	1/ 30
34428-10948	-	3" x 4"	25	25	50	-	2/ 12

Double nipple, reduced

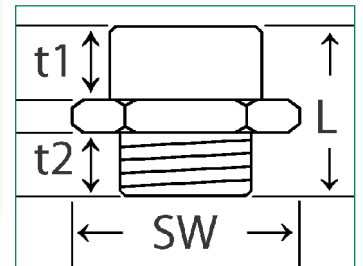
Female thread x male thread, female thread with flat seal, including seals made of NBR, hot-pressed



Item-No.: plain	Item-No.: chro.-plat.	Connection: female x male	Threadlength:		Length: L	Wr.size: SW	Pack. unit:
34430 5	-	1/4" x 3/8"	t1	t2	24	17	50/1000
34431 2	-	3/8" x 1/2"	12	10	25	21	20/ 400
34432 9	35432 8	1/2" x 3/4"	10,5	11	25	27	15/ 300
34433 6	-	3/4" x 1"	12	11	26	33	15/ 150
34434 3	-	1" x 1 1/4"	14	12	30	41	10/ 200
34435 0	-	1 1/4" x 1 1/2"	18	17	43	47	10/ 100
34436 7	-	1 1/2" x 2"	20	19	46	60	1/ 60

Double nipple, reduced

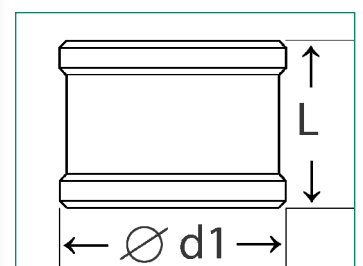
Male thread x female thread, female thread with flat seal, including seals made of NBR, hot-pressed



Item-No.: plain	Item-No.: chro.-plat.	Connection: male x female	Threadlength:		Length: L	Wr.size: SW	Pack. unit:
34440 4	-	1/4" x 3/8"	t1	t2	22	21	50/500
34441 1	35441 0	3/8" x 1/2"	11	10	25	25	20/300
34442 8	35442 7	1/2" x 3/4"	10	10	23	29,7	20/300
34443 5	-	3/4" x 1"	11	11	26	36	15/ 150
34444 2	-	1" x 1 1/4"	12	12	29	45	10/ 100
34445 9	-	1 1/4" x 1 1/2"	14	20	38	55	10/ 70
34446 6	-	1 1/2" x 2"	18	21	43	70	10/ 60

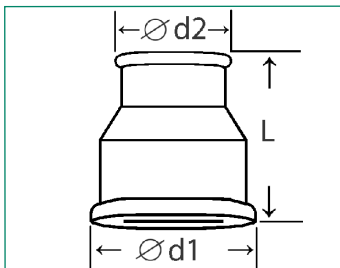
Socket

Female thread, hot-pressed



Item-No.: plain	Item-No.: chro.-plat.	Connection:	Length: L	Ø d1	Packing unit:
34468 8	35468 7	1/8"	16	13,8	50/1000
34469 5	35469 4	1/4"	18	18	50/ 900
34460 2	35460 1	3/8"	24	23	20/ 400
34461 9	35461 8	1/2"	25,5	26,8	15/ 300
34462 6	35462 5	3/4"	29	34	10/ 200
34463 2	-	1"	30,5	41	10/ 100
34464 0	-	1 1/4"	36	51	10/ 80
34465 7	-	1 1/2"	40,1	58	5/ 60
34466 4	-	2"	43	69	5/ 50

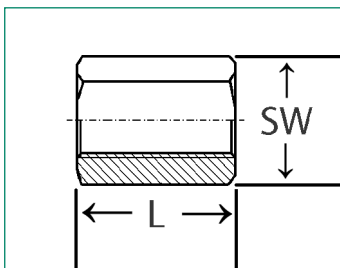
Socket, reduced



Both sides female threaded, hot-pressed

Item-No.:	Item-No.:	Connection:	Length:			Packing unit:
plain	chro.-plat.		L	Ø d1	Ø d2	
34470 1	35470 0	1/4" x 3/8"	23	23	18	25/ 450
34478 7	35478 6	3/8" x 1/2"	27	27	23	20/300
34472 5	35472 4	1/2" x 3/4"	27	34	27	10/ 200
34479 4	35479 3	1/2" x 1"	40	41,5	27,5	10/ 100
34473 2	35473 1	3/4" x 1"	37,5	41,5	34	10/ 100
34477 0	-	3/4" x 1 1/4"	40	51	34	10/ 120
34474 9	35474 8	1" x 1 1/4"	43	51	41,5	10/ 80

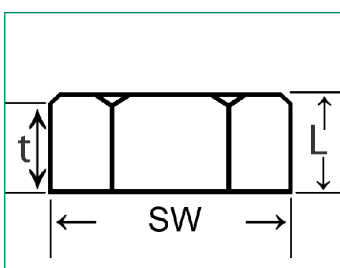
Socket, with external hexagon



Female thread, hot-pressed

Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Wrench size:	Packing unit:
plain	nickel plat.			L	SW	
-	S-467	1/8"	15	15	13	100/2500
-	S-468	1/4"	22	22	17	50/1000
-	S-699	3/8"	22	22	22	25/ 600
-	S-469	1/2"	26	26	27	25/ 350
-	S-769	3/4"	34	34	32	25/ 200

Cap



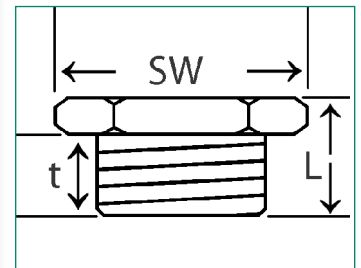
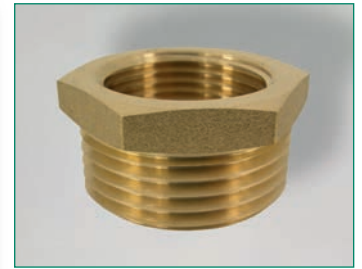
External hexagon, male thread, hot-pressed

Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Wrench size:	Packing unit:
plain	chro. plat.	male		L	SW	
34488 8	-	1/8"	8	10	12,9	100/2400
34489 3	-	1/4"	8	10	15,9	50/ 1500
34480 0	35480 9	3/8"	8	10,5	18,5	50/1200
34481 7	35481 6	1/2"	9	12	23	50/ 700
34482 4	35482 3	3/4"	12	14	29	50/ 400
34483 1	35483 0	1"	12,5	15	38	25/ 200
34484 8	35484 7	1 1/4"	14	17	46	25/ 150
34485 5	-	1 1/2"	16	19,5	53	10/ 150
34486 2	-	2"	17	19,5	64	10/ 90

Male thread x female thread, hot-pressed

Item-No.:	Item-No.:	Connection:	Threadlength:		Length	W.s.:	Pack. unit:
plain	chro.-plat.	male x female	m	f	L	SW	
34449 7	-	1/4" x 1/8"	7	11	11	14	100/2000
34458 9	-	3/8" x 1/8"	10	15	15	17	50/1000
34450 3	35450 2	3/8" x 1/4"	10	15	15	17	100/1200
34451 0	35451 9	1/2" x 3/8"	12	16	16	21	25/ 600
S-3761	-	1/2" x 3/8"	12	18	18	24	50/ 500
34459 6	-	1/2" x 1/4"	12	16	16	21	25/ 600
S-3760	-	1/2" x 1/4"	12	18	18	24	50/ 400
34457 2	35457 1	3/4" x 3/8"	13	19	19	27	25/ 300
34452 7	35452 6	3/4" x 1/2"	13	18	18	27	25/ 500
34683 5	-	1" x 3/8"	14	14	21	34	10/ 150
34447 3	35447 2	1" x 1/2"	14	14	22	34	25/ 150
34453 4	35453 3	1" x 3/4"	13	19	19	34	25/ 250
34684 2	-	1 1/4" x 3/4"	20	16	31	44	10/ 80
34454 1	-	1 1/4" x 1"	15	22	22	42	10/ 150
34685 9	-	1 1/2" x 3/4"	16	19	25	50	10/ 120
34686 6	-	1 1/2" x 1"	16	18	25	50	-/ 80
34455 8	-	1 1/2" x 1 1/4"	13	23	23	50	10/ 160
34687 3	-	2" x 1"	17	20	26,5	60	-/ 40
34448 0	-	2" x 1 1/4"	17	18	26,5	60	10/ 50
34456 5	-	2" x 1 1/2"	18	26,5	26,5	60	5/ 50
34438 1	-	2 1/2" x 2"	22	32	32	78	1/ 44
34688 0	-	3" x 2"	23	26,5	36	90	1/ 36
34439 8	-	3" x 2 1/2"	23	36	36	93	1/ 36

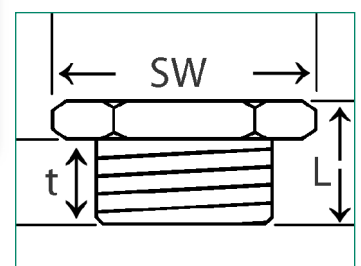
Bushing



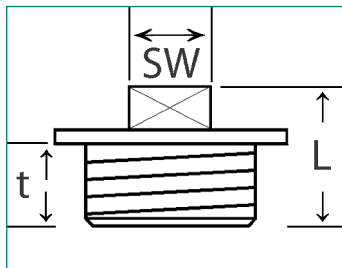
External hexagon, hot-pressed

Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Wrench size:	Packing unit:
plain	chro. plat.	male	t	L	SW	
34001 7	-	1/8"	7	12	13	100/1300
34002 4	-	1/4"	7	12	14	100/1500
34003 1	-	3/8"	9	15	17	50/1250
34004 8	-	1/2"	9	15	21	50/1200
34005 5	-	3/4"	11	18,5	27	25/ 300
34006 2	-	1"	12	20	34	25/ 150

Brass plug



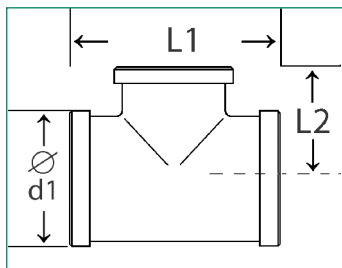
Brass plug



Square head, with collar, hot-pressed

Item-No.: plain	Item-No.: chro. plat.	Connection: male	Thread-length: t	Length: L	Wrench size: SW	Packing unit:
34490 9	35490 8	3/8"	8	15,5	12	50/800
34491 6	35491 5	1/2"	8,5	17,5	12	50/600
34492 3	35492 2	3/4"	8,5	17,5	14	20/400
34493 0	35493 9	1"	13	22,5	17	25/200
34494 7	-	1 1/4"	13	23	19	10/ 150
34495 4	-	1 1/2"	13	26	22	10/ 100
34496 1	-	2"	14	28	24	10/ 70

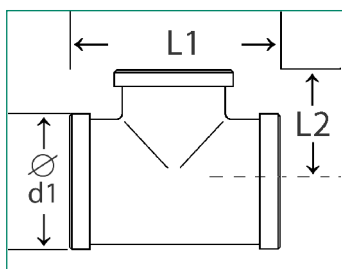
Tee



All sides female threaded, hot-pressed

Item-No.: plain	Item-No.: chro. plat.	Connect.: female	Thread-length: t	Length:		Ø d1	Pack. unit:
				L1	L2		
S-1821	-	1/8"	9,5	31	15,75	14,5	10/ 120
34609 5	-	1/4"	13	35	16,5	21	25/250
34600 2	35600 1	3/8"	12	48	24,5	21	10/180
34601 9	35601 8	1/2"	13	51	27,25	28,5	10/ 100
34602 6	35602 5	3/4"	14	61	30,4	30,7	10/ 80
34603 3	35603 2	1"	18	75	34,5	40	5/ 50
34604 0	-	1 1/4"	19	89	44	50	5/ 30
34605 7	-	1 1/2"	21	95	47	58	1/ 30
34606 4	-	2"	20	101	50,5	69	1/ 16

Tee, reduced



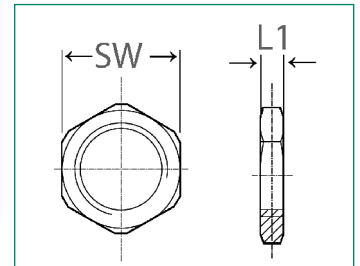
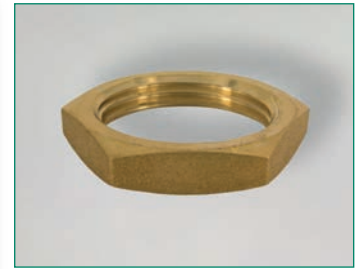
All sides female threaded, hot-pressed

Item-No.: plain	Item-No.: chro. plat.	Connection: female	Thread-length: t	Length:		Ø d1	Pack. unit:
				L1	L2		
34671 2	-	1/2" x 3/8" x 1/2"	13	44	22	28,5	25/180
34672 9	-	3/4" x 1/2" x 3/4"	16	53,5	27,4	33,2	10/100
34673 6	-	1" x 3/4" x 1"	18	68	32	40	10/ 70
34678 1	-	3/4" x 3/4" x 1/2"	15	59	29,4	33,2	10/ 80

External hexagon, hot-pressed

Item-No.: plain	Item-No.: chro.plat.	Connection: female	Length: L1	Wrenchsize: SW:	Packing unit:
34613 2	-	1/8"	4,5	14	100/ 3200
34614 9	-	1/4"	5	17	100/ 3200
34615 6	-	3/8"	5	25	-/ 1100
34615-SW19 6	-	3/8"	5	19	-/-
52075 4	-	1/2"	5	27	-/ 1100
34616 3	-	3/4"	6	32	50/ 800
34617 0	-	1"	8	38	-/ 500
34610 1	-	1 1/4"	7	50	50/ 500
34619 4	-	1 1/2"	7	56	50/ 400

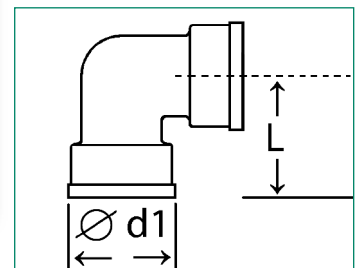
Locknut



Both sides female threaded, hot-pressed

Item-No.: plain	Item-No.: chro.plat.	Connection: female	Thread-length:	Length:		Packing unit:
				L	Ø d1	
S-1699	-	1/8"	10	15	14	25/ 300
34629 3	-	1/4"	10	18,5	21	50/ 400
34620 0	35620 9	3/8"	11	21,5	23	10/ 200
34621 7	35621 6	1/2"	13	25,25	27,5	25/ 100
34622 4	35622 3	3/4"	16	28,75	35,5	10/ 120
34623 1	35623 0	1"	18	33,5	41	10/ 70
34624 8	-	1 1/4"	19	46,5	51	5/ 50
34625 5	-	1 1/2"	21	57	58	5/ 30
34626 2	-	2"	23	58,5	71	1/ 20

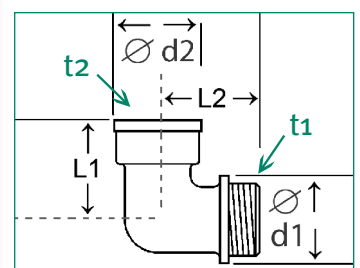
Elbow (90°)



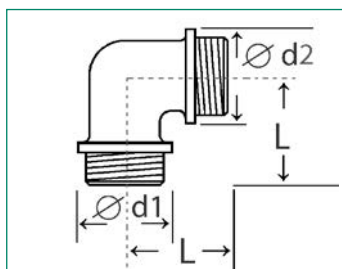
Female thread x male thread, hot-pressed

Item-No.: plain	Item-No.: chro. plat.	Conn.: f x m	Threadlength:		Length:				Packing unit:
			m t1	f t2	L1	L2	Ø d1	Ø d2	
34649 1	-	1/4"	9	9	25	34,5	18	21	50/ 300
34640 8	35640 7	3/8"	10	11	25,75	29,25	22,5	23,5	25/ 250
34641 5	35641 4	1/2"	11	13	30,35	30,75	25,5	27,5	10/ 120
34642 2	35642 1	3/4"	14	16	38,5	38,5	32	34	10/ 100
34643 9	35643 8	1"	15	19	44	44	38	40	10/ 60
34644 6	-	1 1/4"	18	19	53	57	47	50	5/ 40
34645 3	-	1 1/2"	21	21	57	62	53	58	5/ 30
34646 0	-	2"	22	23	70	76	66	70	1/ 16
34648 4	-	3"	27	27	95	95	100	100	-/-

Elbow (90°)



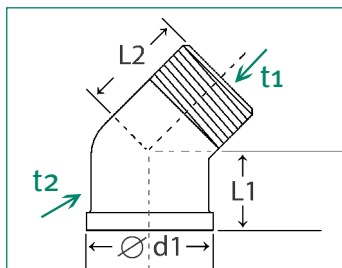
Elbow (90°)



Both sides male threaded, hot-pressed

Item-No.: plain	Item-No.: chro. plat.	Connection: male x male	Thread-length:	Length:		Packing unit:
				L	Ø d1	
34650 7	35650 6	3/8"	10	30	22,5	25/250
34651 4	35651 3	1/2"	10,5	30,75	26,5	25/150
34652 1	35652 0	3/4"	14	38,5	32	10/100
34653 8	-	1"	15	43	38	10/ 70

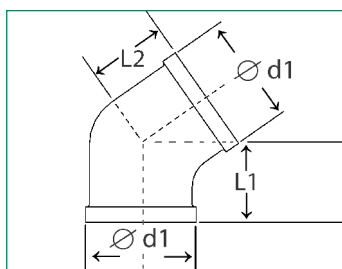
Elbow (45°)



Male thread x female thread, hot-pressed

Item-No.: plain	Item-No.: chro. plat.	Conn.: m x f	Threadlength:		Length:			Packing unit:
			m t1	f t2	L1	L2	Ø d1	
34770 2	-	3/8"	10	12	20	22	26	25/250
34771 9	-	1/2"	12	14	22	25,5	28	25/240
34772 6	-	3/4"	12	14	25	32	35	10/ 120
34773 3	-	1"	15	18	26,5	32	41	-/ 70
34778 8	-	3"	29,5	27	60	60	100	1/ 6

Elbow (45°)



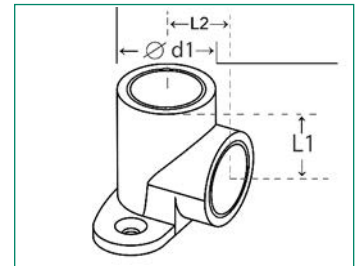
Female thread x female thread, hot-pressed

Item-No.: plain	Item-No.: chro. plat.	Conn.: f x f	Thread-length:	Length:		Ø d1	Packing unit:
				L1	L2		
34780 0	-	3/8"	12	20	20	26	-/-
34781 7	-	1/2"	14	22	22	28	-/200
34782 5	-	3/4"	14	25	25	35	10/120

Female thread x female thread, hot-pressed

Item-No.:	Item-No.:	Conn.:	Thread-length:	Length:			Packing unit:
plain	chro. plat.	f x f		L1	L2	Ø d1	
34791 7	35791 6	1/2"	11	22	19	26	10/160

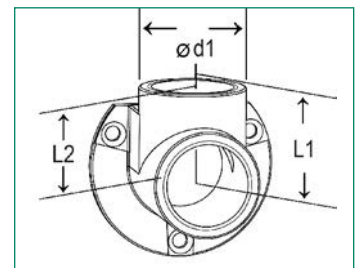
Wall bracket (90°)



Female thread x female thread, hot-pressed

Item-No.:	Item-No.:	Conn.:	Thread-length:	Length:			Packing unit:
plain	chro. plat.	f x f		L1	L2	Ø d1	
34792 4	-	3/4"	12	23,7	25,5	31,5	10/100

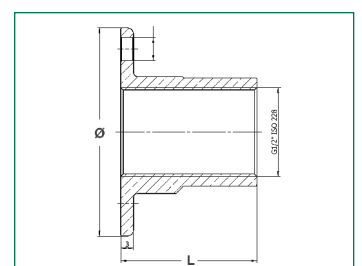
Wall bracket (90°)



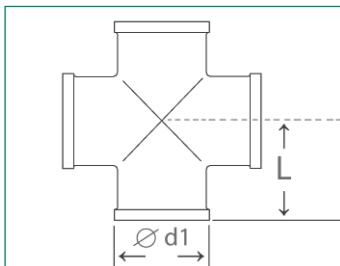
Female thread x female thread, hot-pressed, horizontal passage

Item-No.:	Item-No.:	Conn.:	Thread-length:	Length:			Packing unit:
plain	chro. plat.			L	Ø	Wrench size:	
S-4106	-	G 1/2"		32	49	26	-/180

Wall plate (90°)



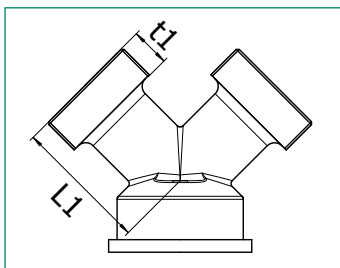
Cross fitting, 90°



Female thread, hot-pressed

Item-No.:	Item-No.:	Connection:	Thread-length:	Length:		Packing unit:
plain	chro. plat.	female		L	Ø d1	
34801 3	-	1/2"	15	28,5	24	10/120
34803 7	-	1"	18	37,5	38	-/-

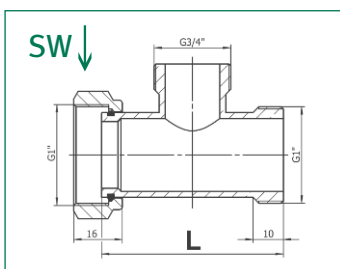
Y-connector



Nominal diameter 1/2", 2 x male threads, 1 x female thread, without seal

Item-No.:	Item-No.:	Connection:	Threadlength:	Length:	Packing unit:
plain	chro. plat.	f/m	t1	L1	
34992 8	35992 7	3/4"	9	26	10/150
34999 7	35999 6	3/4"	9	32	-/-

T-piece with union nut



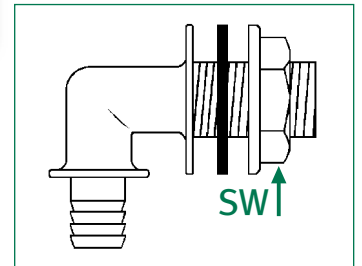
Plain brass, f x m x f, snap ring stainless steel

Item-No.:	Connec.:	Thread-length:	Length:	Wrench size:	Packing unit:
	F x M (1) x M (2)	t1 IG/t2 AG	L	SW	
S-3412	G1" x G3/4" x G1"	16/10	60	37	-/-

Tank connector

Incl. lock nut and NBR-thread

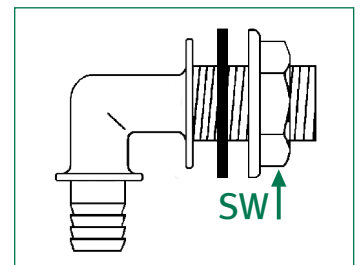
Item-No.:	Connection:	NW-spout:	Wrench size:	Packing unit:
S-385-11463-N	F 1" x M 1"	25 mm	38	5/40
Replacement seal				
S-385-Dichtung	34 x 50 x 3 mm			-/-
S-385-Körper	only body, M 1"	25 mm		5/40
S-385-Mutter	F 1", Ø 55 x 10,5 mm		38	



Tank connector (market model)

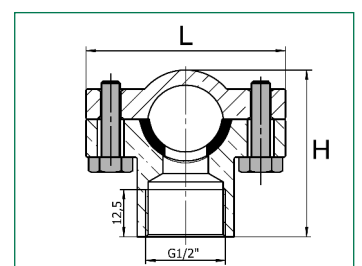
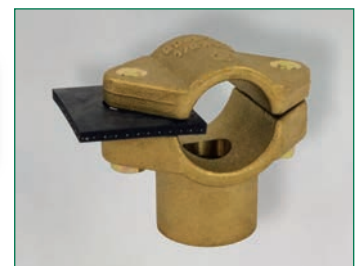
Incl. lock nut and NBR-thread

Item-No.:	Connection:	NW-spout:	Wrench size SW:	Packing unit:
S-3213	f 1" x m 1"	25 mm	37	5/40
Replacement seal				
S-3222-1/2-D	33 x 29 x Ø11 mm			



SBR-thread with textile insert

Item-No.:	Connection:	Length L:	H:	Packing unit:
S-3222-1/2	22 mm x G 1/2"	52,5 mm	44	-/90

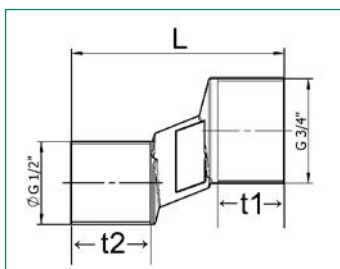


S-connector



S-connector nipple, nickel plated, extension 12,5 mm, 3/4" m x 1/2" m, wrench size 16

Item-No.:	Item-No.:	Connection:	Threadlength:		Length:	Wrench size:	Pack. unit:
plain	chro. plat.		t1	t2	L	SW:	
-	35610 0	3/4" m x 1/2" m	16	19	51	16	25/200



Plug with slotted screw



Plug, plain brass with slotted screw chrome-plated

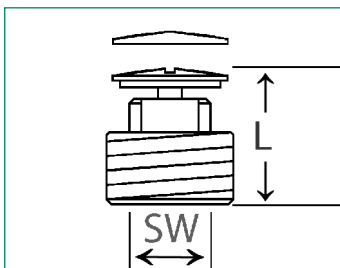
Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Wrench size:	Packing unit:
		male		L	SW:	
34618 7	-	3/8"	10	20	9	25/1000
34611 8	-	1/2"	11	21	9	50/ 500
34612 5	-	3/4"	14	26	12	25/ 500

Accessories: Protective plastic cap

34611-Kappe universal 500/10000

Closing plug, plain brass with slotted screw chrome-plated + protective plastic cap

34618-11325		3/8"	10	20	9	25/1000
34611-11325		1/2"	11	21	9	25/ 800
34612-11325		3/4"	14	26	12	25/ 500



Compression fittings for copper pipes

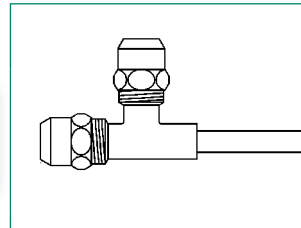
Material in accordance with DIN 50960-6, operating temperature max. 90°C,
operating pressure max. 10 bar.

