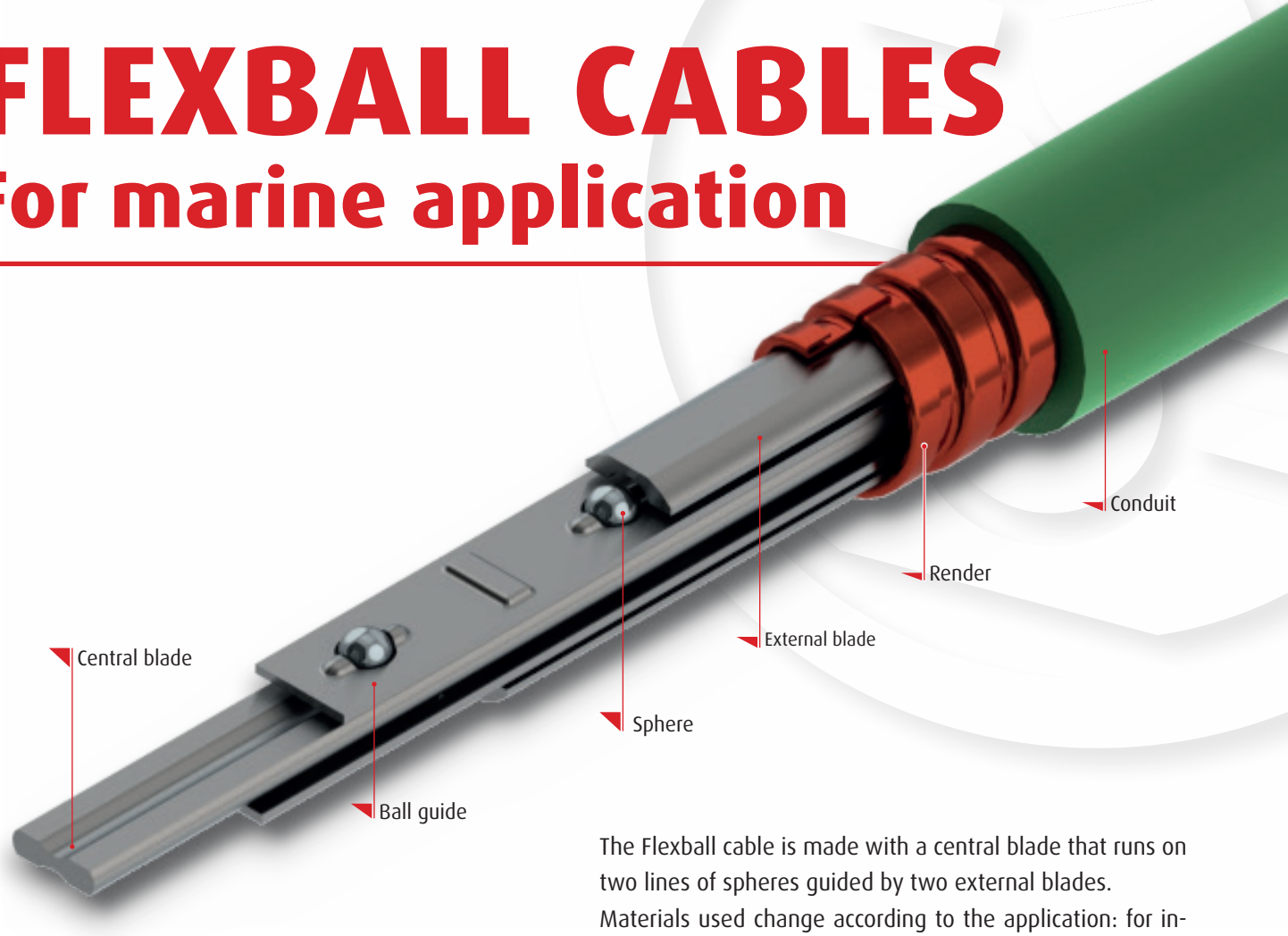
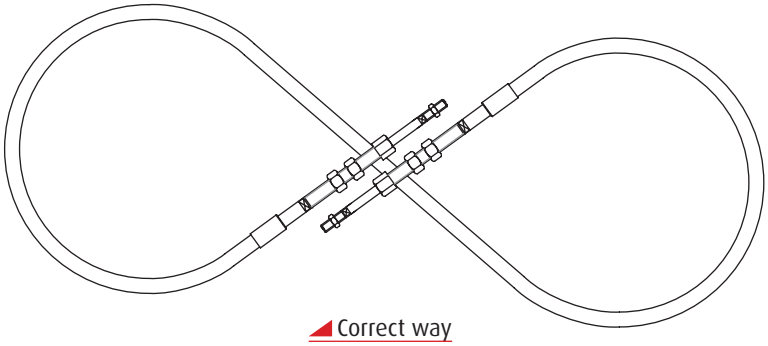
FLEXBALL CABLES
For marine application