Important note: compression fittings are for single use only!

T-branch piece

T-piece with extension and two high tensile brass cone compression fittings with length compensation, chrome plated

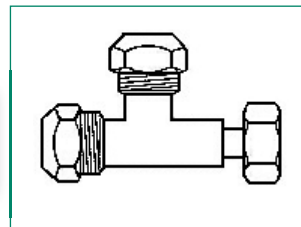
Item-No.:	Connection:	Leaving:	Packing unit:
52267 3	3/8"	3/8" x 10 mm	25/100



T-branch piece

T-piece with union nut and two high tensile brass cone compression fittings with length compensation, chrome plated

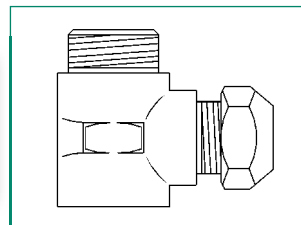
Item-No.:	Connection:	Leaving:	Packing unit:
52267-3/8"	3/8"	3/8" x 10 mm	25/150



T-branch piece

T-piece female/male with a compression fitting, chrome plated

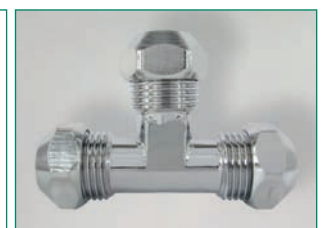
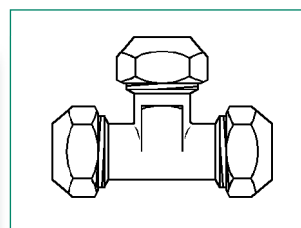
Item-No.:	Connection:	Leaving:	Packing unit:
52463 9	1/2" x 1/2"	3/8" x 10 mm	10/200
52464 6	1/2" x 1/2"	1/2" x 12 mm	10/200



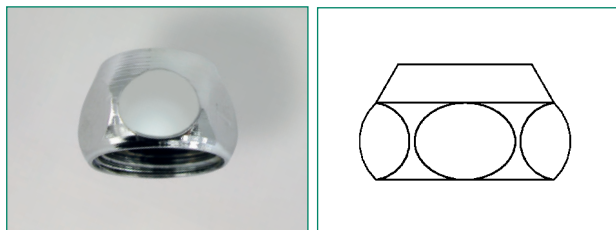
T-branch piece

T-piece with 3 x compression fittings, chrome plated

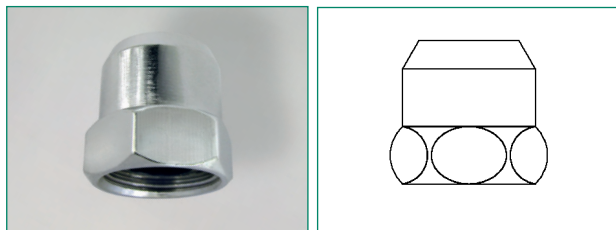
Item-No.:	Connection:	Packing unit:
52470 7	3/8" x 8 mm	10/200
52471 4	3/8" x 10 mm	10/200
52472 1	1/2" x 12 mm	10/160



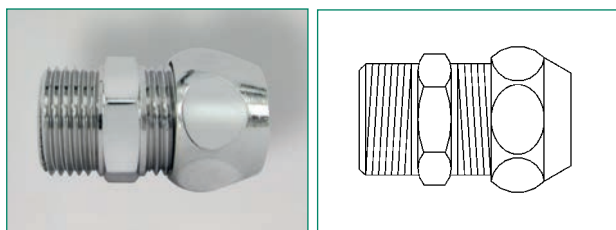
Compression fitting, loose



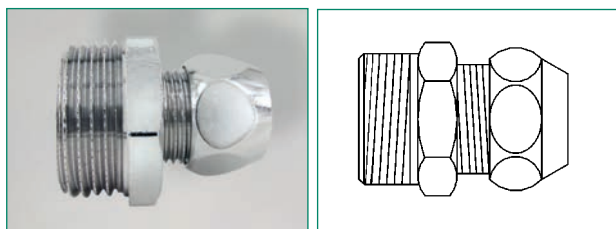
Compression fitting, loose



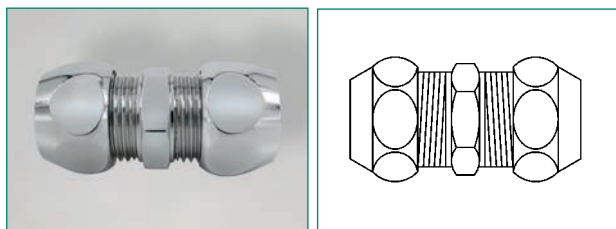
Single compression fitting



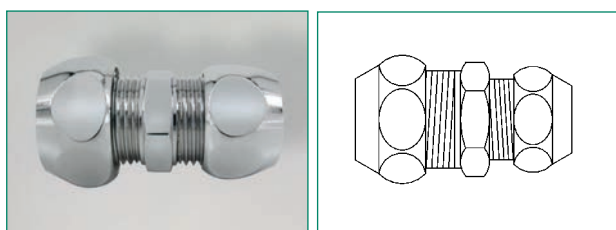
Single compression fitting



Double compression fitting



Double compression fitting



Compression fitting without length compensation, chrome-plated

Item-No.:	Connection:	Packing unit:
52450 9	3/8" x 8 mm	25/1000
52451 6	3/8" x 10 mm	25/1000
52452 3	3/8" x 12 mm	25/1000
52450-1/2"	1/2" x 8 mm	25/1000
52451-1/2"	1/2" x 10 mm	25/1000
52452-1/2"	1/2" x 12 mm	25/1000

Compression fitting with length compensation, chrome-plated

Item-No.:	Connection:	Packing unit:
52451-lang	3/8" x 10 mm	150/750

On nipple, chrome-plated

Item-No.:	Connection: m x m x Ø	Packing unit:
52494 3	3/8" x 3/8" x 8 mm	25/250
52495 0	3/8" x 3/8" x 10 mm	25/250
52497 4	1/2" x 1/2" x 10 mm	25/200
52496 7	1/2" x 1/2" x 12 mm	25/200

On reducing nipple, chrome-plated

Item-No.:	Connection: m x m x Ø	Packing unit:
52498 1	3/4" x 3/8" x 10 mm	25/-

Chrome-plated

Item-No.:	Connection: m x m x Ø	Packing unit:
52490 5	3/8" x 3/8" x 8 mm	25/250
52491 2	3/8" x 3/8" x 10 mm	25/250
52491-12 mm	3/8" x 3/8" x 12 mm	25/250
52492 9	1/2" x 1/2" x 12 mm	25/250

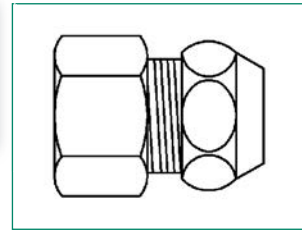
Reduced, chrome-plated

Item-No.:	Connection: m x m x Ø	Packing unit:
52493 6	3/8" x 10 mm x 3/8" x 8 mm	25/400
52499 8	1/2" x 12 mm x 3/8" x 10 mm	50/700

On nipple with female thread, chrome-plated

Item-No.:	Connection: f x m x Ø	Packing unit:
52495-IG	3/8" x 3/8" x 10 mm	50/500
52499-IG	1/2" x 3/8" x 10 mm	25/300

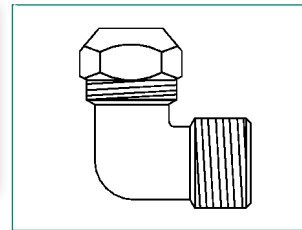
Compression fitting



Elbow male/male with single compression fitting, chrome-plated

Item-No.:	Connection: m x m x Ø	Packing unit:
52486 8	3/8" x 3/8" x 10 mm	25/300
52486-1/2"	1/2" x 1/2" x 10 mm	10/250
52487 5	1/2" x 1/2" x 12 mm	25/150

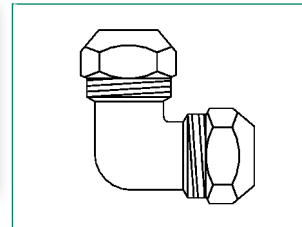
Elbow with one compression fitting



Elbow male/male with two compression fittings, chrome-plated

Item-No.:	Connection: m x m x Ø	Packing unit:
52480 6	3/8" x 3/8" x 8 mm	25/400
52481 3	3/8" x 3/8" x 10 mm	25/400
52487-11001	1/2" x 1/2" x 12 mm	25/-

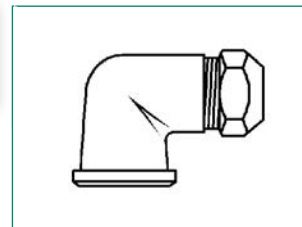
Elbow with two compression fittings



Elbow female/male with compression fitting, chrome-plated

Item-No.:	Connection: f x m x Ø	Packing unit:
52483 7	1/2" x 3/8" x 10 mm	10/150

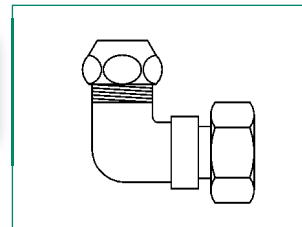
Elbow with one compression fitting



Elbow, rotatable, union nut at one and compression fitting at the other end, chrome-plated

Item-No.:	Connection: f x m x Ø	Packing unit:
52489 9	3/8" x 3/8" x 10 mm	10/250

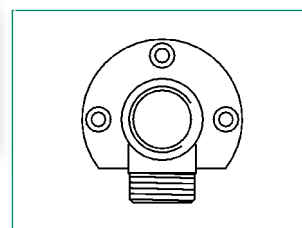
Elbow with one compression fitting



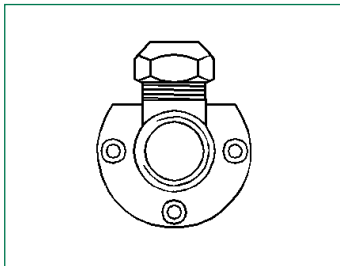
Wall plate elbow, without compression fitting, chrome-plated

Item-No.:	Connection: f x m x Ø	Packing unit:
52466 0	1/2" x 3/8" x 12,5 mm	10/120
52467 7	1/2" x 1/2" x 12,5 mm	15/180

Wall plate elbow



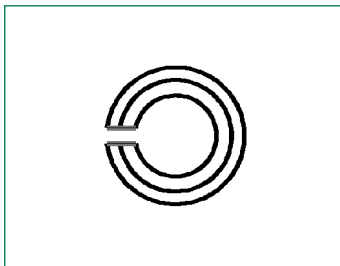
Wall plate elbow



Wall plate elbow, with one compression fitting, chrome-plated

Item-No.:	Connection: f x m x Ø	Packing unit:
52461 5	1/2" x 3/8" x 10 mm	10/100
52462 2	1/2" x 1/2" x 12 mm	10/150

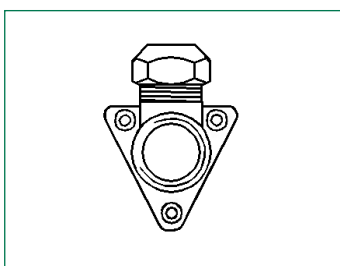
Accessories for compression fittings



Clamping ring for brass compression fittings, series 524xx, chrome-plated

Item-No.:	Connection:	Packing unit:
52455 4	3/8" x 8 mm	1000/15000
52456 1	3/8" x 10 mm	1000/15000

Wall plate elbow

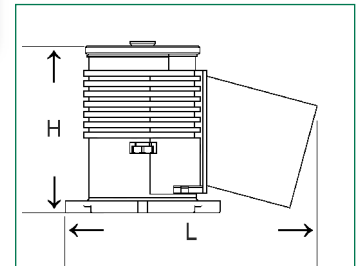


Wall plate elbow, brass plain, with one compression fitting

Item-No.:	Connection: f x m x Ø	Packing unit:
34881 5	1/2" x 1/2" x 16 mm	25/150

Wall box

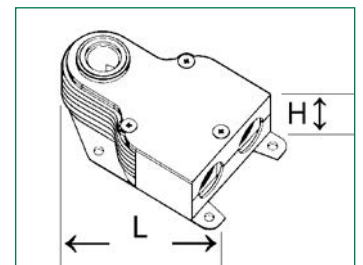
Wall box easy with Euro adapter connection, female thread/male thread, housing polypropylene with talc, fitting brass, screws stainless steel



Item-No.:	Connection:	Length:		Packing unit:
		L	H	
S-2828	1/2" x 3/4"	95	63	-/72
Replacement gasket				
S-2828-Dichtung	Ø12 x Ø37 x 25,5 mm			50/450

Wall box

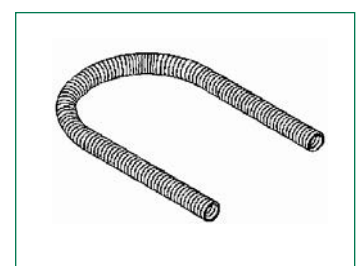
Wall box double with Euro adapter connection, female thread/male thread, housing polypropylene with talc, fitting brass, screws stainless steel



Item-No.:	Connection:	Length:		Packing unit:
		L	H	
S-2829	1/2" x 3/4"	132	40,5	-/54

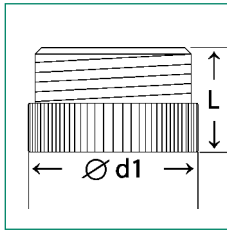
Bending spring

Bending spring for compound pipe, galvanized steel



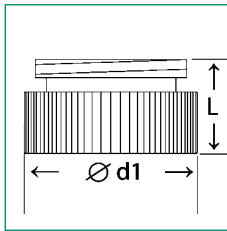
Item-No.:	Connection:	Length:		Packing unit:
	Ø inside/outside	L	H	
S-2928-16	16,7 / 20,85	500		1/40
S-2928-20	20,6 / 24,6	500		1/34

Adapter fitting

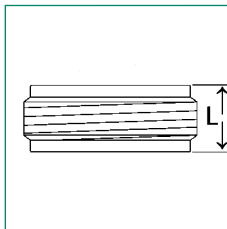


Brass chrome-plated

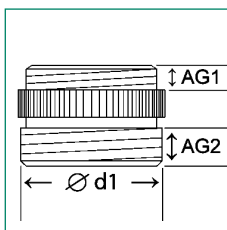
Item-No.:	Connection:	Thread-length:		Length L	Ø d1	Packing unit:
		f	m			
35630 8	M 22/1" f x 1/2" m	5,5	8,5	16	24	50/1000
35631 5	M 22/1" f x 3/4" m	6	9,5	16	26	50/ 500



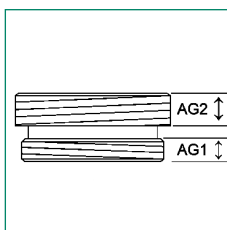
Item-No.:	Connection:	Thread-length:		Length L	Ø d1	Packing unit:
		m	f			
35632 2	M 22/1" m x 1/2" f	2,5	7,5	13	24	50/1000
35633 9	M 22/1" m x 3/4" f	6,5	8,5	16,5	29	50/ 700



Item-No.:	Connection:	Length: L	Packing unit:
35634 6	M 22/1" f x 3/4" m x 1/2" f	10	50/2000



Item-No.:	Connection:	Threadlength:		Length: L	Ø d1	Packing unit:
		m AG1	m AG2			
35635 3	M 24/1" m x 3/4 m	4,5	7	18,5	27	50/400



Item-No.:	Connection:	Threadlength:		Length L	Packing unit:
		m AG1	m AG2		
35636 0	M 24/1" m x M 22/1 m	4	3,5	9,5	50/1000

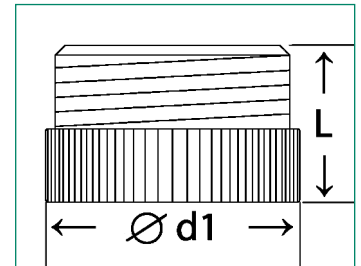
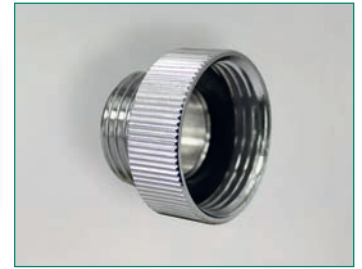
Seals

Item-No.:	for item:	Connection:	Item-No.:	for item:	Connection:
35630/31-Dichtung	35630/31	21 x 15 x 1,5 mm	35633/38/39-Dichtung	35633/38/39	24 x 16 x 2,5 mm
35632-Dichtung	35632	18,5 x 15 x 2 mm	35636-Dichtung	35636	21 x 15 x 2,5 mm
35635-Dichtung	35635	22 x 17 x 1,5 mm			

Adapter fitting

Brass chrome-plated, knurled, with sealing

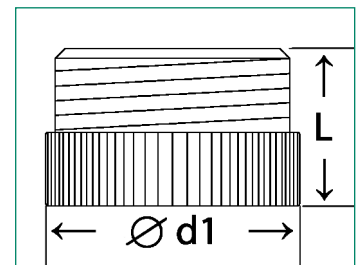
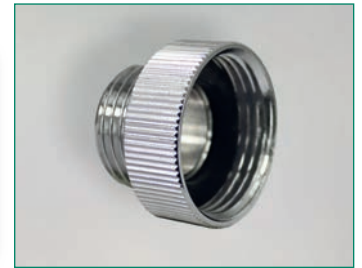
Item-No.:	Connection:	Threadlength:		Length:		Packing unit:
		male	female	L	Ø d1	
35638 4	1/2" m x 3/4" f	10	9,5	20	29	50/600



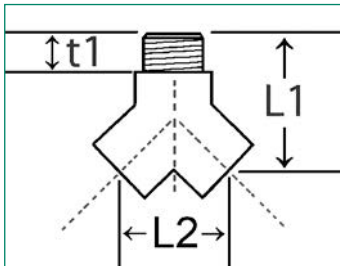
Adapter fitting

Brass chrome-plated, corded or with external hexagon, with sealing

Item-No.:	Connection:	Threadlength:		Length:		Wrench-size:	Packing unit:
		m	f	L	Ø d1	SW:	
35639 1	1" f x 3/4" m	10	10	22	38	-	25/250
35432-40748	1/2" f x 3/4" m	8	8	17	26	23	50/800



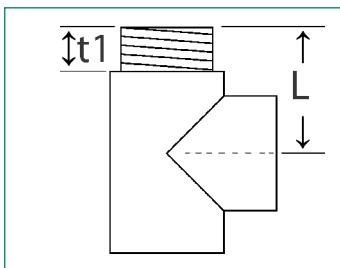
Y-connector



Brass polished chrome-plated, 2 x female, 1 x male thread

Item-No.:	Item-No.:	Connec.:	Thread-length:	Length:		Packing unit:
plain	chrom. plat.		t1	L1	L2	
-	35991 0	1/2"	12	42	32	10/120

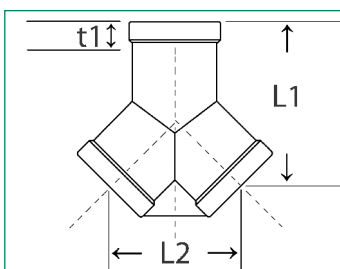
Tee



Brass, polished chrome-plated, 1/2" male x 1/2" female x 1/2" female thread

Item-No.:	Connection:	Threadlength:		Length:	Packing unit:
chrome-plated		m t1	f	L	
35997 2	1/2"	10	15	28	10/120

Y-connector



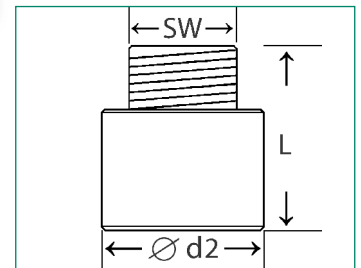
3 x 3/8" female thread

Item-No.:	Item-No.:	Connec.:	Thread-length:	Length:		Packing unit:
plain	chrom. plat.		t1	L1	L2	
S-1828	-	3/8"	16	39	30	10/150

Adapter fitting

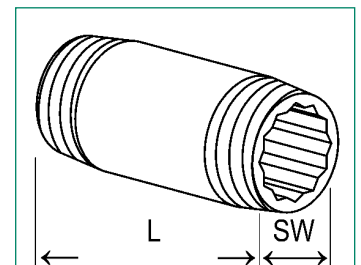
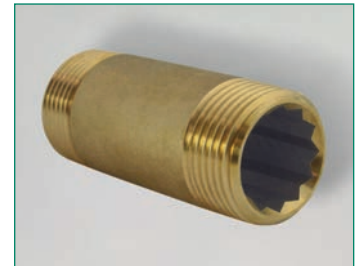
Item-No.:	Item-No.:	Connection:	Threadlength:		Length:		Wre.-size:	Packing unit:
plain	chro. pla.		f	m	f/m	Ø d2	SW	
34637 8	35637 7	1/2" f x 3/8" m	14	10	29	25,5	11	20/300
34690 3	35690 2	3/4" f x 1/2" m	13	11	30	31,5	12	20/180
34691 9	35691 0	3/4" f x 3/8" m	14	10	29	32	11	20/240

Extension, reduced



Brass pipe

With internal polygon, on both sides tapered male thread according to EN10226-1/ISO7-1

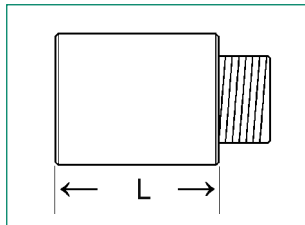


Länge:	R3/8" SW 10 blank	R3/8" SW 10 verchromt	R1/2" SW 12 blank	R1/2" SW 12 verchromt	R3/4" SW 17 blank	R3/4" SW 17 verchromt	R1" SW 22 blank	R1" SW 22 verchromt	VE:
30 mm	29210 1	29215 6	29211 8	29216 3	29212 5	29217 0	29213 2	29218 7	-/10
40 mm	29220 0	29225 5	29221 7	29226 2	29222 4	29227 9	29223 1	29228 6	-/10
50 mm	29230 9	29235 4	29231 6	29236 1	29232 3	29237 8	29233 0	29238 5	-/10
60 mm	29240 8	29245 3	29241 5	29246 0	29242 2	29247 7	29243 9	29248 4	-/10
80 mm	29250 7	29255 2	29251 4	29256 9	29252 1	29257 6	29253 8	29258 3	-/10
100 mm	29260 6	29265 1	29261 3	29266 8	29262 0	29267 5	29263 7	29268 2	-/10
120 mm	29270 5	29275 0	29271 2	29276 7	29272 0	29277 4	29283 5	29278 1	-/10
130 mm	-	-	-	-	-	-	29293 4	-	-/10
150 mm	29280 4	29285 9	29281 1	29286 6	29282 8	29287 3	-	29288 0	-/10
200 mm	29290 3	29295 8	29291 0	29296 5	29292 7	29297 2	-	29298 9	-/10

Tap extension



Plain brass or chrome-plated brass, according to DIN 3523



Con.:	plain	chr. pla.	Packing unit:	plain	chr. pla.	Packing unit:	plain	chr. pla.	Packing unit:	plain	chr. pla.	Packing unit:
L mm	G 3/8"	G 3/8"		G 1/2"	G 1/2"		G 3/4"	G 3/4"		G 1"	G 1"	
10	34810 9	35810 4	10/500	34811 2	35811 1	10/400	34812 9	35812 8	10/200	-	-	-
15	34815 0	35815 9	10/500	34816 7	35816 6	10/300	34817 4	35817 3	10/200	-	-	-
20	34820 4	35820 3	10/400	34821 1	35821 0	10/250	34822 8	35822 7	10/150	34823 5	35823 4	10/100
25	34825 9	35825 8	10/300	34826 6	35826 5	10/200	34827 3	35827 2	10/150	34828 0	35828 9	10/100
30	34830 3	35830 2	10/250	34831 0	35831 9	10/150	34832 7	35832 6	10/150	34833 4	35833 3	10/ 50
35	34835 8	-	10/200	34836 5	-	10/100	34837 2	-	10/100	-	-	-
40	34840 2	35840 1	10/200	34841 9	35841 8	10/150	34842 6	35842 5	10/100	34843 3	35843 2	10/100
45	34845 7	-	10/ 150	34846 4	35846 3	5/ 100	34847 1	35847 0	5/ 50	-	-	-
50	34850 1	35850 0	5/ 150	34851 8	35851 7	5/ 100	34852 5	35852 4	5/ 50	34854 9	35854 8	5/ 50
60	34855 6	-	5/ 100	34856 3	-	5/ 100	34857 0	-	5/ 50	-	-	-
65	34860 0	35860 9	5/ 100	34861 7	35861 6	5/ 100	34862 4	35862 3	5/ 50	-	-	-
80	34865 5	35865 4	5/ 100	34866 2	35866 1	5/ 50	34867 9	35867 8	5/ 50	-	-	-
100	34859 4	35859 3	5/ 50	34858 7	35858 6	5/ 50	34868 6	-	5/ 50	34864 8	35864 7	5/ 30

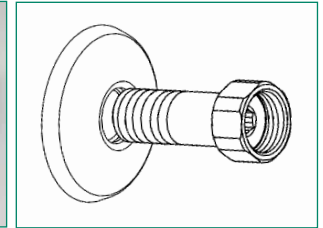
Fittings, model SUISSE, with SVGW-certification



Straight screw fitting, chrome-plated and polished, with screw rosette

Screw fitting

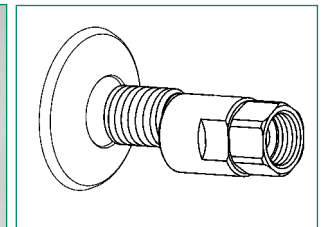
Item-No.:	Connection:	Packing unit:
35710 7	3/8" x 1/2" x 55 mm	18/216
35711 4	1/2" x 1/2" x 55 mm	18/162
35712 1	1/2" x 1/2" x 65 mm	-/-
35713 8	1/2" x 3/4" x 60 mm	12/120



Eccentric screw fitting, 5 mm, chrome-plated and polished, with push-on rosette

Screw fitting

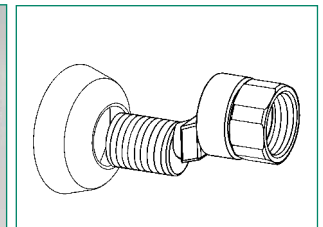
Item-No.:	Connection:	Packing unit:
35723 7	1/2" x 1/2" x 63 mm	20/80
35724 4	1/2" x 3/4" x 68 mm	20/80



Eccentric screw fitting, 17 mm, chrome-plated and polished, with push-on rosette

Screw fitting

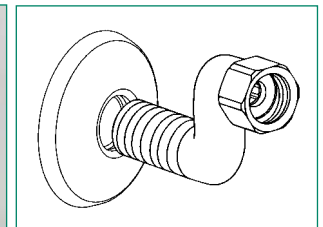
Item-No.:	Connection:	Packing unit:
35728 2	3/8" x 1/2" x 68 mm	1/60
35729 9	1/2" x 1/2" x 68 mm	1/60
35730 5	1/2" x 3/4" x 68 mm	1/60



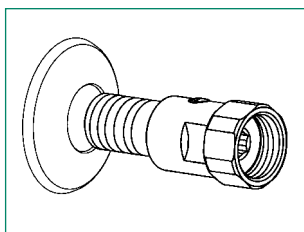
Eccentric screw fitting, 30 mm, chrome-plated and polished, with screw rosette

Screw fitting

Item-No.:	Connection:	Packing unit:
35717 6	3/8" x 1/2" x 65 mm	12/120
35718 3	1/2" x 1/2" x 65 mm	14/112
35719 0	1/2" x 3/4" x 68 mm	12/ 96



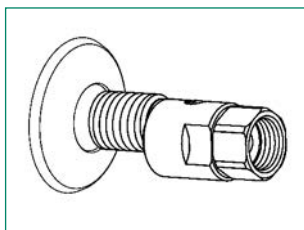
Screw fitting



Straight screw fitting, chrome-plated and polished, with push-on rosette

Item-No.:	Connection:	Packing unit:
35714 5	3/8" x 1/2" x 62 mm	10/60
35715 2	1/2" x 1/2" x 62 mm	10/60
35716 9	1/2" x 3/4" x 65 mm	10/60

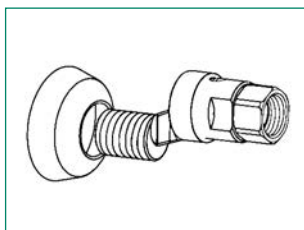
Screw fitting



Eccentric screw fitting, 5 mm, chrome-plated and polished, with push-on rosette

Art.-Nr.:	Abm.:	VE:
35720 6	3/8" x 1/2" x 62 mm	20/80
35721 3	1/2" x 1/2" x 62 mm	20/80
35722 0	1/2" x 3/4" x 65 mm	20/80

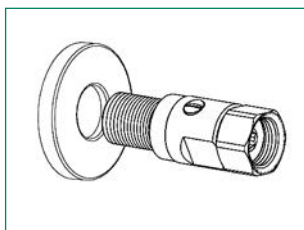
Screw fitting



Eccentric screw fitting, 17 mm, chrome-plated and polished, with push-on rosette

Item-No.:	Connection:	Packing unit:
35725 1	3/8" x 1/2" x 82 mm	1/60
35726 8	1/2" x 1/2" x 82 mm	1/60
35727 5	1/2" x 3/4" x 85 mm	1/60

Screw fitting



Straight screw fitting, 17 mm, chrome-plated and polished, with screw rosette

Item-No.:	Connection:	Packing unit:
35738 1	1/2" x 1/2" x 72 mm	10/60
35739 8	1/2" x 3/4" x 75 mm	10/60

Replacement gaskets for connecting couplings

AFM 34, KTW-certified, 18 x 10 x 2 mm (1/2")

Item-No. seal:	for Item-No.:											
35710-AFM	35710	35711	35712	35714	35715	35717	35718	35720	35721	35723	35725	35726
	35728	35729	35739									

Novapress 260 or equivalent, 24 x 14 x 3 mm

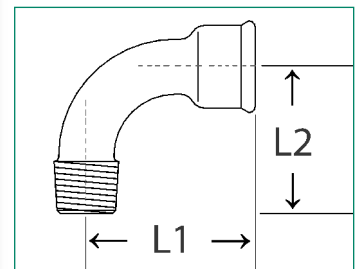
WS-551-Dtg-3mm	35713	35716	35719	35722	35724	35727	35730	35739				
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**Malleable galvanized fittings according to DIN EN 10242, design symbol A,
material according to DIN EN 1562 (EN-GJMB-350-10),
threads according to ISO 7.1, connection thread to DIN EN ISO 228-1,
max. 0° - 120° C 25 bar, 120° - 300° C 20 bar**

Long bend (1), ISO G 4

Female thread x male thread, long, 90°

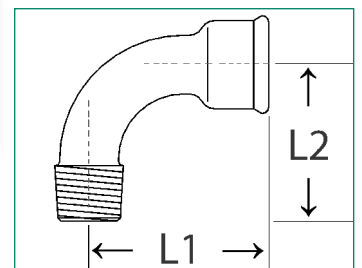
Item-No.: zinc plated	Item-No.: black	Connec.:	Threadlength:		Length:		Packing unit:
			f	m	L1	L2	
40000 1	40000-S	1/4"	10	13	40	36	10/ 400
40010 0	40010-S	3/8"	10	12	48	42	10/ 280
40011 7	40011-S	1/2"	13	15	55	48	10/ 180
40012 4	40012-S	3/4"	15	18	69	60	10/ 80
40013 1	40013-S	1"	17	20	85	75	10/ 50
40014 8	40014-S	1 1/4"	19	22	105	95	10/ 30
40015 5	40015-S	1 1/2"	20	22	116	105	5/ 20
40016 2	40016-S	2"	23	26	140	130	1/ 10
40017 9	40017-S	2 1/2"	27	30	176	165	1/ 4
40018 6	40018-S	3"	30	33	205	190	1/ 3
40019 3	40019-S	4"	37	45	240	258	1/ 4



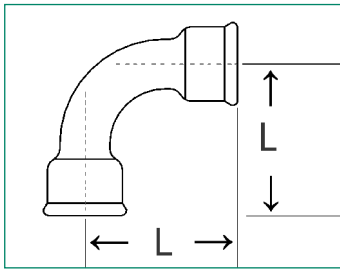
Short bend (1a), ISO D 4

Female thread x male thread, short, 90°

Item-No.: zinc plated	Item-No.: black	Connec.:	Threadlength:		Length: L	Packing unit:
			f	m		
40111 4	40111-S	1/2"	13	15	45	10/ 200
40112 1	40112-S	3/4"	15	18	50	10/ 120
40113 8	40113-S	1"	17	20	63	10/ 60
40114 5	40114-S	1 1/4"	-	-	76	10/ 35
40115 2	40115-S	1 1/2"	20	21	85	10/ 20
40116 9	40116-S	2"	-	-	102	-/ 18



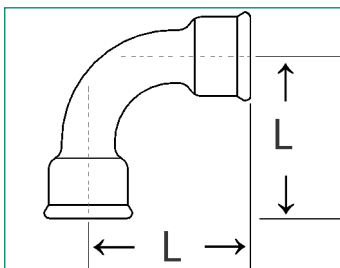
Long bend (2), ISO G 1



Female thread x female thread, long, 90°

Item-No.:	Item-No.:	Connec.:	Thread- Length:	Length:	Packing unit:
zinc plated	black			L	
40020 9	40020-S	3/8"	-	-	10/200
40021 6	40021-S	1/2"	13	55	10/ 150
40022 3	40022-S	3/4"	15	69	10/ 80
40023 0	40023-S	1"	17	85	10/ 40
40024 7	40024-S	1 1/4"	19	105	10/ 25
40025 4	40025-S	1 1/2"	20	116	5/ 15
40026 1	40026-S	2"	24	140	1/ 8
40027 8	40027-S	2 1/2"	27	176	1/ 4
40028 5	40028-S	3"	30	205	1/ 2
40029 2	40029-S	4"	-	-	1/ 3

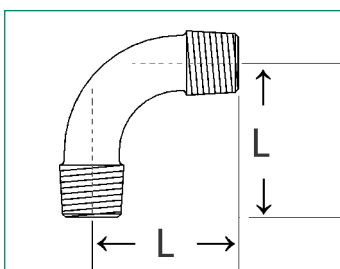
Short bend (2a), ISO D 1



Female thread x female thread, short, 90°

Item-No.:	Item-No.:	Connec.:	Thread- Length:	Length:	Packing unit:
zinc plated	black			L	
40121 3	40121-S	1/2"	13	45	10/180
40122 0	40122-S	3/4"	15	50	10/100
40123 7	40123-S	1"	17	63	10/ 50
40124 4	40124-S	1 1/4"	19	76	10/ 30
40125 1	40125-S	1 1/2"	19	85	1/ 20
40126 8	40126-S	2"	24	102	1/ 14

Long bend (3), ISO G 8



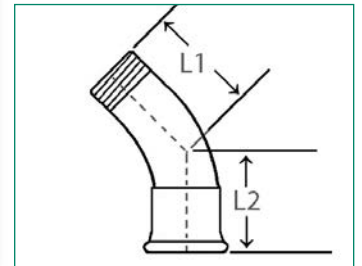
Male thread x male thread, long, 90°

Item-No.:	Item-No.:	Connec.:	Thread- Length:	Length:	Packing unit:
zinc plated	black			L	
40030 8	40030-S	3/8"	12	42	-/-
40031 5	40031-S	1/2"	15	48	10/250
40032 2	40032-S	3/4"	18	60	10/120
40033 9	40033-S	1"	20	75	10/ 50
40034 6	40034-S	1 1/4"	22	95	10/ 40
40035 3	40035-S	1 1/2"	22	105	1/ 20
40036 0	40036-S	2"	24	130	-/ 3
40037 7	40037-S	2 1/2"	29	165	1/ 5
40038 4	40038-S	3"	35	190	1/ 1
40039 1	40039-S	4"	37	245	1/ 1

Long bend 45° (40), ISO G4

Female thread x male thread, long, 45°

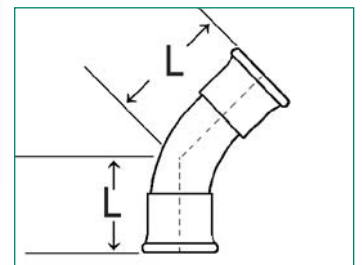
Item-No.:	Item-No.:	Conn.:	Threadlength:		Length:		Packing unit:
			f	m	L1	L2	
40400 9	40400-S	3/8"	12	13	25	31	10/300
40401 6	40401-S	1/2"	13	15	30	36	10/200
40402 3	40402-S	3/4"	15	18	36	43	10/120
40403 0	40403-S	1"	17	20	42	51	10/ 50
40404 7	40404-S	1 1/4"	19	22	54	64	10/ 40
40405 4	40405-S	1 1/2"	19	22	58	68	10/ 30
40406 1	40406-S	2"	24	27	70	81	10/ 15
40407 8	40407-S	2 1/2"	27	29	86	99	1/ 10
40408 5	40408-S	3"	30	35	100	113	1/ 5



Long bend 45° (41), ISO G1

Female thread x female thread, long, 45°

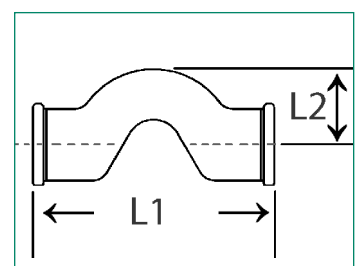
Item-No.:	Item-No.:	Connection:	Thread-length:	Length:		Packing unit:
				L		
40410 8	40410-S	3/8"	12	32		10/300
40411 5	40411-S	1/2"	13	36		10/180
40412 2	40412-S	3/4"	15	43		10/ 110
40413 0	40413-S	1"	17	51		10/ 40
40414 6	40414-S	1 1/4"	19	64		10/ 30
40415 3	40415-S	1 1/2"	20	68		-/ 65
40416 0	40416-S	2"	24	81		-/ 35



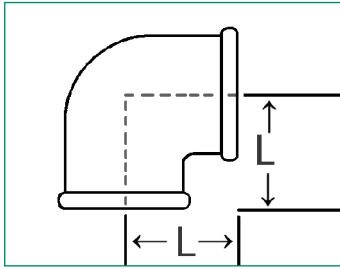
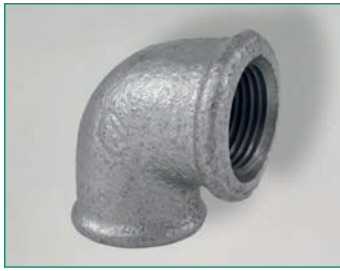
Crossover (85)

Female thread x female thread

Item-No.:	Item-No.:	Connection:	Thread-length:	Length:		Packing unit:
				L1	L2	
40851 9	40851-S	1/2"	13	91	28,5	10/ 100
40852 6	40852-S	3/4"	15	108	41	10/ 60



Elbow (90), ISO A 1

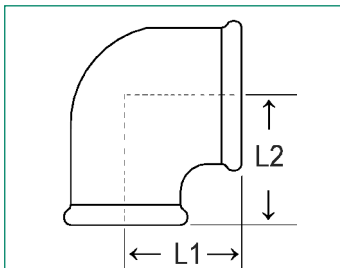


Female thread x female thread, 90°

Item-No.: zinc plated	Item-No.: black	Connection:	Threadlength:	Length: L	Packing unit:
40899 1	40899-S	1/4"	-	21	10/500
40900 4	40900-S	3/8"	10	25	10/350
40901 1	40901-S	1/2"	13	28	10/250
40902 8	40902-S	3/4"	15	33	10/140
40903 5	40903-S	1"	17	38	10/ 80
40904 2	40904-S	1 1/4"	19	45	10/ 40
40905 9	40905-S	1 1/2"	19	50	10/ 30
40906 6	40906-S	2"	24	58	5/ 20
40917 2	40917-S	2 1/2"	28	69	1/ 10
40918 9	40918-S	3"	28	78	1/ 8
40919 6	40919-S	4"	30	96	1/ 8

Elbow reducing (90 R), ISO A 1

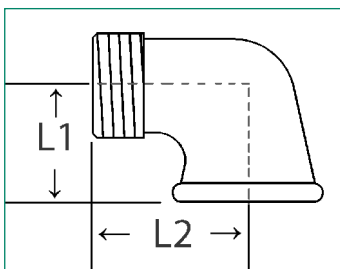
Female thread x female thread, reduced, 90°



Item-No.: zinc plated	Item-No.: black	Connection: f1 f2	Threadlength: f1 f2	Length: L1 L2	Packing unit:
40911 0	40911-S	1/2" x 3/8"	13 10	26 26	10/260
40908 0	40908-S	3/4" x 1/2"	15 13	30 31	10/160
40907 3	40907-S	1" x 1/2"	18 15	30 31	10/100
40909 7	40909-S	1" x 3/4"	17 15	35 36	10/100
40898 4	40898-S	1 1/4" x 3/4"	19 24	50 64	10/ 60
40914 1	40914-S	1 1/4" x 1"	19 17	40 42	10/ 50
40915 8	40915-S	1 1/2" x 1"	19 17	42 46	10/ 40
40935 6	40935-S	1 1/2" x 1 1/4"	17,5 22	44,5 62	10/ 30
40936 3	40936-S	2" x 1 1/2"	- -	- -	10/ 30

Female thread x male thread, 90°

Elbow (92), ISO A 4



Item-No.: zinc plated	Item-No.: black	Connec.: IG AG	Threadlength: IG AG	Length: L1 L2	Packing unit:
40929 5	40929-S	1/4"	10 13	21 28	10/700
40920 2	40920-S	3/8"	11 12	25 32	10/350
40921 9	40921-S	1/2"	13 15	28 37	10/250
40922 6	40922-S	3/4"	15 18	33 43	10/140
40923 3	40923-S	1"	17 20	38 52	10/ 80
40924 0	40924-S	1 1/4"	19 22	45 60	10/ 40
40925 7	40925-S	1 1/2"	19 22	50 65	10/ 30
40926 4	40926-S	2"	24 28	58 74	6/ 18
40927 1	40927-S	2 1/2"	27 29	69 88	1/ 30
40928 8	40928-S	3"	30 35	78 98	1/ 8

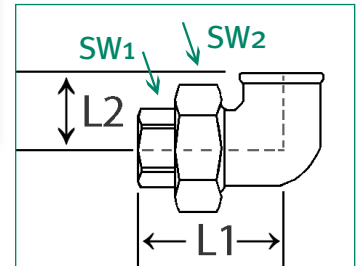
Female thread x male thread, **reduced**, 90°

40933 2	40933-S	1" x 3/4"	17 18	34 45	10/100
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Union elbow (95), ISO UA 1

Female thread x female thread, flat seat, without seal

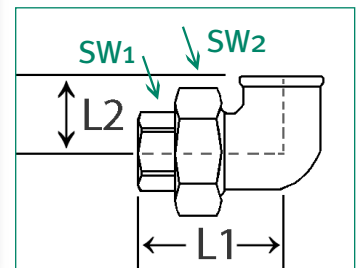
Item-No.:	Item-No.:	Connec.:	Thread-length:	Length:		Wrench size:		Packing unit:
				L1	L2	SW1	SW2	
zinc plated	black							
40951 6	40951-S	1/2"	13	58	28	27	45	10/80
40952 3	40952-S	3/4"	15	62	33	32	50	10/60
40953 0	40953-S	1"	17	72	38	39	55	10/40
40954 7	40954-S	1 1/4"	19	82	45	47	69	10/20
40955 4	40955-S	1 1/2"	20	87	50	54	75	1/ 25
40956 1	40956-S	2"	25	90	65	67	92	1/ 8