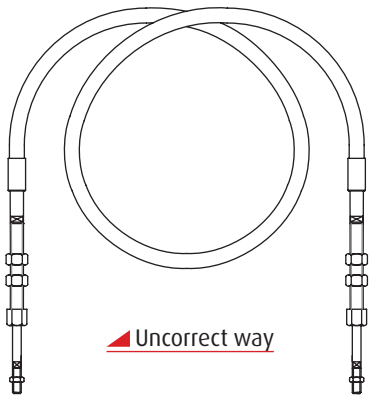


The **Flexball cable**, recognizable from the green colour of the plastic cover, is an extremely flexible and sliding cable. It has a very robust and reliable construction, with very high performances. If mounted properly, a Flexball cable can work "for ever".
Flexball cables are mainly used on boat in which long distances have to be covered, high loads have to be transmitted and the reliability is a "key word".

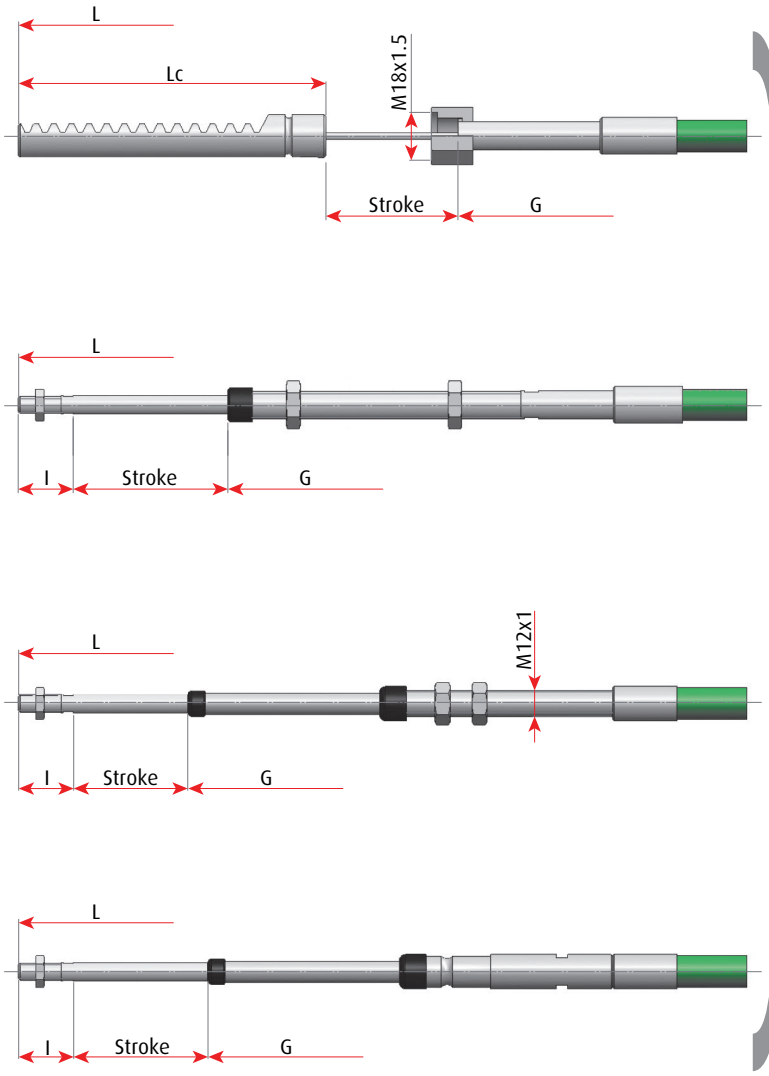
The Flexball cable is made with a central blade that runs on two lines of spheres guided by two external blades.
Materials used change according to the application: for industrial application terminals are in steel zinc while for marine applications terminals are either made with brass or stainless steel. Internal blades are stainless steel AISI304L for any kind of applications.
Flexball cables are used in any kind of special applications. If this is the case, please feel free to contact our technical department.
For a proper mounting, look at our "Mounting instructions".