Union elbow (96), ISO UA 11

Female thread x female thread, taper seat

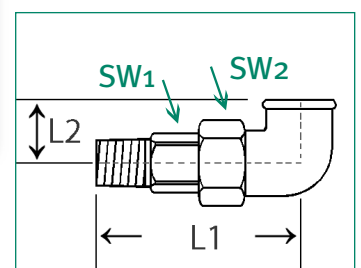
Item-No.:	Item-No.:	Connec.:	Thread-length:	Length:		Wrench size:		Packing unit:
				L1	L2	SW1	SW2	
zinc plated	black							
40960 0	40960-S	3/8"	-	-	-	-	-	10/120
40961 5	40961-S	1/2"	13	58	28	27	45	10/ 80
40962 2	40962-S	3/4"	15	62	33	32	50	10/ 60
40963 9	40963-S	1"	17	72	38	38	55	10/ 40
40964 6	40964-S	1 1/4"	19	82	45	48	70	10/ 20
40965 3	40965-S	1 1/2"	19	90	50	55	75	5/ 15
40966 0	40966-S	2"	24	100	58	65	90	1/ 8
40967 7	40967-S	2 1/2"	28	116	76	87	110	1/ 1
40968 4	40968-S	3"	34	128	68	100	127	1/ 1



Union elbow (97), ISO UA 2

Female thread x male thread, flat seat, without seal

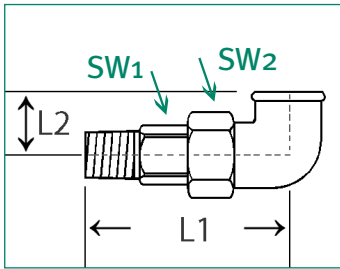
Item-No.:	Item-No.:	Connec.:	Thread-length:	Length:		Wrench size:		Packing unit:
				L1	L2	SW1	SW2	
zinc plated	black							
40971 4	40971-S	1/2"	13	76	28	27	45	10/70
40972 1	40972-S	3/4"	15	82	33	32	50	10/50
40973 8	40973-S	1"	17	94	38	38	55	10/30
40974 5	40974-S	1 1/4"	19	107	45	48	70	10/20
40975 2	40975-S	1 1/2"	19	115	50	55	75	5/ 15
40976 9	40976-S	2"	24	128	58	65	90	1/ 6



Union elbow (98), ISO UA 12



Female thread x male thread, taper seat

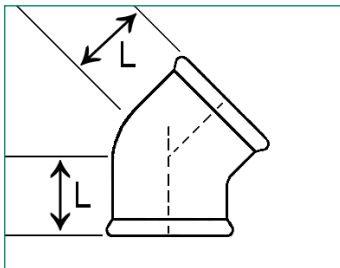


Item-No.:	Item-No.:	Connec.:	Thread-length:	Length:		Wrench size:		Packing unit:
zinc plated	black			L1	L2	SW1	SW2	
40980 6	40980-S	3/8"	-	-	-	-	-	10/80
40981 3	40981-S	1/2"	13	76	28	27	45	10/70
40982 0	40982-S	3/4"	15	82	33	32	50	10/50
40983 7	40983-S	1"	17	94	38	38	55	10/30
40984 4	40984-S	1 1/4"	19	107	45	48	69	10/20
40985 1	40985-S	1 1/2"	19	115	50	55	69	5/ 18
40986 8	40986-S	2"	24	128	58	65	90	1/ 8
40987 5	40987-S	2 1/2"						1/ 1
40988 2	40988-S	3"	32	154	65	98	125	1/ 1

Elbow 45° (120), ISO A 1



Female thread x female thread, 45°

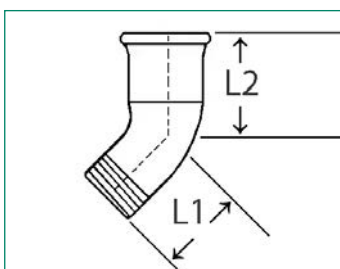


Item-No.:	Item-No.:	Connec.:	Thread-length:	Length:	Packing unit:
zinc plated	black			L	
41201 1	41201-S	1/2"	13	22	10/250
41202 8	41202-S	3/4"	15	25	10/ 150
41203 5	41203-S	1"	17	28	10/ 80
41204 2	41204-S	1 1/4"	19	41	-/ 50
41205 9	41205-S	1 1/2"	20	45	-/ 30
41206 6	41206-S	2"	25	51	5/ 20

Elbow 45° (121), ISO A 4



Female thread x male thread, 45°

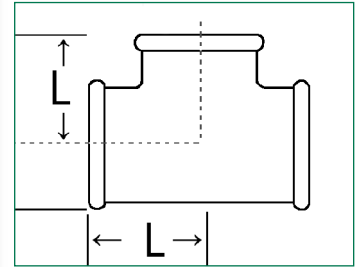


Item-No.:	Item-No.:	Connec.:	Threadlength:		Length:		Packing unit:
zinc plated	black		f	m	L1	L2	
41211 0	41211-S	1/2"	13	15	28	22	10/250
41212 7	41212-S	3/4"	15	18	32	25	10/160
41213 4	41213-S	1"	17	20	37	28	10/100
41214 1	-	1 1/4"	19	19	43	33	5/ 40
41215 8	41215-S	1 1/2"	20	19	46	36	5/ 40
41216 5	41216-S	2"	23	24	55	43	-/ 24

90°, female thread

Tee equal (130), ISO B 1

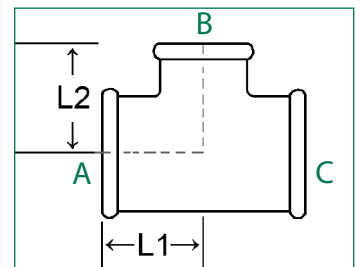
Item-No.: zinc plated	Item-No.: black	Connection: female thread	Thread-length:	Length: L	Packing unit:
41299 8	41299-S	1/4"	10	21	10/300
41300 1	41300-S	3/8"	10	25	10/250
41301 8	41301-S	1/2"	13	28	10/ 150
41302 5	41302-S	3/4"	15	33	10/ 80
41303 2	41303-S	1"	17	38	10/ 50
41304 9	41304-S	1 1/4"	19	45	5/ 30
41305 6	41305-S	1 1/2"	19	50	5/ 20
41306 3	41306-S	2"	24	58	4/ 12
41307 0	41307-S	2 1/2"	27	69	1/ 10
41308 7	41308-S	3"	30	78	1/ 6
41309 4	41309-S	4"	38	96	1/ 6



90°, reduced, female thread

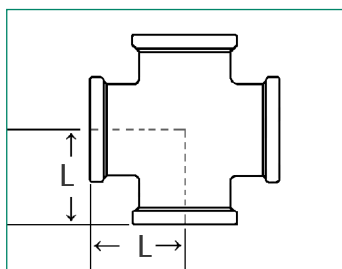
Tee reducing (130 R), ISO B 1

Item-No.: zinc plated	Item-No.: black	Connection: A x B x C	Thread-length:	Length: L1	L2	Packing unit:
41344 5	41344-S	1/2" x 3/8" x 3/8"	12	26	27	10/120
41310 0	41310-S	1/2" x 3/8" x 1/2"	13	26	26	10/150
41345 2	41345-S	1/2" x 1/2" x 3/8"	21	44	50	10/180
41320 9	-	1/2" x 3/4" x 1/2"	14	30	30	10/120
41311 7	41311-S	3/4" x 3/8" x 3/4"	15	28	28	10/120
41340 7	41340-S	3/4" x 1/2" x 1/2"	15	27	27	10/100
41312 4	41312-S	3/4" x 1/2" x 3/4"	15	30	31	10/120
41341 4	41341-S	3/4" x 3/4" x 1/2"	15/13	33	33	10/ 90
41343 8	41343-S	3/4" x 1" x 3/4"	16	34	36	10/ 60
41323 0	41323-S	1" x 1/2" x 1"	17	32	34	10/ 60
41313 1	41313-S	1" x 3/4" x 1"	17	35	36	10/ 60
41342 1	41342-S	1" x 1" x 3/4"	16	34	37	10/ 60
41317 9	41317-S	1 1/4" x 1/2" x 1 1/4"	19	34	38	5/ 50
41324 7	41324-S	1 1/4" x 3/4" x 1 1/4"	19	36	41	5/ 40
41314 8	41314-S	1 1/4" x 1" x 1 1/4"	19	40	42	5/ 30
41318 6	41318-S	1 1/2" x 1/2" x 1 1/2"	19	36	42	10/ 30
41319 3	41319-S	1 1/2" x 3/4" x 1 1/2"	19	38	44	-/ 30
41316 2	41316-S	1 1/2" x 1" x 1 1/2"	19	42	46	5/ 30
41315 5	41315-S	1 1/2" x 1 1/4" x 1 1/2"	19	46	48	10/ 20
41327 8	41327-S	2" x 1/2" x 2"	24	38	48	-/ 20
41325 4	41325-S	2" x 3/4" x 2"	19	34	38	10/ 20
41326 1	41326-S	2" x 1" x 2"	24	44	52	5/ 20
41328 5	41328-S	2" x 1 1/4" x 2"	24	48	54	-/ 20
41329 2	41329-S	2" x 1 1/2" x 2"	24	52	55	1/ 15
41330 8	41330-S	3" x 2" x 3"	30	64	73	1/ 6



Cross fitting 90° (180), ISO C 1

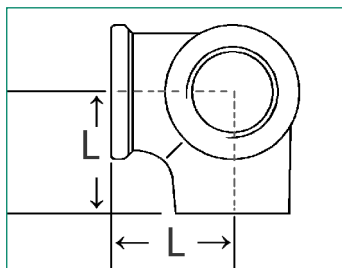
4 x female thread



Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Packing unit:
zinc plated	black			L	
41790 6	41790-S	1/4"	12	21	10/ 100
41800 6	41800-S	3/8"	13	25	10/ 150
41801 3	41801-S	1/2"	13	28	10/ 100
41802 0	41802-S	3/4"	15	33	10/ 60
41803 7	41803-S	1"	17	38	10/ 40
41804 4	41804-S	1 1/4"	19	45	5/ 20
41805 1	41805-S	1 1/2"	19	50	15/ 20
41806 8	41806-S	2"	24	58	10/ 10
41812 9	41812-S	3/4" x 1/2"	13	23	10/ 80
41813 6	41813-S	1" x 1/2"	14	32	10/ 40

Side outlet elbow (221), ISO Za 1

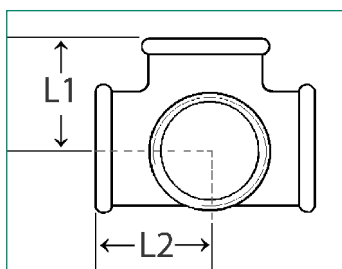
3 x female thread



Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Packing unit:
zinc plated	black			L	
42211 9	42211-S	1/2"	13	28	10/ 140
42212 6	42212-S	3/4"	15	33	10/ 80
42213 3	-	1"	18	35	10/ 60

Tee with side outlet (223)

90°, female threaded, equal

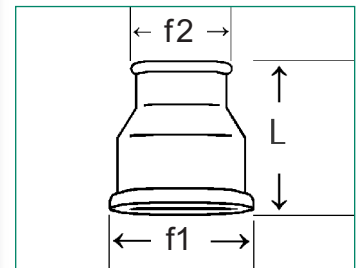


Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Packing unit:
zinc plated	black		L1	L2	
42231 7	-	1/2"	-	-	10/ 100
42232 4	-	3/4"	-	-	10/ 60
42233 1	-	1"	-	-	10/ 50

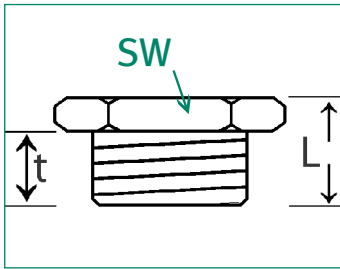
Reducing socket (240), ISO M 2

Female thread x female thread

Item-No.: zinc plated	Item-No.: black	Connection:		Threadlength:		Length: L	Packing unit:
		f1	f2	f1	f2		
42399 4	42399-S	3/8" x 1/4"		10	10	30	10/400
42400 7	42400-S	1/2" x 1/4"		13	10	36	10/300
42401 4	42401-S	1/2" x 3/8"		12	11	36	10/350
42398 7	42398-S	3/4" x 3/8"		15	10	39	10/250
42402 1	42402-S	3/4" x 1/2"		15	13	39	10/240
42393 2	42393-S	1" x 1/2"		17	13	45	10/220
42403 8	42403-S	1" x 3/4"		17	15	45	10/140
42397 0	42397-S	1 1/4" x 1/2"		19	13	50	10/ 80
42394 9	42394-S	1 1/4" x 3/4"		19	15	50	10/ 80
42404 5	42404-S	1 1/4" x 1"		19	17	50	10/ 80
42396 3	42396-S	1 1/2" x 3/4"		19	15	55	10/ 60
42395 6	42395-S	1 1/2" x 1"		19	17	55	10/ 60
42405 2	42405-S	1 1/2" x 1 1/4"		19	19	55	10/ 60
42392 5	42392-S	2" x 1"		24	17	65	-/ 35
42391 8	42391-S	2" x 1 1/4"		24	19	65	10/ 30
42406 9	42406-S	2" x 1 1/2"		22	21	65	10/ 30
42390 1	42390-S	2 1/2" x 2"		27	24	74	1/ 24



Bushing (241), ISO N 4

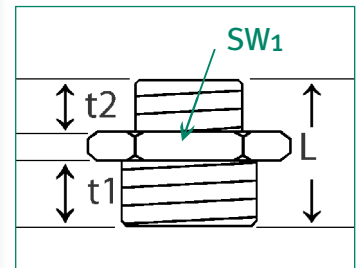


Male thread x female thread

Item-No.:	Item-No.:	Connection:	Threadlength:		Length:	Wrench size:	Packing unit:
zinc plat.	black	m f	m (t)	f	L	SW	
42410 6	42410-S	3/8" x 1/4"	14	10	20	19	10/900
42430 4	42430-S	1/2" x 1/4"	17	12	25	23	10/800
42411 3	42411-S	1/2" x 3/8"	16	13	24	22	10/500
42433 5	42433-S	3/4" x 1/4"	16	10	25	31	10/300
42422 9	42422-S	3/4" x 3/8"	17	13	26	30	10/300
42412 0	42412-S	3/4" x 1/2"	17	13	26	30	10/350
42432 8	42432-S	1" x 3/8"	19	12	30	39	10/200
42423 6	42423-S	1" x 1/2"	19	13	29	36	10/200
42413 7	42413-S	1" x 3/4"	19	15	29	36	10/240
42434 2	42434-S	1 1/4" x 1/2"	22	13	31	46	10/100
42424 3	42424-S	1 1/4" x 3/4"	20	15	31	46	5/120
42414 4	42414-S	1 1/4" x 1"	21,5	17	31	46	5/150
42435 9	42435-S	1 1/2" x 1/2"	23	13	33	52	10/120
42436 6	42436-S	1 1/2" x 3/4"	21	15	31	55	5/80
42425 0	42425-S	1 1/2" x 1"	22	16	33	51	5/90
42415 1	42415-S	1 1/2" x 1 1/4"	21,5	19	31	50	10/100
42437 3	42437-S	2" x 1/2"	25	14	47	68	10/50
42438 0	42438-S	2" x 1"	24	16	36	67	5/50
42417 5	42417-S	2" x 1 1/4"	24	19	35	65	5/55
42416 8	42416-S	2" x 1 1/2"	26	19	35	65	10/60
42439 7	42439-S	2 1/2" x 1 1/4"	29	20	55	54	10/40
42440 3	42440-S	2 1/2" x 1 1/2"	28	20	42	81	1/40
42441 0	42441-S	2 1/2" x 2"	27	24	41	81	10/40
42442 7	42442-S	3" x 2"	30	26	46	96	1/20
42446 5	42446-S	3" x 2 1/2"	30	26	43	96	1/30
42447 2	42447-S	4" x 3"	33	26	51	122	1/18

Reducing nipple (245), ISO N 8

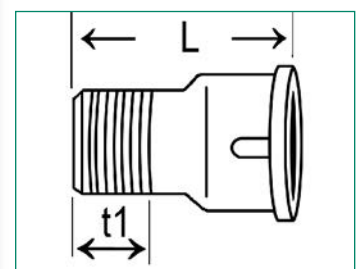
Male thread x male thread, with hexagon



Item-No.:	Item-No.:	Connection:	Threadlength:		Length:	Wrench size:	Packing unit:
zinc plat.	black	m x m	t1	t2	L	SW	
42457 1	42457-S	3/8" x 1/4"	11	10	38	19	10/ 500
42450 2	42450-S	1/2" x 1/4"	16	14	43	23	10/ 360
42451 9	42451-S	1/2" x 3/8"	13	11	44	26	10/ 360
42458 8	42458-S	3/4" x 3/8"	20	14	48	34	10/ 190
42452 6	42452-S	3/4" x 1/2"	13	13	47	30	10/ 230
42443 4	42443-S	1" x 1/2"	17	13	53	36	10/ 150
42453 3	42453-S	1" x 3/4"	17	13	53	36	10/ 130
42459 5	42459-S	1 1/4" x 1/2"	24	18	58	46	10/ 90
42444 1	42444-S	1 1/4" x 3/4"	18	13	57	46	10/ 80
42454 0	42454-S	1 1/4" x 1"	18	17	57	48	10/ 70
42460 1	42460-S	1 1/2" x 3/4"	26	20	60	51	10/ 90
42445 8	42445-S	1 1/2" x 1"	21	17	59	56	10/ 60
42455 7	42455-S	1 1/2" x 1 1/4"	21	18	59	56	10/ 60
42448 9	-	2" x 3/4"	-	-	-	-	-/-
42461 8	42461-S	2" x 1 1/4"	24	18	68	65	10/ 40
42456 4	42456-S	2" x 1 1/2"	24	21	68	65	10/ 40
42470 0	-	2 1/2" x 2"	27	24	80	-	-/ 25

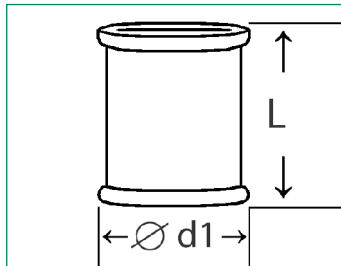
Reducing socket (246), ISO M 4

Female thread x male thread



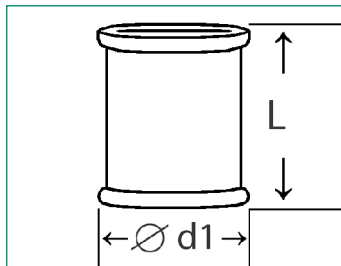
Item-No.:	Item-No.:	Connection.:	Threadlength:		Length:	Packing unit:
zinc plated	black	f x m	f t2	m t1	L	
42471 7	42471-S	3/8" x 1/4"	10	14	35	10/ 700
42472 4	42472-S	1/2" x 1/4"	13	12	43	10/ 350
42464 9	42464-S	1/2" x 3/8"	13	10	43	10/ 350
42473 1	42473-S	3/4" x 3/8"	15	12	48	10/ 210
42462 5	42462-S	3/4" x 1/2"	15	13	48	10/ 210
42465 6	42465-S	1" x 1/2"	17	13	55	10/ 140
42463 2	42463-S	1" x 3/4"	17	15	55	10/ 120
42474 8	42474-S	1 1/4" x 3/4"	19	17	60	10/ 100
42466 3	42466-S	1 1/4" x 1"	19	17	60	10/ 80
42467 0	42467-S	1 1/2" x 1"	19	17	63	10/ 60
42468 7	42468-S	1 1/2" x 1 1/4"	21	19	63	10/ 60
42469 4	42469-S	2" x 1 1/2"	23	19	70	10/ 50
42477 9	-	2 1/2" x 2"	30	27	74	5/ 20

Socket (270), ISO M 2 Female thread x female thread



Item-No.: zinc plated	Item-No.: black	Connection:	Thread-length:	Length:		Packing unit:
				L	Ø d1	
42699 5	42699-S	1/4"	10	27	22	10/600
42700 8	42700-S	3/8"	10	30	25	10/400
42701 5	42701-S	1/2"	13	36	30	10/210
42702 2	42702-S	3/4"	15	39	36	10/220
42703 9	42703-S	1"	17	45	44	10/120
42704 6	42704-S	1 1/4"	19	50	53	10/60
42705 3	42705-S	1 1/2"	19	55	60	10/50
42706 0	42706-S	2"	20	65	74	5/25
42707 7	42707-S	2 1/2"	27	74	91	1/24
42708 4	42708-S	3"	30	80	105	1/15
42709 1	42709-S	4"	36	94	135	-/17

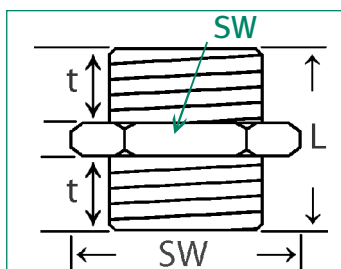
Socket (271), ISO M 2 R-L



Female thread x female thread, with right and left hand thread

Item-No.: zinc plated	Item-No.: black	Connection:	Thread-length:	Length:		Packing unit:
				L	Ø d1	
42711 4	-	1/2"	13	36	30	10/340
42712 1	-	3/4"	15	39	36	10/220
42713 8	-	1"	17	45	44	10/120

Nipple (280), ISO N 8



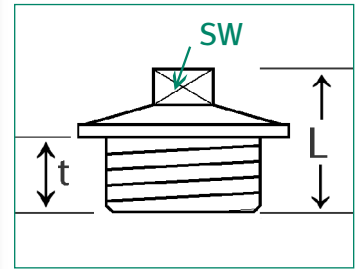
Male thread x male thread, with hexagon

Item-No.: zinc plated	Item-No.: black	Connection:	Thread-length:	Length: L	Wrench size: SW	Packing unit:
42791 6	42791-S	1/4"	10	36	19	10/600
42800 5	42800-S	3/8"	11	38	22	10/500
42801 2	42801-S	1/2"	15	44	27	10/350
42802 9	42802-S	3/4"	18	47	32	10/220
42803 6	42803-S	1"	20	53	41	10/130
42804 3	42804-S	1 1/4"	22	57	50	10/70
42805 0	42805-S	1 1/2"	21	59	55	5/50
42806 7	42806-S	2"	20	68	63	5/25
42807 4	42807-S	2 1/2"	27	75	85	10/20
42808 1	42808-S	3"	30	83	100	1/22
42809 8	42809-S	4"	36	95	130	1/20

with border

Plug, beaded (290), ISO T 9

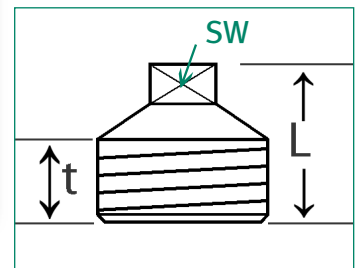
Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Wrench size:	Packing unit:
zinc plated	black	male	t	L	SW	
42890 6	42890-S	1/4"	10	22	8	10/1000
42900 2	42900-S	3/8"	11,5	24	10	10/ 700
42901 9	42901-S	1/2"	13	26	11	10/ 350
42902 6	42902-S	3/4"	14,5	32	17	10/ 250
42903 3	42903-S	1"	17	36	19	10/ 170
42904 0	42904-S	1 1/4"	21	39	22	10/ 100
42905 7	42905-S	1 1/2"	23	41	22	10/ 80
42906 4	42906-S	2"	26	48	27	10/ 50
42907 1	42907-S	2 1/2"	30	54	32	1/ 34
42908 8	42908-S	3"	34	60	36	1/ 24
42909 5	42909-S	4"	40	70	41	1/ 12



without border

Plug, plain (291), ISO T 8

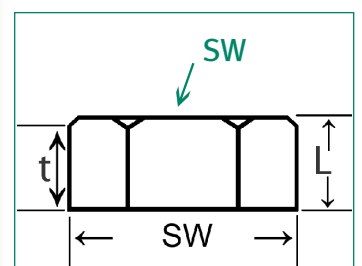
Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Wrench size:	Packing unit:
zinc plated	black	male	t	L	SW	
42917 0	42917-S	1/8"	-	-	-	10/5400
42918 7	42918-S	1/4"	-	-	-	10/3600
42910 1	42910-S	3/8"	15	24	10	10/1000
42911 8	42911-S	1/2"	16	26	11	10/ 800
42912 5	42912-S	3/4"	21	32	17	10/ 400
42913 2	42913-S	1"	25	36	19	10/ 250
42914 9	42914-S	1 1/4"	28	39	22	10/ 160
42915 6	42915-S	1 1/2"	30	41	22	10/ 130
42916 3	42916-S	2"	34	48	27	10/ 60



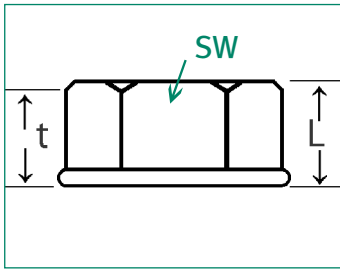
not beaded, ≤ 1" hexagonal, ≥ 1" octagonal

Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Wrench size:	Packing unit:
zinc plated	black	female	t	L	SW	
43020 6	43020-S	1/4"	-	-	-	10/800
43000 8	43000-S	3/8"	11	17	22	10/660
43001 5	43001-S	1/2"	13	19	26	10/400
43002 2	43002-S	3/4"	15	22	32	10/ 250
43003 9	43003-S	1"	17	24	39	10/ 130
43004 6	43004-S	1 1/4"	20	27	48	10/100
43005 3	43005-S	1 1/2"	20	27	54	10/ 90
43006 0	43006-S	2"	24	32	66	10/ 50
43007 7	43007-S	2 1/2"	26	35	84	5/ 40
43008 4	43008-S	3"	28	38	96	1/ 28
43009 1	43009-S	4"	35	46	124	1/ 12

Cap (300), ISO T 1



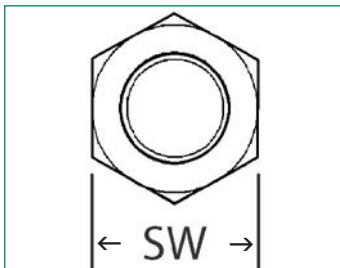
Cap (301)



beaded

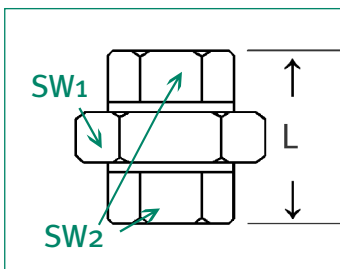
Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Wrench size:	Packing unit:
zinc plated	black	female	t	L	SW	
43021 3	43021-S	1/4"	-	-	-	10/1800
43010 7	43010-S	3/8"	11	17	22	10/ 800
43011 4	43011-S	1/2"	13	19	26	10/ 800
43012 1	43012-S	3/4"	15	22	32	10/ 400
43013 8	43013-S	1"	17	24	39	10/ 250
43014 5	43014-S	1 1/4"	20	27	48	10/ 100
43015 2	43015-S	1 1/2"	20	27	54	10/ 90
43016 9	43016-S	2"	24	32	66	10/ 70
43017 6	43017-S	2 1/2"	26	35	84	5/ 40
43018 3	43018-S	3"	28	38	96	1/ 1
43019 0	43019-S	4"	-	-	-	1/ 1

Lock nut (310), ISO P 4



Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Wrench size:	Packing unit:
zinc plated	black	female	t	L	SW	
43101 2	43101-S	1/2"	8	8	32	10/700
43102 9	43102-S	3/4"	9	9	36	10/300
43103 6	-	1"	10	10	45	10/350
43104 3	43104-S	1 1/4"	-	-	-	10/250

Union (330), ISO U 1



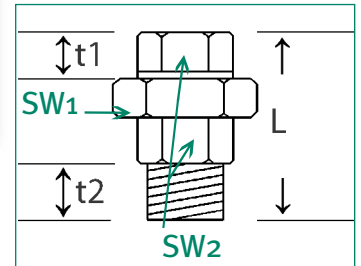
Female thread x female thread, flat seat, without seal

Item-No.:	Item-No.:	Item-No.:	Conn.:	Thread-length:	Length:	Wrenchsize:		Packing unit:
zinc plat.	zinc plat.+seal	black		t	L	SW1	SW2	
43301 6	43301-D	43301-S	1/2"	14	48	42	26	10/ 80
43302 3	43302-D	43302-S	3/4"	16	52	50	32	10/ 70
43303 0	43303-D	43303-S	1"	20	58	55	38	10/ 60
43304 7	43304-D	43304-S	1 1/4"	18	65	69	49	5/ 35
43305 4	43305-D	43305-S	1 1/2"	70	70	72	53	10/ 25
43306 1	43306-D	43306-S	2"	78	78	90	68	5/ 20
43307 8	43307-D	43307-S	2 1/2"	85	85	110	85	1/ 12
43308 5	43308-D	43308-S	3"	95	95	128	98	1/ 7

Union (331), ISO U 2

Female thread x male thread, flat seat, without seal

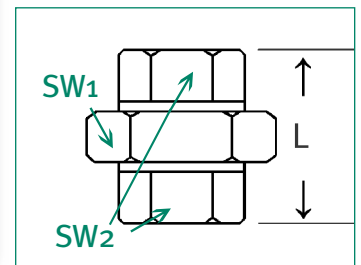
Item-No.:	Item-No.:	Item-No.:	Con.:	Thread length:		Length	Wrench-size:		Packing unit:
zinc pla.	zinc plat.+seal	black		F t1	M t2	L	SW1	SW2	
43311 5	43311-D	43311-S	1/2"	15	17	66	41	24	10/90
43312 2	43312-D	43312-S	3/4"	15	20	72	50	32	10/60
43313 9	43313-D	43313-S	1"	16	21	80	55	39	10/50
43314 6	43314-D	43314-S	1 1/4"	19	26	90	69	47	10/30
43315 3	43315-D	43315-S	1 1/2"	24	25	95	75	55	4/20
43316 0	43316-D	43316-S	2"	25	29	106	90	65	1/ 10



Female thread x female thread, taper seat

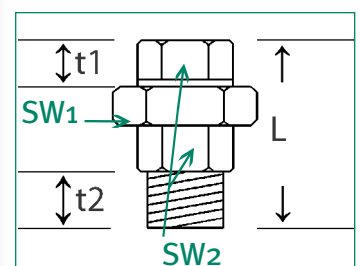
Item-No.:	Item-No.:	Conn.:	Thread-length:	Length:	Wrenchsize:		Packing unit:
zinc plat.	black			L	SW1	SW2	
43400 6	43400-S	3/8"	12	45	38	22	10/150
43401 3	43401-S	1/2"	13	48	45	27	10/ 80
43402 0	43402-S	3/4"	15/20	52	50	32	10/ 70
43403 7	43403-S	1"	17/20	58	55	38	10/ 60
43404 4	43404-S	1 1/4"	17/20	65	70	47	10/ 40
43405 1	43405-S	1 1/2"	19/20	70	74	54	5/ 25
43406 8	43406-S	2"	24/20	78	90	66	5/ 15
43407 5	43407-S	2 1/2"	27/27	85	110		1/ 8
43408 2	43408-S	3"	30/30	95	130	96	1/ 7
43409 9	43409-S	4"	45/45	109	153	126	1/ 1

Union (340), ISO U 11



Female thread x male thread, taper seat

Item-No.:	Item-No.:	Conn.:	Threadlength:		Length:	Wrench size:		Packing unit:
zinc plat.	black		F t1	M t2	L	SW1	SW2	
43410 5	43410-S	3/8"	15,5	16	58	36	22	10/150
43411 2	43411-S	1/2"	14,5	17	66	45	27	10/ 80
43412 9	43412-S	3/4"	15,5	20	72	50	32	10/ 70
43413 6	43413-S	1"	18	22	80	55	39	10/ 40
43414 3	43414-S	1 1/4"	20,5	26	90	69	47	5/ 25
43415 0	43415-S	1 1/2"	25	28	95	75	55	10/ 20
43416 7	43416-S	2"	26	27	106	90	65	5/ 10
43417 4	43417-S	2 1/2"	27	39	118	90	85	-/ 9
43418 1	43418-S	3"	-	-	-	-	-	-/ 6



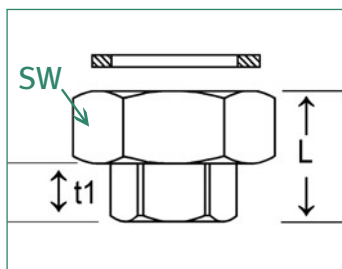
Union nut (341), ISO U 12

Union for pumps made of malleable iron

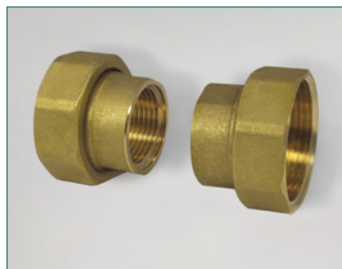


Malleable iron, black, consisting of two union ends, 2 union nuts and 2 NBR seals, temperature range: < 70°C

Item-No.:	Connection:	Thread-length:	Length:	Wrench-size:	Pack. unit:
black			L	SW	
43502-2	3/4" Connection, 1 1/4" union nut	18	35	50	1/75
43503-2	1" Connection, 1 1/2" union nut	20	39	55	1/40
43504-2	1 1/4" Connection, 2" union nut	22,9	47,6	70	1/35

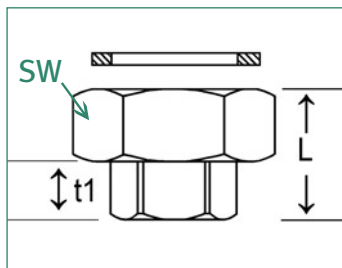


Union for pumps made of brass



Consisting of: 2 union nuts, 2 union ends and 2 seals, PN 10, temperature range: - 10°C to + 110°C

Item-No.:	Connection:	Thread-length:	Length:	Wrench-size:	Pack. unit:
			L	SW	
34693 4	1" Connection, 1 1/2" union nut	20	38	52	-/25



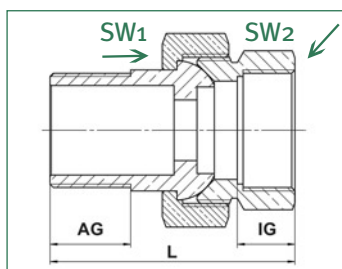
Union made of brass with nut



Plain brass, 3-pieces, with nut and O-ring, metal sealing, male thread x female thread

Item-No.:	Connection:	Thread-length:	Length:	Wrench-size:	Pack. unit:
	M/F	M/F	L	SW1/SW2	
33700 0	G 3/8" connection, G 3/8", nut	10/8	41	25/20	20/200
33701 7	G 1/2" connection, G 1/2", nut	12/12	49	30/25	15/150
33702 4	G 3/4" connection, G 3/4", nut	13/11	54	38/30	10/100
33703 1	G 1" connection, G 1", nut	15/12	60	47/37	8/ 48
33704 8	G 1 1/4" connection, G 1 1/4", nut	15/16	71	53/48	8/ 32

The items of the brass union nuts are not tested for compatibility with other market models.

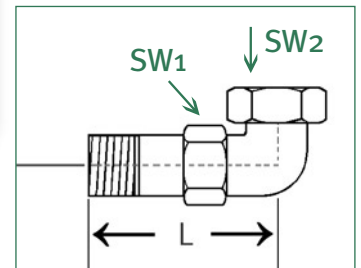


Union made of brass with nut, angle form

Plain brass, 3-pieces, angle form, with nut and O-ring, metal sealing, male thread x female thread

Item-No.:	Connection:	Thread-length:	Length:	Wrench-size:	Pack. unit:
	M/F	M/F	L	SW ₁ /SW ₂	
33705 5	G 3/8" connection, G 3/8", nut	10/9	46	25/21	15/150
33706 2	G 1/2" connection, G 1/2", nut	12/10	53	30/25	10/100
33707 9	G 3/4" connection, G 3/4", nut	12/11,5	62,5	37/31	10/ 50
33708 6	G 1" connection, G 1", nut	12/11,5	70	46/37	8/ 32
33709 3	G 1 1/4" connection, G 1 1/4", nut	16/18	83,5	53/48	1/ 30

The items of the brass union nuts are not tested for compatibility with other market models.

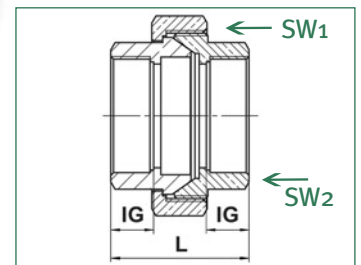


Union made of brass with nut

Plain brass, with nut and O-ring, metal sealing, female thread x female thread

Item-No.:	Connection:	Thread-length:	Length:	Wrench-size:	Pack. unit:
	F/F	F/F	L	SW ₁ /SW ₂	
33711 6	G 1/2" connection, G 1/2" nut	12/12	38,4	37,5/25	-/-
33712 3	G 3/4" connection, G 3/4" nut	11/11	36,8	47/30	-/-
33713 0	G 1" connection, G 1" nut	12/12	38,8	52/37	-/-

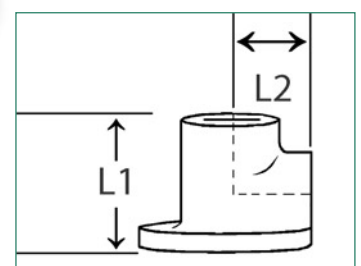
The items of the brass union nuts are not tested for compatibility with other market models.



Female thread x female thread

Item-No.:	Item-No.:	Connection:	Thread-length:	Length:	Packing unit:
zinc plated	black			L L ₂	
44711 2	44711-S	1/2"	13	46 26	10/80
44712 9	44712-S	3/4"	15	52 33	10/50
44713 6	44713-S	1"	20	61 40	10/50

Bracket elbow (471)

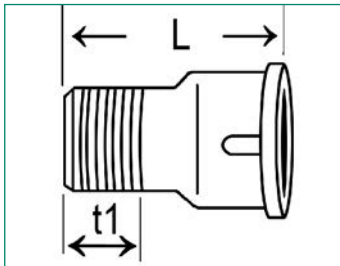


Extension socket (529a)



Socket with female thread and male thread

Item-No.:	Item-No.:	Connection:	Thread-length:		Length:	Packing unit:
zinc plated	black		t1	t2	L	
45291 8	-	1/2"	13	-	43	10/300
45292 5	-	3/4"	15	-	48	10/180



Sealing tape



12 m x 12 mm x 0,075 mm, material PTFE

Item-No.:	Packing unit:
29010 7	50/1000

Hemp yarn-Mazzoni



approx. 200 g

Wrapping:	Item-No.:	Packing unit:
loose	29016 9	10/250
packed for self-service	29015 2	10/100

Spare gaskets, according to DIN EN 10242

Item-No.:	Connection:		Packing unit:
49011 8	1/2"	30 x 21 x 2 mm	10/100
49001 9	1/2"	34 x 24 x 2 mm	10/100
49012 5		31,5 x 26 x 2 mm	10/100
49002 6	3/4"	38 x 27 x 2 mm	10/100
49013 2		29 x 22 x 2 mm	10/100
49003 3	1"	44 x 32 x 2 mm	10/100
49004 0	1 1/4"	55 x 42 x 2 mm	10/100
49005 7	1 1/2"	62 x 46 x 2 mm	10/100
49006 4	2"	78 x 60 x 2 mm	10/100



For flat-sealing screw connections (Nr. 330/331/95/97), except for Item-No. 49011, 49012 and 49013. Synthetic fibers bonded with NBR. Suitable for oils, water, steam, gases, salt solutions, fuels, alcohols, weak organic and inorganic acids, hydrocarbons, lubricants and refrigerants. DIN-DVGW/SVGW-certificates. BAM-, HTB- and KTW- tested.

Steel pipes

According to DIN EN 10255 Class M (DIN 2440), zinc plated/black, both sides male threaded, without socket



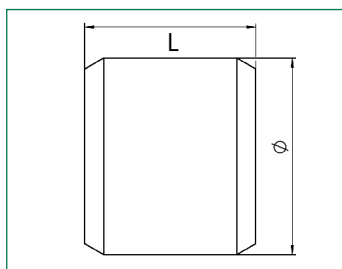
Length:	Item-No.:	Item-No.:	Item-No.:	Item-No.:	Item-No.:	Item-No.:	Item-No.:	Item-No.:	Item-No.:	Packing unit:
	3/8"	1/2"	1/2"	3/4"	3/4"	1"	1 1/4"	1 1/2"	2"	
	zinc plat.	zinc plat.	black	zinc plat.	black	zinc plat.	zinc plat.	zinc plat.	zinc plat.	
350 mm	–	20101 1	25401 7	20012 0	25402 4	–	–	–	–	10/-
400 mm	20120 2	20111 0	25411 6	20112 7	25412 3	20113 4	20114 1	–	–	10/-
450 mm	–	20121 9	25421 5	20122 6	25422 2	–	–	–	–	10/-
500 mm	20200 1	20201 8	25601 1	20202 5	25602 8	20203 2	20204 9	–	–	10/-
550 mm	–	20131 8	25431 4	20132 5	25432 1	–	–	–	–	10/-
600 mm	20210 0	20211 7	25611 0	20212 4	25612 7	20213 1	20214 8	–	–	10/-
650 mm	–	20141 7	25441 3	20142 4	25442 0	–	–	–	–	10/-
700 mm	–	20151 6	25451 2	20152 3	25452 9	20153 0	–	–	–	10/-
750 mm	–	20161 5	25461 1	20162 2	25462 8	–	–	–	–	10/-
800 mm	20220 9	20221 6	25621 9	20222 3	25622 6	20223 0	20224 7	–	–	10/-
850 mm	–	20171 4	25471 0	20172 1	25472 7	–	–	–	–	10/-
900 mm	–	20181 3	25481 9	20182 0	25482 6	20183 7	–	–	–	10/-
950 mm	–	20191 2	25491 8	20192 9	25492 5	–	–	–	–	10/-
1000 mm	20300 8	20301 5	25631 8	20302 2	25632 5	20303 9	20304 6	20305 3	20306 0	10/-
1050 mm	–	20311 4	25511 3	20312 1	25512 0	–	–	–	–	10/-
1100 mm	–	20321 3	25521 2	20322 0	25522 9	–	–	–	–	10/-
1150 mm	–	20331 2	25531 1	20332 9	25532 8	–	–	–	–	10/-
1200 mm	–	20341 1	25541 0	20342 8	25542 7	–	–	–	–	10/-
1500 mm	20400 5	20401 2	–	20402 9	–	20403 6	20404 3	20405 0	20406 7	10/-
2000 mm	20500 2	20501 9	–	20502 6	–	20503 3	20504 0	20505 7	20506 4	10/-

Steel socket, both sides chamfered

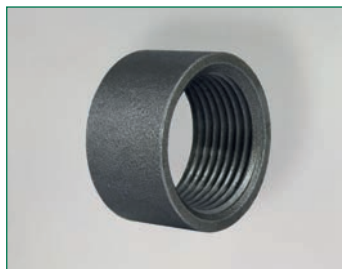


Zinc plated, extra strong, ideal for well construction, according to DIN 2448

Item-No.:	Connec.:	Thread-length:	Length:	Ø	Packing unit:
22024 1	1 1/4"	47	47	50	10/100

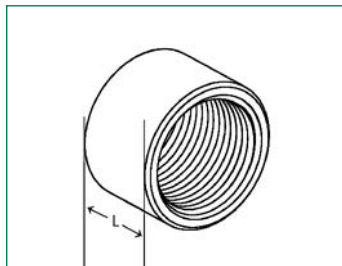


Steel socket (half length)

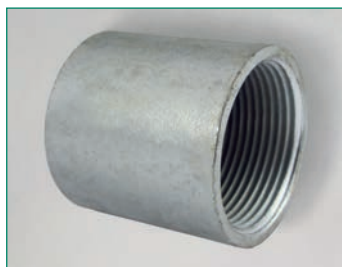


According to EN 10241 (DIN 2986), one-sided chamfered

Item-No.:	Item-No.:	Conn.:	Nominal diameter	Thread-length:	Length:	Ø	Packing unit:
zinc plated	black						
-	21971 9	1/2"		15	15	26,6	-/1000
-	21972 6	3/4"		17	17	31,8	-/ 600
-	21973 3	1"		20	20	39,5	-/ 320
-	21975 7	1 1/2"		22	22	54,5	-/ 160

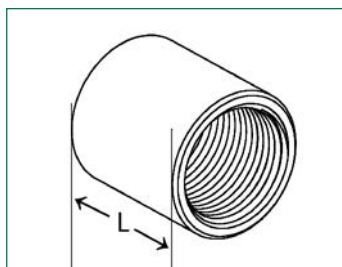


Steel socket (16)



According to EN 10241 (DIN 2986)

Item-No.:	Item-No.:	Conn.:	Nominal diameter	Thread-length:	Length:	Ø	Packing unit:
zinc plated	black						
-	21989 4	1/4"	8	25	25	18,5	-/700
22000 5	21990 0	3/8"	10	26	26	21,3	-/600
22001 2	21991 7	1/2"	15	34	34	26,6	-/500
22002 9	21992 4	3/4"	20	36	36	31,8	-/300
22003 6	21993 1	1"	25	43	43	39,5	-/160
22004 3	21994 8	1 1/4"	32	48	48	48,3	-/ 120
22005 0	21995 5	1 1/2"	40	48	48	54,5	-/ 80
22006 7	21996 2	2"	50	56	56	66,2	-/ 50
22007 4	21997 9	2 1/2"	65	65	65	82	-/ 33
22008 1	21998 6	3"	80	71	71	95	-/ 24
22009 8	21999 3	4"	100	83	83	121,4	-/ 12



Steel, black, both sides threaded according to ISO 7

Item-No.:	Connection:	Length: L	Packing unit:
21932 0	1/2"	60 mm	-/280
21934 4	1/2"	80 mm	-/200
21936 8	1/2"	100 mm	-/160

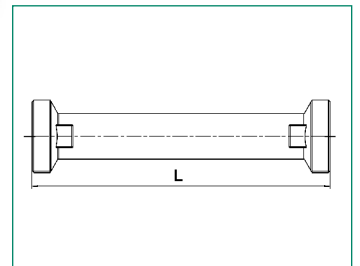
Long sleeve socket



Plain brass, CW 617 N, both sides male threaded

Item-No.:	Connection:	Length: L	Packing unit:
S-2592-81	G 3/4"	81 mm	-/200
S-2593-111	G 3/4"	111 mm	-/150
S-2593-131	G 3/4"	131 mm	-/150
S-2593-131-1"	G 1"	131 mm	-/150