The **Flexball cable** is delivered in a proper box and bent with an "8" shape to respect its minimum bending radius. Once received, it should be opened and stored in a straight line. If not possible, we suggest to leave it in the box like you have received it. Flexball cable must not be stored in a circular way, otherwise it can be seriously damaged.


Correct way

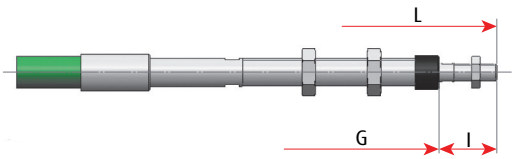

Uncorrect way

The **Flexball cables** are available with several types of end fittings to fit the different application requirements.



End fitting with rack
(shown completelly pulled out)
Available for type 70 and 95

Standard end fitting
(shown completelly pulled out)
Available for type 70, 95 and 125



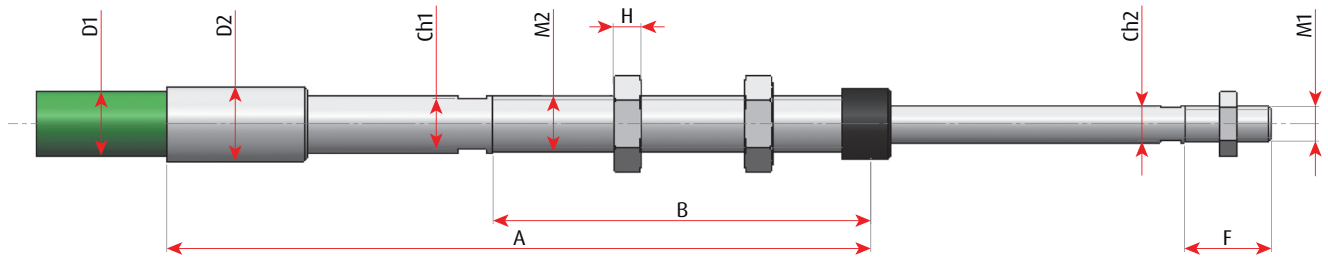
T shape end fitting
(special application)
Available for type 70

G shape end fitting
(marine application)
Available for type 70

PRODUCT RANGE AND APPLICATION

The Flexball cable is available in different sizes, from type 70 up to type 125.
Type 70 is commonly used for throttle and gearbox type 95 for gearbox in case of very long route and heavy duty application like winch and hydrostatic pump and type 125 is commonly used for steering system.

STANDARD FLEXBALL END FITTING DIMENSIONS



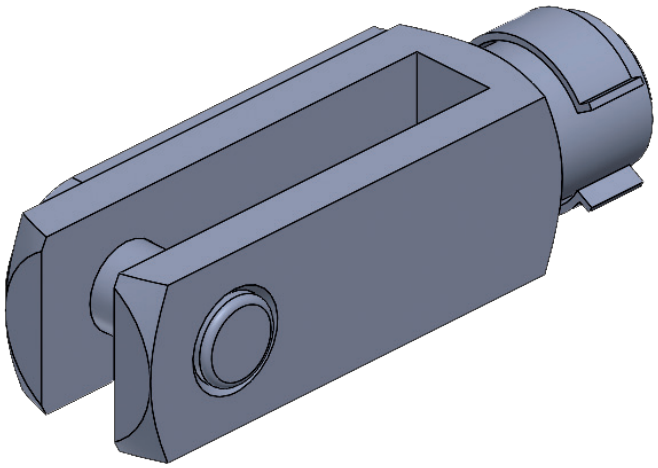
Cable type	Stroke	A	B	F	H	I	Ch1	Ch2	D1	D2	M1	M2	LC	Rack module (mm)	Push load (N)	Pull load (N)	Bending radius (mm)	Weight per meter (gr)	E_c
70	50	142	55	30	8	37	11	6	11.7	14	M7x1(M6x1)	M12x1	126	1.5	1550	2800	120	320	0.18
	70	157	70										154						
	100	187	100										178		1400				
	150	237	150										225		600				
	200	292	170										276		250				
95	50	163	70	30	8	37	14	9	14.7	18	M10x1.5	M16x1.5	126	1.5	2700	5000	140	518	0.15
	70	183	90										154						
	100	213	120										178		2500				
	150	263	170										225		1400				
	200	313	220										276		600				
125	50	195	70	35	9	45	17	11	18	21	M12x1.5	M18x1.5	-	1.5	5300	10000	200	827	0.05
	70	215	90										-						
	100	245	120										-		5000				
	150	295	170						20.8	24			295		2500				
	200	345	210										345		1200				