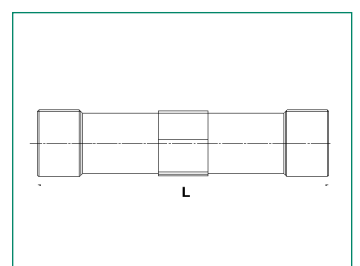
Connecting tube



Polyamide, black, both sides male threaded

Item-No.:	Connection:	Length: L	Packing unit:
S-3082-2	G 3/4"	110 mm PA6	-/80
S-3084-2	G 1"	130 mm PA6	-/80

Connecting tube



Con.: Length mm	1/4" Item-No.	Pack. unit: bag/ carton	3/8" Item-No.	Pack. unit: bag/ carton	1/2" Item-No.	Pack. unit: bag/ carton	3/4" Item-No.	Pack. unit: bag/ carton	1" Item-No.	Pack. unit: bag/ carton	1 1/4" Item-No.	Pack. unit: bag/ carton
30	-	-	24000 3	-/-	24001 0	10/400	24002 7	-/-	24003 4	10/200	-	-
40	24049 2	10/640	24040 9	10/500	24011 9	10/300	24012 6	10/200	24013 3	10/150	24014 0	10/120
50	-	-	24050 8	-/-	24021 8	10/240	24022 5	10/160	24023 2	-/-	24024 9	10/ 90
60	24069 0	-/-	24060 7	10/280	24031 7	10/ 210	24032 4	10/140	24063 8	10/120	24034 8	10/ 80
70	-	-	-	-	24111 6	-/-	24092 8	-/-	24173 4	-/-	24074 4	-/-
80	24089 8	10/400	24080 5	10/380	24041 6	10/ 160	24042 3	10/ 110	24083 6	10/ 80	24084 3	10/ 80
90	-	-	24070 6	-/-	24091 1	-/-	24112 3	-/-	24103 1	-/-	24094 2	10/ 60
100	24109 3	10/500	24100 0	10/500	24051 5	10/ 130	24052 2	10/ 90	24053 9	10/ 60	24054 6	10/ 50
110	-	-	24110 9	-/-	24121 5	-/-	24122 2	-/-	24113 0	-/-	24114 7	-/-
120	24129 1	-/-	24120 8	-/-	24131 4	10/ 110	24132 1	10/ 70	24123 9	10/ 80	24124 6	10/ 50
140	-	-	24140 6	-/-	24151 2	-/-	24152 9	-/-	24143 7	-/-	24174 1	-/-
150	24159 8	-/-	24150 5	-/-	24061 4	10/ 90	24062 1	10/120	24153 6	-/ 78	24154 3	10/ 45
160	-	-	-	-	24161 1	-/-	24162 8	-/-	24163 5	-/-	24164 2	-/-
180	-	-	-	-	24081 2	10/ 70	24142 0	10/100	24183 3	-/ 72	24184 0	-/ 10
190	-	-	-	-	-	-	-	-	24193 2	-/ 72	24194 9	10/ 70
200	24209 0	-/-	24200 7	10/ 90	24071 3	10/ 90	24072 0	10/ 40	24073 7	10/ 30	24204 5	10/ 20
220	-	-	-	-	-	-	-	-	24223 6	10/120	-	-
250	-	-	-	-	24141 3	10/120	24082 9	10/ 70	24253 3	-/ 45	24144 4	-/ 10
300	20109 7	-/-	20100 4	-/-	20110 3	10/100	20102 8	10/ 60	20103 5	-/ 40	20104 2	-/ 20

Con.: Length mm	1/4" Item-No.	Pack. unit: bag/ carton	3/8" Item-No.	Pack. unit: bag/ carton	1/2" Item-No.	Pack. unit: bag/ carton	3/4" Item-No.	Pack. unit: bag/ carton	1" Item-No.	Pack. unit: bag/ carton	1 1/4" Item-No.	Pack. unit: bag/ carton
30	-	-	25000 2	-/-	25001 9	-/-	25002 6	-/-	25003 3	-/-	-	-
40	25049 1	10/640	25040 8	-/-	25011 8	10/500	25012 5	10/380	25013 2	10/180	25014 9	10/120
50	-	-	25050 7	-/-	25021 7	-/-	25022 4	-/-	25023 1	-/-	25024 8	-/-
60	25069 9	-/-	25060 6	-/-	25031 6	10/360	25032 3	10/200	25063 7	10/120	25034 7	-/ 10
70	-	-	-	-	25111 2	-/-	25092 7	-/-	25173 3	-/-	25074 3	-/-
80	25089 7	10/400	25080 4	-/-	25041 5	10/250	25042 2	10/200	25083 5	10/120	25084 2	10/ 80
90	-	-	25070 5	-/-	25091 0	-/-	25112 2	-/-	25103 0	-/-	25094 1	-/-
100	25109 2	10/500	25100 9	10/500	25051 4	10/260	25052 1	10/ 170	25053 8	10/120	25054 5	10/ 70
110	-	-	25110 8	-/-	25121 4	-/-	25122 1	-/-	25113 9	-/-	25114 6	-/-
120	25129 0	-/-	25120 7	-/-	25131 3	10/230	25132 0	10/140	25123 8	10/ 80	25124 5	10/ 50
140	-	-	25140 5	-/-	25151 1	-/-	25152 8	-/-	25143 6	-/-	25174 0	-/-
150	25159 7	-/-	25150 4	-/-	25061 3	10/200	25062 0	10/ 120	25153 5	10/ 40	25154 2	10/ 45
160	-	-	-	-	25161 0	-/-	25162 7	-/-	25163 4	-/-	25164 1	-/-
180	-	-	-	-	25081 1	-/ 10	25142 9	10/100	25183 2	10/ 72	25184 9	-/ 10
190	-	-	-	-	-	-	-	-	25193 1	10/ 72	25194 8	10/ 70
200	25209 9	-/-	25200 6	-/-	25071 2	10/ 120	25072 9	10/ 85	25073 6	10/ 55	25204 4	-/ 32
220	-	-	-	-	-	-	-	-	25223 5	10/120	-	-
250	-	-	-	-	25141 2	10/ 120	25082 8	10/ 70	25253 2	10/ 45	25144 3	-/ 10
300	25309 6	-/-	25300 3	-/-	25301 0	10/100	25302 7	10/ 60	25303 4	10/ 40	25304 1	-/ 20

Pipe nipples (23)



According to EN 10241,
zinc plated

1 1/2"	Pack. unit: bag/ carton	2"	Pack. unit: bag/ carton	2 1/2"	Pack. unit: bag/ carton	3"	Pack. unit: bag/ carton	4"	Pack. unit: bag/ carton
Item-No.		Item-No.		Item-No.		Item-No.		Item-No.	
-	-	-	-	-	-	-	-	-	-
24045 4	-/168	24046 1	-/-	-	-	-	-	-	-
24005 8	-/-	24056 0	-/-	-	-	-	-	-	-
24065 2	-/-	24066 9	-/-	24067 6	-/-	24068 3	-/-	24169 7	-/-
24075 1	-/-	24076 8	-/-	-	-	-	-	-	-
24085 0	-/ 64	24086 7	10/40	24087 4	-/-	24088 1	-/-	24229 8	-/-
24095 9	-/-	24096 6	-/-	-	-	-	-	-	-
24105 5	-/-	24106 2	10/ 30	24107 9	10/10	24108 6	10/20	24239 7	-/-
24115 4	-/-	24116 1	-/-	-	-/-	-	-/-	-	-/-
24125 3	-/ 40	24126 0	-/ 30	24127 7	-/-	24128 4	-/-	24249 6	-/-
24145 1	-/-	24146 8	-/-	-	-/-	24148 2	-/-	-	-/-
24155 0	10/ 30	24156 7	10/ 20	24157 4	-/-	24158 1	10/10	24269 4	-/-
24165 9	-/-	24166 6	-/-	-	-/-	24168 0	-/-	-	-/-
24185 7	-/-	24186 4	-/-	24187 1	-/-	24188 8	-/-	24279 3	-/-
-	-	24196 3	-/-	-	-	-	-	-	-
24205 2	-/ 28	24206 9	10/ 10	24207 6	-/-	24208 3	-/ 8	24219 9	-/4
-	-	-	-	-	-	-	-	-	-
24255 7	-/ 24	24256 4	-/-	24257 1	-/-	24258 8	-/-	24289 2	-/-
20105 9	-/ 24	20106 6	-/-	20107 3	-/-	20108 0	-/-	20119 6	-/-

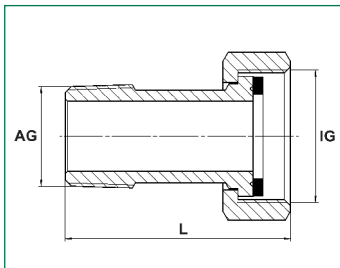
1 1/2"	Pack. unit: bag/ carton	2"	Pack. unit: bag/ carton	2 1/2"	Pack. unit: bag/ carton	3"	Pack. unit: bag/ carton	4"	Pack. unit: bag/ carton
Item-No.		Item-No.		Item-No.		Item-No.		Item-No.	
-	-	-	-	-	-	-	-	-	-
25045 3	-/-	25046 0	-/-	-	-	-	-	-	-
25005 7	-/-	25056 9	-/-	-	-	-	-	-	-
25065 8	-/-	25066 8	-/-	25067 5	-/-	25068 2	-/-	25169 6	-/-
25075 0	-/-	25076 7	-/-	-	-	-	-	-	-
25085 9	-/64	25086 6	-/-	25087 3	-/-	25088 0	-/-	25229 7	-/-
25095 8	-/-	25096 5	-/-	-	-	-	-	-	-
25105 4	-/-	25106 1	-/-	25107 8	-/-	25108 5	10/20	25239 6	10/10
25115 3	-/-	25116 0	-/-	-	-/-	-	-/-	-	-/-
25125 2	-/40	25126 9	-/30	25127 6	-/-	25128 3	-/-	25249 5	-/-
25145 0	-/-	25146 7	-/-	-	-/-	25148 1	-/-	-	-/-
25155 9	-/-	25156 0	-/-	25157 3	-/-	25158 0	-/-	25269 3	-/-
25165 8	-/-	25166 5	-/-	-	-/-	25168 9	-/-	-	-/-
25185 6	-/-	25186 3	-/-	25187 0	-/-	25188 7	-/-	25279 2	-/-
-	-	25196 2	-/-	-	-	-	-	-	-
25205 8	-/28	25206 8	10/10	25207 5	-/-	25208 2	-/ 8	25219 8	7/ 7
-	-	-	-	-	-	-	-	-	-
25255 6	-/24	25256 3	-/-	25257 0	-/-	25258 7	-/-	25289 1	-/-
25305 3	-/24	25306 5	10/10	25307 2	-/-	25308 9	-/-	25319 5	-/-



According to EN 10241,
black

Water meter screw connections made of brass

Water meter screw according to the drinking water ordinance



Brass hot-pressed, plain or chrome-plated, union nut with sealing eye, connecting piece with external thread, **with sealing**

Item-No.:	Item-No.:	Socket:	Union nut:	Length:	Packing unit:
plain	chrome plated	M	F	L	
WS-551-b-11780	WS-551-a-11780	R 1/2"	G 3/4"	45	-/ 100
WS-562-b-11780	WS-562-a-11780	R 3/4"	G 1"	58	-/ 100
WS-664-b-11780	-	R 1"	G 1 1/4"	70	2/ 50
WS-665-11780	-	R 1 1/4"	G 1 1/2"	71	0/ 25
WS-666-b-11780	-	R 1 1/2"	G 2"	82,5	0/ 25

as above, but **without sealing**

WS-551-b-11780-OD	WS-551-a-11780-OD	R 1/2"	G 3/4"	45	0/ 100
WS-562-b-11780-OD	WS-562-a-11780-OD	R 3/4"	G 1"	58	0/ 100
WS-664-b-11780-OD	-	R 1"	G 1 1/4"	60	0/ 50
WS-665-11780-OD	-	R 1 1/4"	G 1 1/2"	71	0/ 25
WS-666-b-11780-OD	-	R 1 1/2"	G 2"	82,5	0/ 25
WS-667-b-G-N	-	R 2"	G 2 1/2"	75	-/-

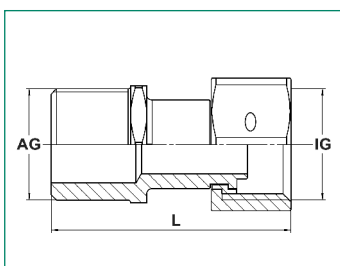
Union nut loose, with sealing (without illustration)

WS-685-b-Mutter	-	-	G 3/4"	13,5	-/ 700
WS-686-b-Mutter	-	-	G 1"	18	-/ 400
WS-664-b-Mutter	-	-	G 1 1/4"	20	-/ 200

Male threaded connecting piece, without sealing (without illustration)

WS-685-b-Tülle	-	R 1/2"	-	39,5	-/ 500
WS-686-b-Tülle	-	R 3/4"	-	48	-/ 250
WS-664-b-Tülle	-	R 1"	-	56	-/ 140

Water meter screw according to the drinking water ordinance, reduced



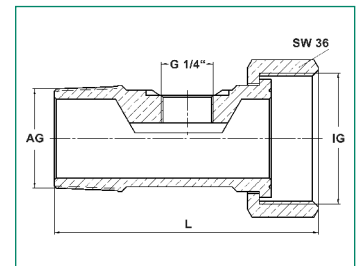
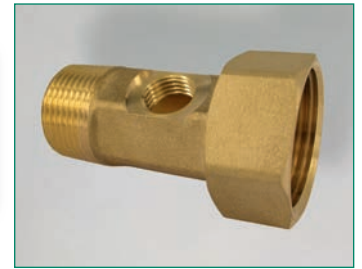
Brass hot-pressed, plain, union nut with sealing eye, connecting piece with external thread, **with sealing**

Item-No.:	Socket:	Union nut:	Length:	Wrench size:	Packing unit:
plain	M	F	L		
WS-2159 (with fuse ring)	R 1/2"	G 1/2"	45		-/-
WS-1555-b-11780	R 3/4"	G 3/4"	61,5	30	1/150
WS-1556-b-11780	R 1"	G 1"	60,5	38	1/100

Water meter screw according to the drinking water ordinance

Brass hot-pressed, plain, without sealing, with drain connection G 1/4", wrench size 36

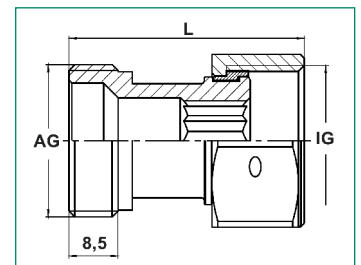
Item-No.:	Drain connec.:	Socket:	Union nut:	Length:	Packing unit:
plain	F	M	F	L	
WS-3265-OD	G 1/4"	R 3/4"	G 1"	67	-/-



Water meter screw according to the drinking water ordinance

Brass hot-pressed, plain, without sealing, with locking ring and sealing eye

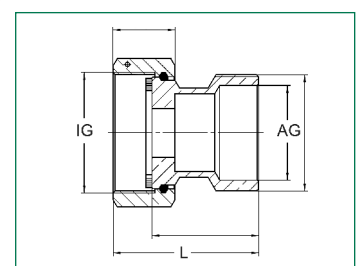
Item-No.:	Item-No.:	Socket:	Union nut:	Length:	Packing unit:
plain	chrome plated	M	F	L	
S-1228-A	-	G 3/4"	G 3/4"	41	25/100



Screw connection with union nut

Chrome-plated, with AFM sealing, F/M

Item-No.:	Dim.:	Length:	Wrench size:	Packing unit:
		L		
S-3381	G 1 1/4" x G 1 1/4"	50,5	46,5	10/50
S-3382	G 2" x G 2"	56	65	5/30

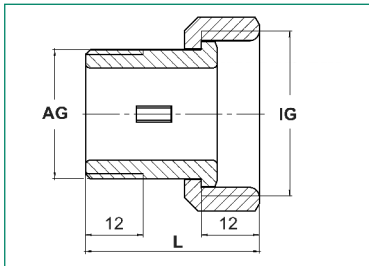


Water meter screw according to the drinking water ordinance



Brass hot-pressed, plain, without seal

Item-No.:	Item-No.:	Socket:	Union nut:	Length:	Packing unit:
plain	chrome plated	M	F	L	
S-1229	-	G 3/4"	G 1"	36	1/200



AFM gaskets



Spare parts water seals AFM 34 (DVGW/KTW W-270, SVGW, ÖVGW), temperature up to 200°C at 25 bar

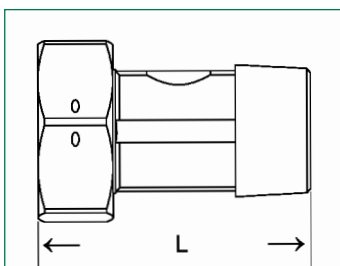
Item-No.:	Connection:	Size:	Packing unit:
WS-551-AFM	16,9 x 23,7 x 2 mm	3/4"	-/-
WS-562-AFM	23,2 x 29,8 x 2 mm	1"	-/5000
WS-1556-AFM	23,0 x 28,0 x 2 mm	1"	-/5000
WS-664-AFM	29,2 x 38,0 x 2 mm	1 1/4"	-/-
WS-665-AFM	32,0 x 44,0 x 2 mm	1 1/2"	-/-
WS-666-AFM	43,4 x 55,0 x 2 mm	2"	-/-
WS-667-AFM	-	2 1/2"	-/-

Screw connection with injection point / connection M 10x1



Plain brass, union nut with sealing eye

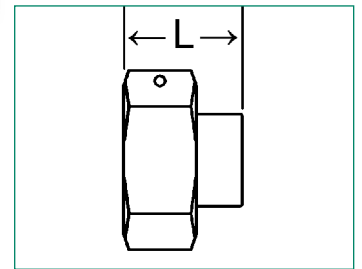
Item-No.:	Connection:	Union nut:	Length:	Packing unit:
plain	socket M		L	
WS-1475-b	R 1"	G 1 1/4"	-	10/100



Screw connection with solder connection

Plain brass, union nut with sealing eye, with sealing

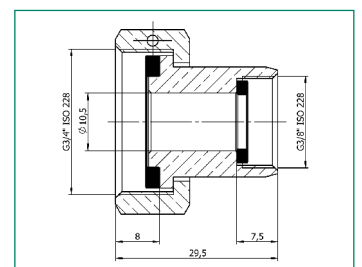
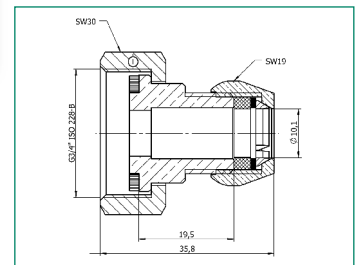
Item-No.:	Connection:	Union nut:	Length:	Packing unit:
plain	solder socket		L	
WS-563	15 mm	G 3/4"	22	-/ 100
WS-564	18 mm	G 3/4"	22	20/500
WS-565	22 mm	G 1"	31,5	-/ 100



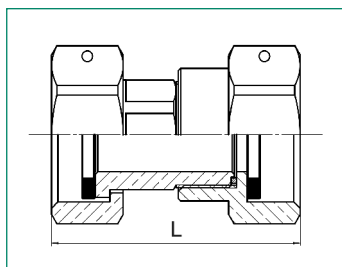
Screw connection for washstand meters

Brass chrome-plated, union nut with sealing eye

Item-No.:	Connection:	Union nut:	Length:	Packing unit:
WS-568-11780 (with sealing)	Srew connection outlet: Compression nut 3/4" x 10 mm	G 3/4"	34	-/ 80
WS-569 (with- out sealing)	Srew connection inlet: Female thread 3/8"	G 3/4"	29,5	-/100
WS-570	Set consisting of: WS-568-11780 + WS-569			10/500



Screw connection for tap water meter



Brass chrome-plated, female thread on both sides, for connection with outlet valves 1/2" and 3/4", union nut with sealing eye

Item-No.:	Connection:	suitable for: outlet valves size	Length: L	Packing unit:
WS-566	G 3/4" x G 3/4"	1/2"	47	-/100
WS-566-11780 (with AFM sealing)	G 3/4" x G 3/4"	1/2"	47	-/100
WS-567 (without sealing)	G 3/4" x G 1"	3/4"	49	-/100

Compression fittings, brass, for PE-pipes

Compression fittings for plastic pipes (HDPE and LDPE) in sizes from 1/2" x 20 mm to 3" x 90 mm. Suitable for piping systems underground or above ground level for fixed or mobile installation. For conveying potable water, waste water and other liquid media.

Material: brass (MS 58)

maximum operating pressure: 16 bar

operating temperature: -20°C to + 120°C

application range: Gas approved, tested according to
DIN DVGW V 114 W

Consisting of housing, for example female thread, O-ring, pressure ring, clamping ring and screws (nut).
For the medium gas a gas sleeve or a support tube must be used in addition.



Straight form, with female thread and union nut

Item-No.:	Female thread: Size	PE-pipe- Size	PE-pipe- outside Ø	Packing unit:
34501 2	G 1/2"	1/2"	20 mm	20/ 320
34502 9	G 3/4"	3/4"	25 mm	15/ 240
34503 6	G 1"	1"	32 mm	12/ 120
34504 3	G 1 1/4"	1 1/4"	40 mm	6/ 60
34505 0	G 1 1/2"	1 1/2"	50 mm	4/ 72
34506 7	G 2"	2"	63 mm	2/ 38



Straight form, with male thread and union nut

Item-No.:	Female thread: Size	PE-pipe- Size	PE-pipe- outside Ø	Packing unit:
34511 1	G 1/2"	1/2"	20 mm	20/ 320
34512 8	G 3/4"	3/4"	25 mm	15/ 240
34513 5	G 1"	1"	32 mm	12/ 120
34514 2	G 1 1/4"	1 1/4"	40 mm	6/ 60
34515 9	G 1 1/2"	1 1/2"	50 mm	4/ 72
34516 6	G 2"	2"	63 mm	2/ 38



Elbow, with two union nuts

Item-No.:	Female thread: Size	PE-pipe- Size	PE-pipe- outside Ø
34571 5	1/2"	20 mm	12/ 216
34572 2	3/4"	25 mm	10/ 100
34573 9	1"	32 mm	6/ 78
34574 6	1 1/4"	40 mm	4/ 48
34575 3	1 1/2"	50 mm	2/ 36
34576 0	2"	63 mm	2/ 14



Elbow, with female thread and union nut



Item-No.:	Female thread-size	PE-pipe-size	PE-pipe-outside Ø	Packing unit:
34521 0	G 1/2"	1/2"	20 mm	15/ 240
34522 7	G 3/4"	3/4"	25 mm	12/ 192
34523 4	G 1"	1"	32 mm	8/ 104
34524 1	G 1 1/4"	1 1/4"	40 mm	6/ 72
34525 8	G 1 1/2"	1 1/2"	50 mm	4/ 48

Elbow, with male thread and union nut



Item-No.:	Male thread-size	PE-pipe-size	PE-pipe-outside Ø	Packing unit:
34531 9	G 1/2"	1/2"	20 mm	15/ 240
34532 6	G 3/4"	3/4"	25 mm	12/ 120
34533 3	G 1"	1"	32 mm	8/ 80
34534 0	G 1 1/4"	1 1/4"	40 mm	6/ 72
34535 7	G 1 1/2"	1 1/2"	50 mm	4/ 48
34536 4	2"	2"	63 mm	2/ 38

Elbow, with female thread union nut and wall fixation



Item-No.:	Female thread-size	PE-pipe-size	PE-pipe-outside Ø	Packing unit:
34541 8	G 1/2"	1/2"	20 mm	15/ 150
34542 5	G 3/4"	3/4"	25 mm	12/ 156
34543 2	G 1"	1"	32 mm	8/ 64

T-piece, with three union nuts



Item-No.:	PE-pipe-size	PE-pipe-outside Ø	Packing unit:
34566 1	1/2"	20 mm	6/ 144
34567 8	3/4"	25 mm	6/ 108
34568 5	1"	32 mm	4/ 52
34569 2	1 1/4"	40 mm	4/ 36
34570 8	1 1/2"	50 mm	2/ 28
34560 9	2"	63 mm	-/-

T-piece, with female thread and two union nuts

Item-No.:	Female thread-size	PE-pipe-size	PE-pipe- outside Ø	Packing unit:
34551 7	G 1/2"	1/2"	20 mm	8/192
34552 4	G 3/4"	3/4"	25 mm	6/ 96
34553 1	G 1"	1"	32 mm	4/ 72
34554 8	G 1 1/4"	1 1/4"	40 mm	4/ 36
34555 5	G 1 1/2"	1 1/2"	50 mm	2/ 26



Straight short form, with two union nuts

Item-No.:	PE-pipe-size	PE-pipe- outside Ø	Packing unit:
34581 4	1/2"	20 mm	12/192
34582 1	3/4"	25 mm	10/160
34583 8	1"	32 mm	8/ 104
34584 5	1 1/4"	40 mm	4/ 80
34585 2	1 1/2"	50 mm	2/ 48
34580 7	2"	63 mm	-/-



Straight long form, with two union nuts

Item-No.:	PE-pipe-size	PE-pipe- outside Ø	Packing unit:
34586 9	1"	32 mm	6/72
34587 6	1 1/4"	40 mm	4/36
34588 3	1 1/2"	50 mm	2/36
34589 0	2"	63 mm	2/ 14



Sealing set for PE pipe compression fittings

Item-No.:	PE-pipe-size	PE-pipe- outside Ø	Packing unit:
34591 3	1/2"	20 mm	-/100
34592 0	3/4"	25 mm	-/ 75
34593 7	1"	32 mm	-/ 50
34594 4	1 1/4"	40 mm	-/ 30



Supporting ferrule



Stainless steel, necessary for the use with the medium gas, only for PE pipe compression fittings made of brass

Item-No.:	PE-pipe-size	Packing unit:
34500 5	1/2"	-/100
34510 4	3/4"	-/ 75
34520 3	1"	-/ 50
34530 2	1 1/4"	-/ 30

Compression fittings, polypropylene, for PE-pipes

Material: PP

maximum operating pressure: 10 bar

operating temperature : 0°C to + 30°C

application range : Irrigation and spray irrigation, not suitable for gas or compressed air.

Consisting of housing, for example female thread, O-ring, pressure ring, clamping ring and union nut.

Straight form, with two union nuts



Item-No.:	Female thread-size	PE-pipe- outside Ø	Packing unit:
35581 3	1/2"	20 mm	50/300
35582 0	3/4"	25 mm	50/200
35583 7	1"	32 mm	50/ 150
35584 4	1 1/4"	40 mm	-/ 90
35585 1	1 1/2"	50 mm	-/ 50
35586 8	2"	63 mm	-/ 30

Straight form, with female thread and union nut



Item-No.:	Female thread-size	PE-pipe-size	PE-pipe- outside Ø	Packing unit:
35501 1	1/2"	1/2"	20 mm	50/350
35502 8	3/4"	3/4"	25 mm	50/350
35503 5	1"	1"	32 mm	50/200
35504 2	1 1/4"	1 1/4"	40 mm	-/ 125
35505 9	1 1/2"	1 1/2"	50 mm	-/ 75
35506 6	2"	2"	63 mm	-/ 65

Straight form, with male thread and union nut

Item-No.:	Male thread-size	PE-pipe-size	PE-pipe-outside Ø	Packing unit:
35511 0	1/2"	1/2"	20 mm	50/550
35512 7	3/4"	3/4"	25 mm	50/350
35513 4	1"	1"	32 mm	50/200
35514 1	1 1/4"	1 1/4"	40 mm	-/ 130
35515 8	1 1/2"	1 1/2"	50 mm	-/ 80
35516 5	2"	2"	63 mm	-/ 45



Elbow, with two union nuts

Item-No.:	PE-pipe-size	PE-pipe-outside Ø	Packing unit:
35571 7	1/2"	20 mm	50/250
35572 1	3/4"	25 mm	50/200
35573 8	1"	32 mm	-/ 50
35574 5	1 1/4"	40 mm	-/ 70
35575 2	1 1/2"	50 mm	-/ 40
35576 9	2"	63 mm	-/ 23



Elbow, with female thread and union nut

Item-No.:	Female thread-size	PE-pipe-size	PE-pipe-outside Ø	Packing unit:
35521 9	1/2"	1/2"	20 mm	20/460
35522 6	3/4"	3/4"	25 mm	20/300
35523 3	1"	1"	32 mm	50/ 150
35524 0	1 1/4"	1 1/4"	40 mm	5/ 90
35525 7	1 1/2"	1 1/2"	50 mm	-/ 55
35526 4	2"	2"	63 mm	-/ 30



Elbow, with male thread and union nut

Item-No.:	Male thread-size	PE-pipe-size	PE-pipe-outside Ø	Packing unit:
35531 8	1/2"	1/2"	20 mm	50/450
35532 5	3/4"	3/4"	25 mm	50/300
35533 2	1"	1"	32 mm	50/ 150
35534 9	1 1/4"	1 1/4"	40 mm	-/ 120
35535 6	1 1/2"	1 1/2"	50 mm	-/ 60
35536 3	2"	2"	63 mm	-/ 35



T-piece, with three union nuts



Item-No.:	PE-pipe-size	PE-pipe- outside Ø	Packing unit:
35566 0	1/2"	20 mm	50/150
35567 7	3/4"	25 mm	50/150
35568 4	1"	32 mm	-/ 80
35569 1	1 1/4"	40 mm	-/ 45
35559 2	1 1/2"	50 mm	-/ 25
35560 8	2"	63 mm	-/ 14

T-piece, with female thread and two union nuts



Item-No.:	Female thread-size	PE-pipe-size	PE-pipe- outside Ø	Packing unit:
35551 6	1/2"	1/2"	20 mm	20/240
35552 3	3/4"	3/4"	25 mm	10/ 150
35553 0	1"	1"	32 mm	50/ 100
35554 7	1 1/4"	1 1/4"	40 mm	-/ 60
35555 4	1 1/2"	1 1/2"	50 mm	-/ 33
35556 1	2"	2"	63 mm	-/ 20
35550 9	3/4"	1"	32 mm	-/ 100

T-piece, with male thread and two union nuts



Item-No.:	Male thread-size	PE-pipe-size	PE-pipe- outside Ø	Packing unit:
35541 7	1/2"	1/2"	20 mm	50/200
35542 4	3/4"	3/4"	25 mm	50/ 150
35543 1	1"	1"	32 mm	-/ 100
35544 8	1 1/4"	1 1/4"	40 mm	-/ 50
35545 5	1 1/2"	1 1/2"	50 mm	-/ 30
35546 2	2"	2"	63 mm	-/ 18

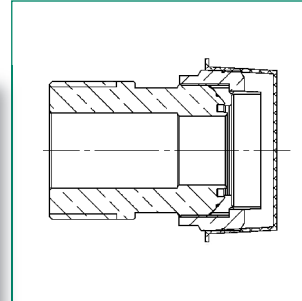
Brass fittings for solar corrugated stainless steel pipes

material: CW617N, surface: plain

Corrugated screw connection with male thread, metal sealing, safety clamps with teeth, with red plastic protection cap

Item-No.:	Connection:	Packing unit:
36321 4	1/2" x DN 12	-/50
36322 1	R1/2" x DN 16	-/50
36323 8	R3/4" x DN 16	-/50
36324 5	R3/4" x DN 20	-/50
36325 2	R1" x DN 20	-/50

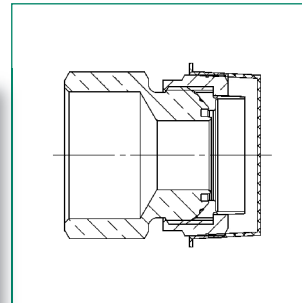
Screw connection with male thread



Corrugated screw connection with female thread, metal sealing, safety clamps with teeth, with red plastic protection cap

Item-No.:	Connection:	Packing unit:
36311 5	1/2" x DN 12	-/100
36312 2	Rp 1/2" x DN 16	-/100
36313 9	Rp 3/4" x DN 16	-/ 50
36314 6	Rp 3/4" x DN 20	-/ 50
36315 3	Rp 1" x DN 20	-/ 50

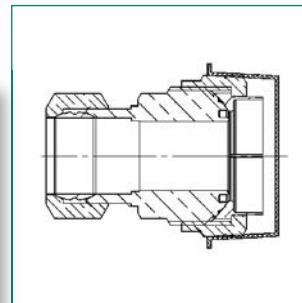
Screw connection with female thread



For connection with corrugated tube/copper pipe, safety clamps with teeth, with red plastic protection cap

Item-No.:	Connection:	Packing unit:
36331 3	15 mm x DN 16	-/50
36332 0	18 mm x DN 16	-/50
36333 7	18 mm x DN 20	-/50
36334 4	22 mm x DN 20	-/50
36335 1	22 mm x DN 16	-/50

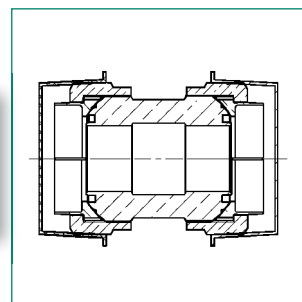
Screw connection for copper pipe



Corrugated screw connection (coupling), metal sealing, safety clamps with teeth, with red plastic protection cap

Item-No.:	Connection:	Packing unit:
36301 6	DN 16 x DN 16	-/50
36302 3	DN 20 x DN 20	-/50

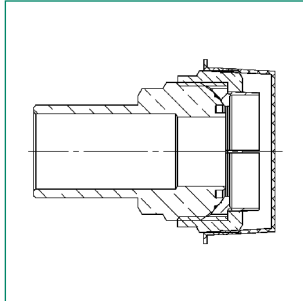
Screw connection (coupling)



Brass fittings for solar corrugated stainless steel pipes

material: CW617N, surface: plain

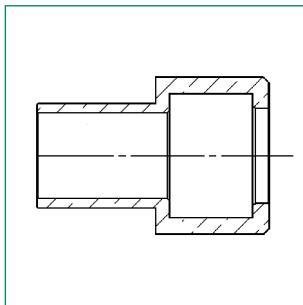
Connecting piece



Metal sealing, safety clamps with teeth, with red plastic protection cap

Item-No.:	Connection:	Packing unit:
36343 6	22 mm x DN 16	-/100
36345 0	22 mm x DN 20	-/ 50

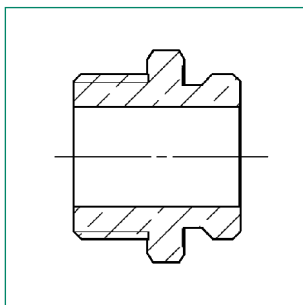
Connecting piece



Socket with smooth spout, hexagonal

Item-No.:	Connection:	Packing unit:
36371 9	G 3/4" x 18/22 mm	-/250
36372 6	G 1" x 18/22 mm	25/150

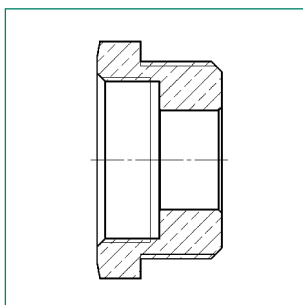
Nipple male thread / male thread



Nipple with male thread/male thread, delivery without O-ring

Item-No.:	Connection:	Packing unit:
36373 3	G 3/4" x G 3/4" L= 27 mm	25/350

Bushing



With male thread/female thread for flat-sealing connections

Item-No.:	Connection:	Packing unit:
36350-3/4	G 3/4" x G 1/2"	-/250
36350-1	G 1" x G 3/4"	-/ 175
36350-1 1/4	G 1 1/4" x G 1"	-/ 80

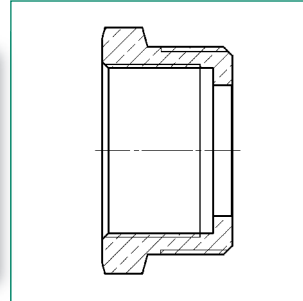
Brass fittings for solar corrugated stainless steel pipes

material: CW617N, surface: plain

Bushing

With male thread/female thread, metal sealing (conical thread)

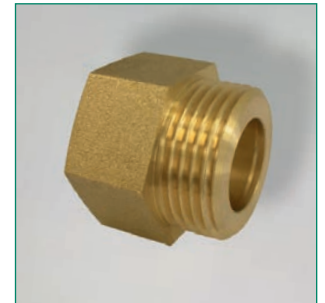
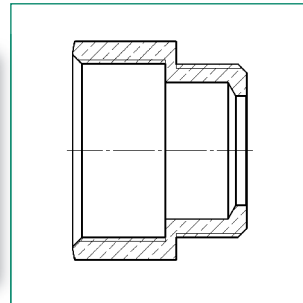
Item-No.:	Connection:	Packing unit:
36351-3/4	G 3/4" x Rp 1/2"	-/350
36351-1	G 1" x Rp 3/4"	-/200
36351-1 1/4	G 1 1/4" x Rp 1"	-/ 80
36351-1 1/2	G 1 1/2" x Rp 1 1/4"	-/100



Socket nipple

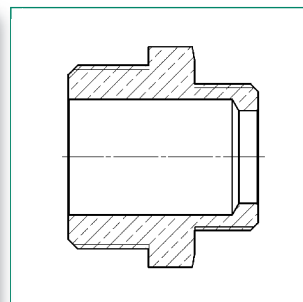
With male thread/female thread, with enlarged wrench flat

Item-No.:	Connection:	Packing unit:
36352-1/2	G 1/2" x Rp 1/2"	-/350
36352-3/4	G 3/4" x Rp 3/4"	-/200
36352-1	G 1" x Rp 1"	-/120
36352-1 1/4	G 1 1/4" x Rp 1 1/4"	-/ 90



Hexagon double nipple

Item-No.:	Connection:	Pack. unit:
With male thread/male thread, cylindrical thread , flat sealing		
36353-3/4	G 3/4" x G 1/2"	10/200
36353-1	G 1" x G 3/4"	-/ 110
36353-1 1/4	G 1 1/4" x G 1"	-/ 50
36353-1 1/2	G 1 1/2" x G 1 1/4"	-/ 50
With male thread/male thread, reduced thread , conical sealing		
36354-3/4	G 3/4" x R 1/2"	-/200
36354-1	G 1" x R 3/4"	-/ 80
36354-1 1/4	G 1 1/4" x R 1"	-/ 50
36354-1 1/2	G 1 1/2" x R 1 1/4"	-/ 50
With male thread/male thread, equal , flat sealing		
36355-1/2	G 1/2", L= 28 mm, WS 21	15/300
36355-3/4	G 3/4", L= 29 mm, WS 27	10/200
36355-1	G 1", L= 31 mm, WS 34	10/100
36355-1 1/4	G 1 1/4", L= 36 mm, WS 42/6	-/ 45
36355-1 1/2	G 1 1/2", L= 40 mm, WS 48/8	-/ 50



G = cylindrical
R = conical

puteus GmbH terms and conditions for contracting, delivery, and payment

Section 1 General

1. These general conditions of sale apply to all present and future business relations with companies, legal persons governed by public law, and separate estates under public law with respect to deliveries and other services including work orders and the delivery of non-fungible items.
2. The buyer's purchasing terms will not be recognized even if puteus GmbH does not explicitly object to them upon becoming aware of them or after receipt unless puteus GmbH explicitly approves of their validity in writing.

Section 2 Offerings

1. Offerings from puteus GmbH are non-binding and subject to availability.
2. The right to make reasonable technical changes in the form, color, and/or weight of offerings is reserved.

Section 3 Shipping

1. Shipping, including free delivery, is at the buyer's own risk. Selection of the routing is hereby ceded to puteus GmbH. The buyer will bear the shipping costs unless an agreement to the contrary has been made in writing.
2. Transportation insurance will only be obtained upon written request by the buyer and at the buyer's expense. Any damages incurred in transit are to be immediately reported to the carrier and to puteus GmbH.
3. If items should be delivered in returnable containers, then the containers are to be emptied of residues upon receipt and promptly returned carriage paid. Loss or damage of re-use packaging will be at the buyer's expense if the buyer is responsible.
4. Non-returnable packaging will not be accepted by puteus GmbH and must be disposed of by the customer and the customer's expense.
5. Returnable containers that are not explicitly included in the price or the invoice amount will only be made available on loan. They will remain the property of puteus GmbH.

Section 4 Passage of risk

The risk of accidental loss or accidental impairment of products will pass to the buyer upon delivery or, in the event of sale by dispatch, with the handing over of the item to the shipper, carrier, or other person or institution designated to execute the act of shipping.

Section 5 Delivery/acceptance

1. Delivery periods are approximate. They are subject to timely receipt of supplies. If puteus GmbH does not adhere to agreed delivery periods, then the buyer is to set an appropriate subsequent delivery period of at least three weeks for puteus GmbH in writing starting upon receipt of the new deadline by puteus GmbH. The buyer will be entitled to withdraw upon expiration of the subsequent deadline. puteus GmbH will be authorized to make subsequent delivery until a written declaration of withdrawal has been received.
2. In the event of force majeure, industrial action, or other faultless stoppages that last longer than one week, the delivery or acceptance period will be extended by the duration of the hindrance up to a maximum of five weeks in addition to a subsequent-delivery period. The extension will only come into effect if the reason for the hindrance is promptly reported to the other party as soon as it has been observed that the aforementioned period cannot be complied with.
3. Partial deliveries are permissible.
4. In the event that the buyer should default in taking delivery, puteus GmbH will be authorized, after setting a five-day grace period, to invoice the buyer as of the time that the product was provided or to withdraw from the agreement or to demand compensation for damages at its own discretion. Storage of products that are not accepted by the buyer will be at the buyer's own risk and will take storage costs into account.

Section 6 Sample materials

1. Samples will be delivered at cost. In the absence of any agreement to the contrary, samples that have been loaned to the buyer by puteus GmbH will remain our property.
2. In consideration of technical or material-dependent deviations in production, samples are not considered samples in the meaning of Section 454 of the German Civil Code (BGB).

Section 7 Prices

1. puteus GmbH prices are net prices and do not include statutory value-added tax.
2. If there should be a period of more than four months between the conclusion of the agreement and delivery, then the puteus GmbH prices as of the day of delivery will apply. This will not apply if delivery has been delayed due to the fault of puteus GmbH.

Section 8 Payment

1. puteus GmbH invoices will be issued on the day of delivery or provision of the product. Payment will be due in full within 30 days of the invoice date. In the event of payment within eight days of the invoice date, puteus GmbH will grant a cash discount of 2% of the remaining invoice amount after any trade discounts have been deducted.
2. Upon payment after the due date, puteus GmbH will calculate an interest rate of an additional 8% above the base rate. Both puteus GmbH and the buyer will be at liberty to present evidence of greater or lesser damage.
3. The credit balance may only be adjusted based on claims that are uncontested or that have been determined without further legal recourse. The same applies to withholding due invoice amounts unless the counterclaim is based on the same statutory relationship.

4. puteus GmbH will not be obligated to make further deliveries on the basis of any current contracts until due invoice amounts have been paid in full, including interest. If after a contract has been concluded it should become apparent that puteus GmbH's pecuniary claim is in jeopardy due to the buyer's insolvency or if the buyer should be in default on a significant payment amount or if other circumstances should arise indicating that the buyer's solvency has significantly deteriorated, then the rights according to Section 321 of the German Civil Code (BGB) will accrue to puteus GmbH. puteus GmbH will then also be authorized to accelerate all claims that are not yet due based on the current business relationship with the buyer

5. The supplier is entitled to assign his receivables against buyers to a third party.
6. The buyer is obliged to reimburse any fees, costs and expenses in connection with any successful legal prosecution against him outside Germany.

Section 9 Liability for defects

1. Obvious defects or other objections with respect to the delivery item – including the absence of guaranteed or warranted qualities – are to be promptly reported to puteus GmbH in writing no later than 14 days after receipt of the delivery item.
2. puteus GmbH assumes no liability for deviations in quality, color, size, (specific) weight, or equipment that might arise in the course of normal business practice, are minimal, or are unavoidable. Application-specific verbal and written consultation from puteus GmbH – including from puteus GmbH's vendors – will not exempt the buyer from responsibility to examine delivered products for their intended purpose.
3. No objections to obvious defects will be accepted after the product has begun to be processed.
4. Upon receipt of valid notice of defect within the prescribed time limit, puteus GmbH may choose to eliminate the defect or deliver a non-defective product (supplementary performance) at its own discretion. In the event that puteus GmbH should fail or refuse to execute supplementary performance, the buyer may withdraw from the agreement or reduce the purchase price after an appropriate period has unsuccessfully elapsed. If the defect is insignificant or if the product has already been sold, processed, or altered, then the buyer will only be entitled to a reduction of payment.

Section 10 General limitation of liability, statute of limitations, and right of recourse

1. puteus GmbH, including its management and other auxiliary persons, will be liable for violations of contractual or non-contractual obligations, particularly due to impossibility, delay, fault in preparing the contract, or tort, only in the event of wrongful intent or gross negligence and only with respect to damages that are typical of the contract and that are foreseeable at the time that the contract is concluded. For the remainder, liability on the part of puteus GmbH is also excluded for damages caused by defects and consequential damages.
2. These restrictions will not apply to culpable violation of essential contractual obligations that jeopardize the purpose of the contract; in the event of culpably induced harm to life, body, or health; if and to the extent that puteus GmbH has guaranteed the state of the purchased item or has assumed a procurement risk; nor in cases of compulsory liability according to the German Product Liability Law. This will have no effect on regulations concerning the burden of proof.
3. In the absence of any agreement to the contrary, the statutory limit on contractual claims against puteus GmbH that accrue to the buyer by reason of and in connection with product delivery will be one year after delivery of the product. This term will not apply to products that are used for a construction in a manner that is in keeping with their conventional use. This will have no effect on puteus GmbH's liability arising from intentional or grossly negligent breaches of obligation or culpably induced harm to life, body, or health.
4. The buyer's right of recovery in accordance with Section 478 of the German Civil Code (BGB) against puteus GmbH is restricted to the statutory scope of warranty claims that are invoked against the buyer by a third party and assumes that the buyer has fulfilled its obligation to puteus GmbH to give notice of defects in accordance with Section 377 of the BGB.

Section 11 Reservation of ownership

1. Delivered products will remain the property of puteus GmbH until all claims as of the moment that the contract was concluded have been paid in full regardless of the legal basis for the claims. This will apply even if payments for particularly specified claims have been made. Neither the suspension of individual claims in a current account nor the balancing of accounts and acknowledgment thereof will affect the reservation of ownership.
2. If the reserved product that was delivered to the buyer should be machined or processed by the buyer, the machining or processing by the buyer will be executed by the buyer for puteus GmbH without any obligations accruing to puteus GmbH. If the delivery item is connected to, mixed with, or combined with items that do not belong to puteus GmbH, then puteus GmbH will be come the co-owner of the total item in accordance with statutory provisions. If the buyer should acquire sole ownership of the new item, then it hereby transfers co-ownership of the items connected to it to puteus GmbH in proportion to the value of the delivery item at the time that the connection was made.
3. If the buyer should sell the reserved product individually or in conjunction with a product that does not belong to puteus GmbH, then the buyer hereby assigns the claims resulting from the resale to puteus GmbH in the amount of the value of the reserved product with all ancillary rights and claims that accrue in lieu of the reserved product. If the resold product is co-owned by

puteus GmbH, then the claim assignment will extend to the amount that corresponds to puteus GmbH's share of the co-ownership. puteus GmbH hereby accepts these assignments. Incorporation of the reserved product into built structures will also be considered a sale.