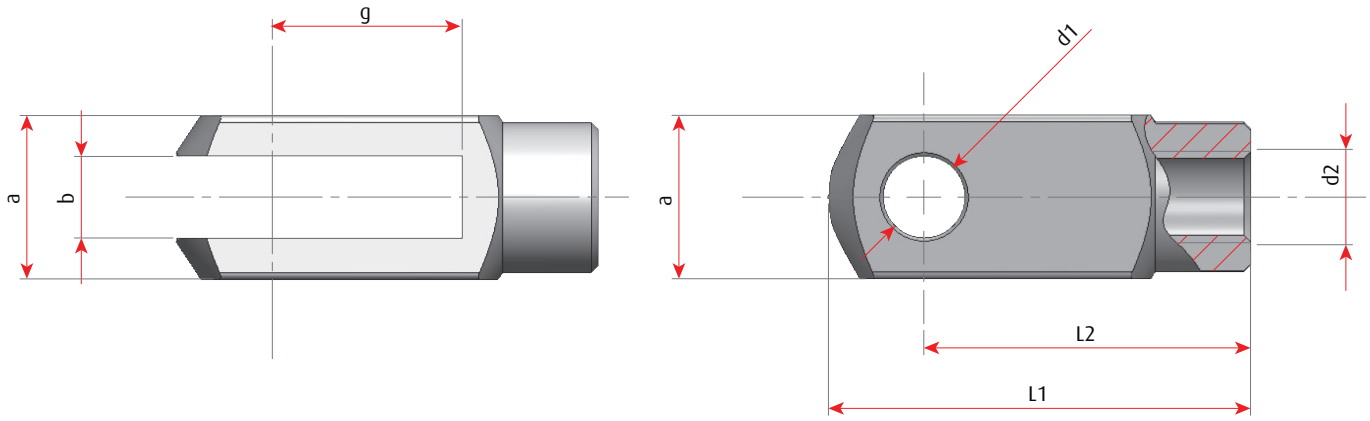
Notes:

Cable's elongation (mm): cable's length (m) x applied Load (N) x E_c x 0.01

ACCESSORIES

CLEVIS



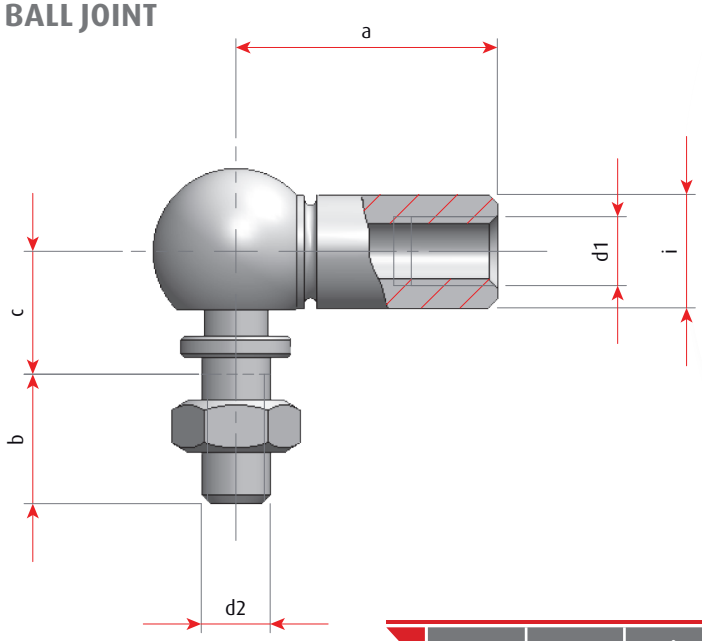


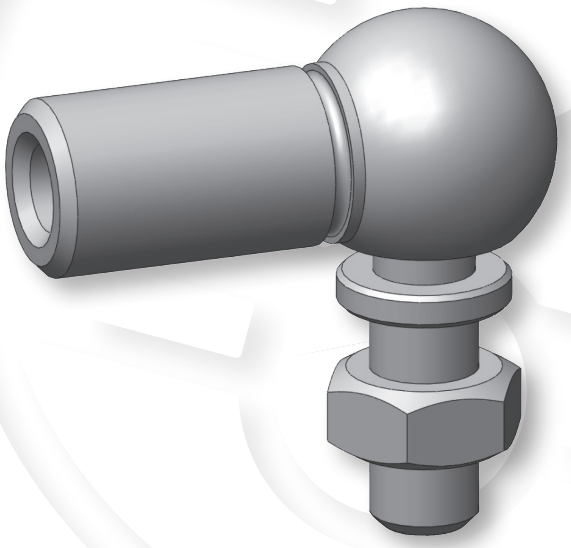
Type	B	d1	d2	g	a	L1	L2	Clevis code	Set Code (clevis + pin)
6x24	6	6	M6	32	16	58	48	D-0099.01.04.04	0-0099.01.00.11
6x24	6	6	M7	32	16	58	48	D-0099.01.04.05	0-0099.01.00.12
10x40	10	10	M10x1,5	40	20	72	60	D-0099.01.08.03	0-0099.01.00.27
12x48	12	12	M12x1,5	48	24	72	86	D-0099.01.09.02	0-0099.01.00.30

Note:

all the clevis listed here above are in brass.

BALL JOINT



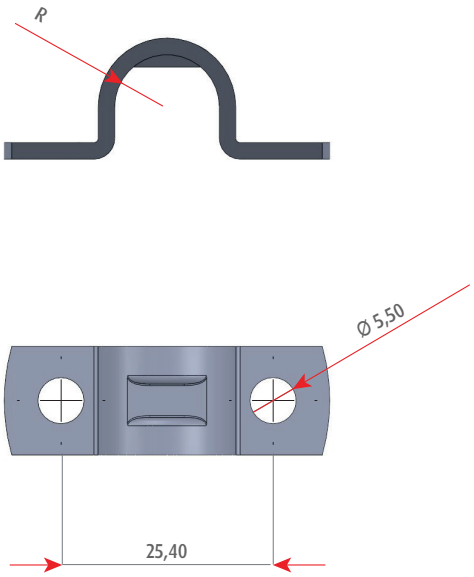


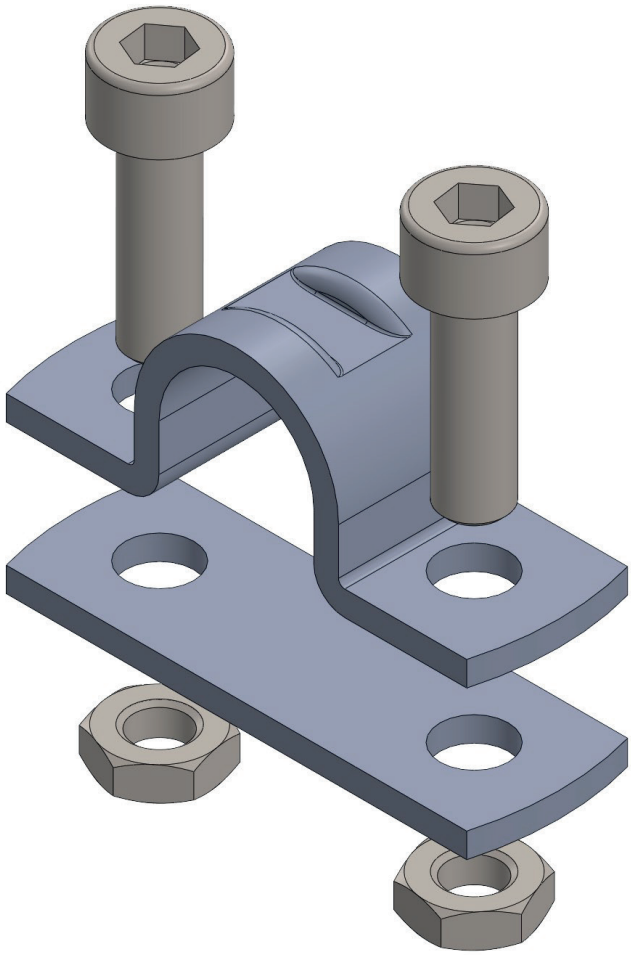
Type	a	i	d1	d2	c	b	Code
AS10	25	12	M6	M6	11	8	D-0099.04.03.00
AS13	30	14	M6	M8	13	12	D-0099.04.07.02
	30	14	M7	M7	13	12	D-0099.04.06.00
	30	14	M7	M8	13	12	D-0099.04.07.01
AS16	35	16	M10	M10	16	14	D-0099.04.09.00

Note:

all the ball joints listed here above are in steel zinc coated.