4. The buyer is hereby authorized to collect on claims arising from resale. This collection authorization will become void if it should be revoked by puteus GmbH no later than the moment of a default on payment, non-payment of a bill, or petitioning for the initiation of bankruptcy proceedings. puteus GmbH will only invoke its right to revocation if, after the conclusion of the agreement, it becomes apparent that puteus GmbH's pecuniary claim arising from this or from another agreement with the buyer is in jeopardy due to the buyer's insolvency. Upon request by puteus GmbH, the buyer will be obligated to immediately inform its own buyer of the assignment to puteus GmbH and to promptly transfer to puteus GmbH the documents necessary for collection, in particular the buyer must transfer to puteus GmbH a precise summary of its claims with the name and mailing address of its own buyer and must provide puteus GmbH with all the information necessary to assert the assigned claims. The buyer hereby authorizes puteus GmbH to inform the secondary buyer of the assignment and to collect on the claims immediately upon default on a payment or deterioration of its financial circumstances. puteus GmbH will have the right to demand that the legal validity of the assigned claims be examined by a representative based on the buyer's accounting. The buyer must provide puteus GmbH with a summary of the reserved products that are still on hand.
5. If the buyer should act in breach of contract, and particularly in the event of a default on payment, puteus GmbH will be authorized to withdraw the delivery item after giving formal notice and setting a time limit and the buyer will be obligated to return it. Neither assertion of the reservation of ownership nor seizure of the delivery item by puteus GmbH will be considered withdrawal from the agreement.
6. The buyer is hereby authorized and empowered to resell, use, or incorporate the reserved product only in the conventional and proper course of business and only on the understanding that claims that have been assigned in accordance with the provisions above will in fact proceed to puteus GmbH. The buyer is not authorized to otherwise transfer the reserved product. The buyer may not pledge the reserved product nor transfer ownership as collateral. The buyer's authorization in accordance with the first sentence of this paragraph will not apply in the event of impending or already established insolvency or in the event of other essential deterioration of its financial circumstances.
7. The buyer must both promptly inform puteus GmbH of enforcement measures undertaken by third parties with respect to the delivery item with reserved ownership or the claims assigned to us and deliver the documents necessary to challenge the enforcement.
8. If the value of the total collateral granted to puteus GmbH should exceed puteus GmbH's claims by more than 20%, then puteus GmbH will be obligated and prepared to return or release to the buyer the collateral granted to puteus GmbH to the extent that it exceeds the agreed coverage limit.

Section 12 Blanket orders and call orders

1. If an on-call purchase is agreed with the buyer, then payment for outstanding deliveries will be due automatically upon expiry of the on-call term. The buyer will then be obligated to call for the outstanding deliveries and to pay the agreed purchase price as paid for the transfer of the property. With respect to any individual installment, in addition to fulfillment, puteus GmbH will have the right to demand compensation for pecuniary detriment or to proceed in accordance with Section 323 of the German Civil Code (BGB).

2. If the buyer should fail to call for the agreed deliveries within the agreed on-call term, then puteus GmbH will have the right to otherwise utilize the products without fixing a time limit. The same will apply if the buyer should file for bankruptcy within the on-call term and/or become insolvent.

Section 13 Price clause

puteus GmbH hereby reserves the right to reasonably change its prices for all orders – including on-call orders and call-off contracts – that, either contractually or at the buyer's request, are delivered more than three months after the order was placed if costs should decline or increase after the contract was concluded, particularly due to wage increases or changes in the cost of materials. The orderer will be provided with evidence of such changes upon request.

Section 14 Proprietary rights, tools, models, and illustrations

1. If items are delivered based on illustrations or other details provided by the buyer, then it will be the buyer's responsibility to ensure their accuracy and that no third party proprietary rights are violated. The buyer must indemnify puteus GmbH against any claims by a holder of proprietary rights.
2. puteus GmbH may invoice for molds, models, tools, and equipment that are required for the ordered product. They will remain property of puteus GmbH even if puteus GmbH manufactured them on behalf of the buyer and/or has paid the buyer in whole or in part. This will apply even if they were manufactured according to special instructions from the buyer, which uses them exclusively for deliveries to the orderer, as long as it fulfills its commitment and payment obligations and the business relationship persists.
3. If no parts are reordered two years after the last production, then puteus GmbH, after giving appropriate notice to the buyer and after a period of six weeks from receipt of notice by the buyer, will have the right to scrap or otherwise utilize the molds, models, tools, and manufactured equipment.
4. If the buyer should file for bankruptcy, puteus GmbH will be authorized to scrap or otherwise utilize the molds, models, tools, or manufactured equipment before two years have expired and without notifying the buyer in advance.

Section 15 Return of catalog products

Catalog products may only be returned due to product redelivery according to prior agreement and are to be undertaken freely. 30% of the handling costs will be deducted from any credit entries for re-saleable products.

Section 16 Place of fulfillment/legal venue

1. The place of fulfillment for all claims arising from the contractual relationship will be puteus GmbH's principle place of business.
2. For all present and future claims arising from the business relationship, including bills and checks receivable, the legal venue will be puteus GmbH's corporate headquarters. This will apply even if the buyer has no legal venue in Germany or if the buyer's domicile or usual residence is unknown at the time when proceedings are instituted. puteus GmbH will also be authorized to bring an action at the buyer's principle place of business.
3. The laws of the Federal Republic of Germany will apply. The terms of the United Nations Convention on Contracts for the International Sale of Goods will not apply.
4. If particular terms of the agreement with the client, including these General Terms and Conditions, should be or become legally inoperable in whole or in part, the validity of the remaining terms will be wholly or partially unaffected. The wholly or partially inoperable provision will be replaced by a provision whose commercial outcome approximates that of the inoperable term as closely as possible.

puteus GmbH, Lenenweg 6, D-47918 Tönisvorst
Version: August 2023

TECHNICAL INFORMATION

Size and weight

Unless otherwise stated, all dimensions are in millimeters (mm) and weights are in grams (g).

PN = nominal pressure in bars 1 bar 10N / cm² ⇒ ca. 10 m column of water

DN = nominal diameter in inches or mm 1" = 25,4 mm ⇒ ca. 25 mm

Nominal pressure is the maximum applicable pressure at the standard temperature, which, unless otherwise stated, is 20°C.

Nominal diameter is the excess pressure when all operational conditions are taken into consideration, including pressure surges. It depends on the operating temperature, the medium, the size of the component/valve, and, where applicable, the type of seal.

There are legal provisions or regulations that apply to certain areas of application and that take precedence over the guidelines provided in this catalog.

Medium

The details presented in this catalog with respect to pressure and temperature conditions refer to water.

Suitability for gases, oils, or glycolic or other media should be investigated in light of the operating pressure and operating temperature. Our applicability information may not be applied to media or operating conditions other than those that have been approved without our clearance.

Custom models

If there are no articles in our standard program that are suitable for your needs, we can also create custom models upon request. For this, we would need a detailed letter of inquiry with the corresponding number of units as well as drawings or sample parts.

Installation instructions

A) Screw thread

Connection dimensions and screw thread of complementary proportions must always be selected.

The screw thread should not be too strongly sealed with hemp or sealing tape, which is to say that after the hemp has been applied, the crest of the thread must still be visible. Sealing the thread too strongly will increase the pressure in the component. Over time, that pressure can cause cracks.

To avoid causing damage during installation, the components should be conventionally screwed in with the appropriate, customary tools, without excessive force and without lever extension.

Self-sealing valves must not be sealed further with hemp or sealing tape. The corresponding mating thread must be of sufficient length (min. 12 mm). Where applicable, components are only to be installed on the spanner flats provided for that purpose by means of a suitable spanner/pliers. Our products must be installed without tension in due consideration for the information above. Alignment, e.g., of connections that we provide by means of heating appliances, is prohibited because this can also cause tension cracks and secondary damage later on.

Where applicable, connecting different metals or alloys can cause corrosion, for which puteus GmbH cannot be held liable (e.g., connections between brass and stainless steel or copper with zinc-plated metals). These characteristics are to be checked before our products are installed.

The components' pressure and sealing are to be carefully tested after installation. Where applicable, the installation instructions that are enclosed with the components are to be observed when doing so.

B) Gate valve

After disassembly/repairs/maintenance work, the upper section is only to be reassembled with a raised sealing wedge. Do not damage sealing surfaces/key seats. Sealing wedges cannot be replaced.

C) Socket slide valve

These must only be installed in closed position. Key seats must not be damaged by screwing in pipes by force.

D) Ball valves

To ensure operability, for example, only set ball valves on very low static and dynamic power. Where applicable, the component should be supported by appropriate measures (e.g., pipe clamps or similar). The torque to be applied to the ball valve must only be applied to the spanner flats at the end that is being screwed in, otherwise there is a risk that the ball valve could be unsealed or cracked. Likewise, bodies and ball valve screwing components must not be screwed against one another. Doing so would also cause leaks and/or the risk of breakage.

E) Pipe and hose connections

According to DIN EN 1717 pipe and hose connections for devices that contain non-potable water (e.g. washing machines) must be connected to a water intake using a backflow preventer to avoid any backflow of polluted water into the potable water line.

Recommendations for the use of ball valves

1. General information

Ball valves serve as shut-off valves for pressurized media. The manufacturer's information on flow media, operating pressure and temperature range must be respected. Using other than approved media may shorten the ball valve's lifespan or lead to a failure of the ball valve.

The installation may only be carried out in systems with equal pressures. Any possible pressure surges due to the quick-lock system must be taken into account as these may damage the piping system. The valve can be opened and closed by a 90° turn of the lever, intermediate positions of the lever are not allowed during the operating condition.

Ball valves should be stored in a dry place, free of dirt and without direct sunlight.

2. Installation and removal instructions

Ball valves may only be used in compliance with the requirements for their intended use. The installation must be carried out stress-free and with appropriate tools in a pressure less state only by qualified and trained staff. Do not turn the ball valve forcibly and do not use it to align the pipeline. The ball valve must be checked for damage before installation. Plumbing lines must be rinsed before first commissioning after maintenance and repairs.

Do not clamp the ball valve too tightly in a vise or something similar for pre-assembly in order to avoid damage and stress cracks on the body. According to the general installation instructions you must not seal the threads with too much hemp. The tips of the threads must remain visible. When installing the ball valve only use the designated spanner flat at the installation side to apply the counter-torque. Never apply the wrench to the body or to the side opposite of the installation side. Do not exceed the recommended tightening torque, any existing sensor plugs must be tightened to 15 Nm. The handle must not be used as a mounting lever.

The use of quarter-turn ball taps is only allowed with free outflow to avoid a backflow of sewage into the pipeline. Quarter-turn ball taps are not suitable for the use in domestic water-pipe systems or as device connection taps. It is necessary to carry out functional and leak tests after installing and before the ball valve is put into operation for the first time.

3. Commissioning

Operating conditions and installation works must be checked again before commissioning. Notice: Due to a long-term storage or long downtimes the release torque may be much higher than the usual turning moment.

Before initial start-up or putting into operation after maintenance work the pipeline has to be deaerated. In case of pressure surges air bubbles may cause explosions or damages to the piping system. Therefore the pressure should only be slowly increased.

Ball valves at the end of a pipeline must be sealed professionally with a blind flange to avoid the valve being forcibly torn off. Caution! Danger!

The ball valve may not be operated with a tool that shall serve to increase the leverage (e.g. hammer, pliers, extension tubes etc.)

4. Maintenance and inspection

Depending on the assembly situation, ball valves have to be drained before the first frost sets in as well as before cleaning works. When emptying the valve the handle should be in a 45-degree-position to make sure that the dead space may be emptied, too. Tests for tightness, functionality and damages should be carried out regularly. Depending on the operating situation this should be done in shorter time intervals. During long periods of disuse the ball valve should be put into operation every few months to guarantee proper functioning.

Defective or corroded valves or valves that do not work properly must be replaced during maintenance work. Replacement and removal may only be carried out by qualified personnel whilst the pipeline is not under pressure.

5. Warnings

The manufacturer will not accept any liability for deficiencies caused by assembly errors, improper handling, the use of impermissible media or not allowed operating situations as well as for damages due to normal wear and tear.

Ball valves may not be used as throttle valves! They may only be used in a fully opened or closed situation to avoid damages to seals in the spherical area. Depending on the operating situation the ball valve's body can get very warm. Caution!

Legal health and safety regulations, national rules and technical rules and standards for certain operating and mounting situations have to be observed. Viscous fluids or hardenable media as well as certain chemical substances may impede the function or make it impossible. Please refer to the manufacturer's information.

Polluted or sandy media may cause damages to the seals. In case of neglecting the given information on working pressure or working temperature leaks may occur or the ball valve may tear apart. Caution!

(as of August 2023)

Further Information:

Unless otherwise indicated or unless they are provided with drain plugs that are used to empty the valve before the frost season, no valves (taps, check valves, foot valves, gate valves, ball valves, etc.) are frost-resistant.

Our ball valves, valves and fittings have to be installed without mechanical tension. They must not be used for adjusting pipings.

Chrome plated surfaces, e.g., on bathroom fixtures or device connector valves, are sensitive to lime-dissolving agents, acidic cleaners, and all types of

abrasives. These surfaces must only be cleaned with clear water and a soft cloth (leather).

Our pumps, wall and standing fountains are provided with a protective coating for transport purposes by the manufacturer. This first layer of paint is not considered to be a permanent corrosion protection or optical coating.

We offer no guarantee for wearing parts in the event of corrosion or malfunction due to very hard water or contaminated water lines (e.g., with respect to sealing or mixing jets) or due to improper assembly; chemical or mechanical events during transportation, storage, connection, repair, or use; or improper handling of products.

We provide the statutory guarantee for defects in our products that arise due to material or manufacturing defects or through normal use. Defects due to non-observance of the information above are excluded from that guarantee.

Previous documents cease to be valid upon publication of the catalog. Our catalog serves exclusively as a basis for wholesale, industrial, and technical information and work. It is not a sales document.

Returns are only permitted based on prior written agreement; this particularly applies to custom production. Return deliveries that are not prepaid will not be accepted.

Recommendations for the handling of hoses

A number of factors can have an impact on how long the hose lasts:

- application
- medium
- abrasion
- storage etc.

Therefore it is not possible to give a general information about the durability of a hose. The end user should regularly check the hose for leaks and replace it if necessary.

The rubber compound can change its characteristics over time because of its chemical properties. This process can be accelerated by improper use of the hose or other influences. Therefore we give the following recommendations:

Storage

1. Avoid long storage periods! Otherwise, a check is important at the 1st use.
2. Ideally you should store the hose at a temperature between +10°C and +25°C. Temperatures of less than 0°C or more than +40°C will damage the hose. Keep the hose away from all sources of heat! Avoid dry air as well as high air humidity!
3. No direct solar radiation or aggressive artificial light!
4. Airflow and ozone can ruin the material. Do not store near electric motors, high-voltage units etc. because of the danger of sparks or electrostatic charge or uncontrolled heating of eventually mounted metal couplings.
5. Different substances can affect the material of the hose. Therefore please avoid any contacts with: solvents, fuels, acids, disinfectants, wood preservers, volatile or organic chemical substances or mixtures. Manganese, iron, copper and copper alloys may affect some kinds of rubber mixtures.
6. Store loosely rolled and stress-free to avoid compressing the tube. Coiled hose should be stored in a horizontal position. Do not pile up and pay attention to the weight to avoid any deformations! If given by the supplier, please note the minimum bend radii to prevent kinks.
7. Check the hose for suitability and proper seat of mounted couplings before delivery or resale.
8. Clean the hose before re-storage (please check suitability of the cleaning agent!). This applies particularly in case of the use of chemical, explosive or abrasive materials. Checks for reusability are essential.

Use

1. Hoses should only be used in accordance to their intended purpose. The misuse –e.g. as towing rope- is not allowed.
2. Before using the hose you have to check its suitability with regard to its characteristics, type or size.
3. Exercise due diligence when transporting the hose. The hose may not be exposed to severe shocks or tensile forces across rough surfaces. Avoid twisting, kinks and knots.
4. Please note the mentioned operating pressures! If checking the hose for leaks, the pressure in a hose free of air bubbles must only be increased gradually until the maximum pressure is reached.
5. The hose has been developed to channel liquids which are approved by the manufacturer. This does not give the permission to immerse the hose in the liquids.
6. Please note the ambient temperature and the maximum operating temperature which depend on the medium. Keep hose line away from sources of heat!
7. The material of the hose must be resistant to all media used. Check this before use. Changes in the concentration of media, period of use or temperature may cause changes in the suitability and chemical resistance of the hose.
8. Varying degrees of abrasion may occur depending on the kind of medium used or pulling the hose across different surfaces. Therefore you have to control the wear and tear of the tube regularly.
9. Make sure that installed hoses and hose connections are protected against impurities to avoid a contamination of hose and medium; particularly when used with drinking water.
10. Do not install hose lines on driveways or rather protect them against running over. If necessary, use hose bridges or the like.
11. Mounted hose fittings or spray nozzles should not be used as end or shut-off valves as they are not constructed for that purpose. Do not expose them to a permanent water pressure to prevent the valve/nozzles from being torn off and/or avoid bursting of the hose. After finishing work the water supply to the hose has to be shut off.

Assembly and commissioning of hose lines in technical fields

Please note:

1. When using hoses fitted with connectors, ensure that they are the correct length. An extension through the use of several connecting hoses is not permissible.
2. Before putting a hose line into operation please check if it is in accordance with eligible regulations and directives, e.g. the instructions of the Trade Association To2, §§14 and 15; the Industrial Safety Regulation (BetrSichV) or the Technical Rules for operating safety (TRBS).
3. Do not use a hose line if there are any visible damages!
4. Hose lines with given inspection intervals may not be used when the inspection date has expired. After repair or modification the hose line must be checked.
5. The hose line must be cleaned before putting it into operation. Do not forget to check the suitability of the cleaning agent!
6. With regard to electrostatic discharge the following instructions have to be observed: TRBS 2153 ("Avoiding of ignition hazards due to electrostatic charges")
7. The hose line must be cleaned when changing from one to another flow medium to avoid a possible chemical reaction or contamination of the new medium.
8. For special applications or construction projects, it is essential to comply with the manufacturer's instructions.

Disposal

Please follow local regulations if you want to dispose hose materials and/or hose fittings.

Legal information: According to the Drinking Water Ordinance [esp. §§ 3 and 17], every tapping point of water that is not intended for human use must be permanently marked with a notice "no drinking water" and safeguarded against inappropriate use!

Tapping systems for non-drinking water that are installed in the household in addition to the drinking water supply system must be reported to the health authority!

Specifications and illustrations as well as descriptions and packing units are non-binding. They are purely informational and no legal obligation may be derived from them.

We reserve the right to make technical and formal changes in the interest of further technical development or that are necessary for financial reasons. Alterations and additions are made continuously.

We assume no liability for any printing errors or divergent illustrations. In the event of erroneous size information, the figures at the start of printing will no longer apply.

Conversion table inch/millimetre

inch fractional value	mm metric	inch fractional value	mm metric
1/8"	3,175 mm	1 3/4"	44,450 mm
1/4"	6,350 mm	2"	50,800 mm
3/8"	9,525 mm	2 1/4"	57,150 mm
1/2"	12,700 mm	2 1/2"	63,500 mm
5/8"	15,875 mm	2 3/4"	69,850 mm
3/4"	19,050 mm	3"	76,200 mm
7/8"	22,225 mm	3 1/4"	82,550 mm
1"	25,400 mm	3 1/2"	88,900 mm
1 1/4"	31,750 mm	3 3/4"	95,250 mm
1 1/2"	38,100 mm	4"	101,600 mm

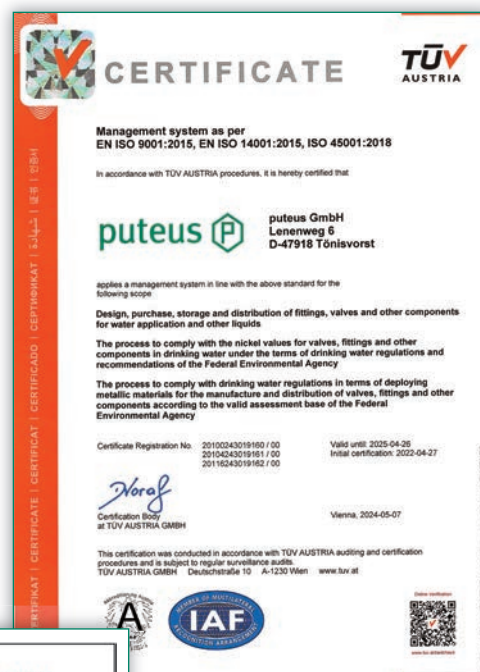
We keep an eye on our qualities:

Both our quality and environmental management system have been certified on the standard basis DIN EN 9001 (Nov. 2015) and DIN EN 14001 (Nov.2015). We face the challenge to guarantee highest qualities for our products and services. All raw materials and external products are checked for quality and suitability. Our own products are tested on a random basis during the production processes, final leaking and material tests are performed.

Our products meet several requirements, such as DVGW, SVGW, KTW, noise class tests (PA-Nr.), ACS and are also complying with binding DIN standards in respect to dimensions or noise behaviour.

With regard to the brass alloy **puteus** valves, fittings and the seals we use are in full compliance with the amended requirements of the drinking water ordinance. Long before the reference date in April 2017 we made sure that the regulations of the valuation basis of the Federal Environmental Agency (UBA) were implemented. These regulations apply to metallic materials which may get in contact with drinking water. They also include the list of materials that are in accordance with the drinking water hygiene (known as the “UBA Positive List”). On the basis of these standards our quality management has also been certified for the process to comply with the nickel values for valves, fittings and other components in drinking water under the terms of the drinking water regulations and recommendations of the Federal Environmental Agency.

Therefore we can ensure a high product quality for our customers because of our high quality awareness.



Disclaimer:

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Our packaging and labelling proposals

Four-colour cartons – version 1 –

with Euro-standard-holes, colour prints and product descriptions on the front-side, pictographs and installation dimensions on the back, top and bottom. Items that are available in carton packaging can be found in our catalogue. The item numbers are marked with an additional “-K”.



Four-colour cartons – version 2 –

Promotional four-colour cartons with product photos and descriptions.



Labels with EAN-barcodes

Nearly all articles can be labelled with EAN-codes. The self-adhesive and tear-resistant labels contain a product description, barcode and EAN-code.

The complete EAN-code consists of:

4012167 + item-no. + verification digit
(without “-E” or other extensions).



Self-service cards

These cards can be used for certain products of the irrigation sector. The cards are printed with article descriptions, sizes and EAN-codes.



Polybags

We offer customized polybags for single products. Each polybag can be printed according to your wishes.

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Other catalogs to our range:



1 Appliance connection fittings



2 Sanitary fittings, kitchen + bathroom



3 Garden hose fittings + valves



4 Fittings



5 Ball valves + heating valves



6 Hand pumps, hose + accessories

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