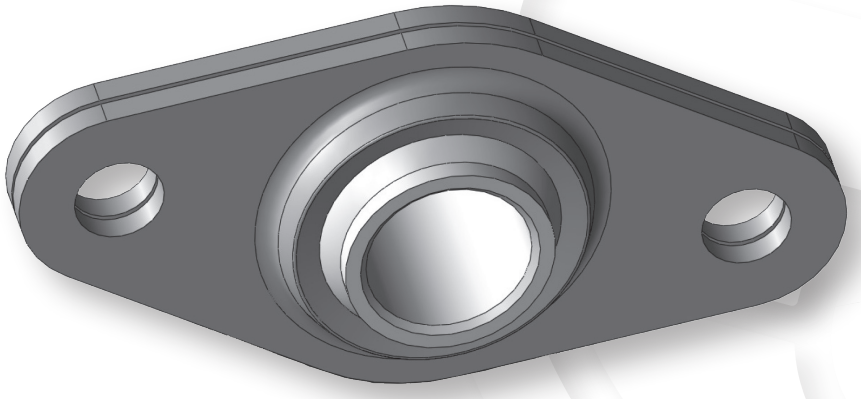
CLAMP

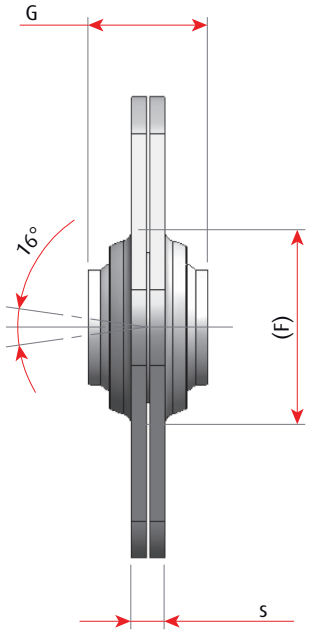


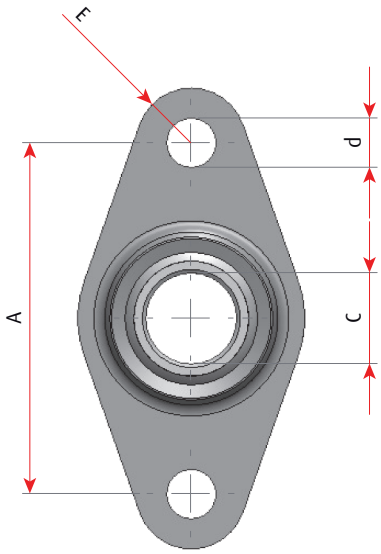


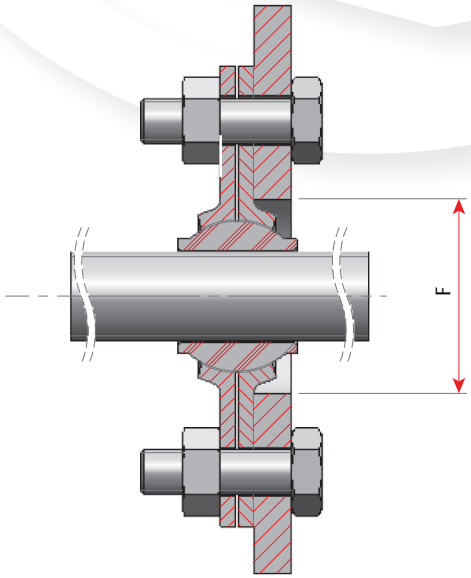
Type of cable	R	Set Code (clamp + bracket + 2 screws + 2 nuts)
70 (G shape)	12,5	0-0099.11.06.02

BULKHEAD SWIVEL









Note:

"F" is the dimension of the hole that has to be drilled on the bracket where the bulkhead swivel will be fixed. The above picture shows the correct mounting of the bulkhead against the bracket.

Type	A	b	C	F	G	s	Ch	Material	Code
70	40	6.2	12.2	25	16	4	17	Brass	0-0099.03.00.05
95	52	8.2	16.2	34	22	5	25	Brass	0-0099.03.00.08
125	56	8.2	18.2	36	25	5	27	Brass	0-0099.03.00.10

Flexball Italiana S.r.l.
Via San Luigi 13/A - 10043 Orbassano (TO) Italy
Tel +39 011 9038900
info@flexballitaliana.com - www.flexballitaliana.com

FLEXBALL ITALIANA
WR CONTROLS GROUP