Guide Bush for Ball Cage
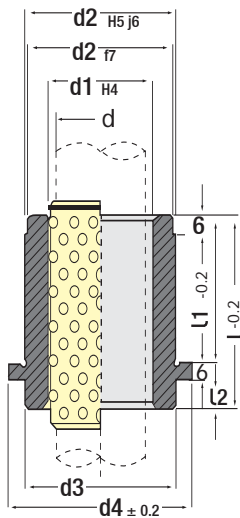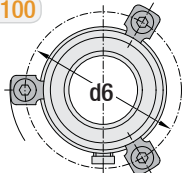## (Short type)

Code: G38

G38 guide bushes work without problem at dies, cuttings under 0.5 mm sheet metal thickness and where cutting space is low and when 200 stamp per minute are exceeded. It is not resistant to the lateral loads. They are preferred in cases that precison should be increased.
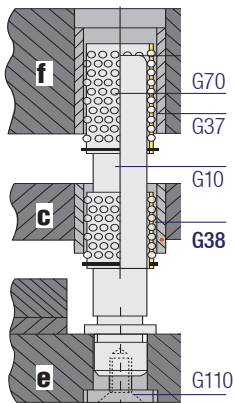

Ø d	l mm	Ø d1	Ø d2	Ø d3	Ø d4	Ø d6	l1 mm	l2 mm
15 16	35	21 22	30	30	34	46.2	23	12
19 20	35	25 26	32	32	40	52.4	23	12
24 25	35	30 31	40	40	48	60.8	23	12
32 30	42	40 38	48	48	55	67.8	30	12
38 40	52	46 48	58	58	65	78.0	37	15
48 50	65	56 58	70	70	80	93.2	47	18
60 63	80	68 71	85	85	95	108.4	60	20
80	80	92	105	105	118	131.5	60	20

Clamping Detail

Code: G100

4 pcs. clamp for d1= 38 mm and larger sizes.

f — G70
— G37
c — G10
— G38
e — G110

Note: Two different products in section (d) are to avoid reverse closing of dies during mounting by using three pcs. main dimensions and one pcs. auxiliary (d= Ø15 -19 - 24 - 32 - 38 - 48 - 60 mm) dimensions at same die, is avoided reverse closing of die plate. Thus, symmetrical die closure is ensured.

Example: In the same die (Ø20 x 3 - Ø19 x 1) = 4 pieces
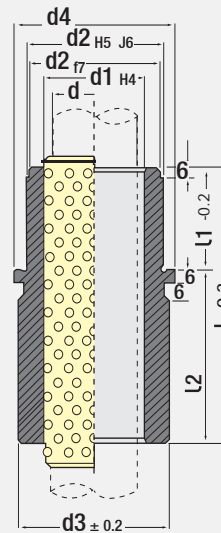
Note: Should be ordered with **G70**.

Order: **G38.** d x l x l1

Material: 1.7131 (16MnCr5)
Hardness: 58 - 62 HRC

Guide Bush for Ball Cage
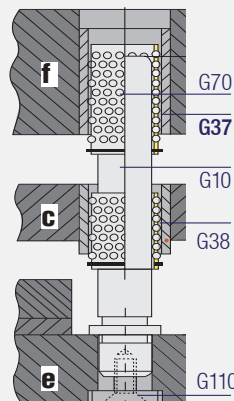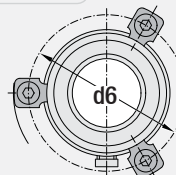## (Long type)

Code: G37

High precision guide bushes for ball cage: Despite providing high reliability at high speeds, contacting balls from one point, brings the system to precision status against impacts and side loads. This disadvantage is compensated to give product diameters up to a certain point in the upper tolerance, the working surface should be precise.

Ø d	l mm	Ø d1	Ø d2	Ø d3	Ø d4	Ø d6	l1 mm	l2 mm
15 16	43 59	21 22	30	32	34	46.2	23	20 36
19 20	43 59	25 26	32	39	40	52.4	23	20 36
24 25	59 79	30 31	40	46	48	60.8	23	36 56
32 30	75 93	40 38	48	53	55	67.8	30	45 63
38 40	82 108	46 48	58	63	65	78.0	37	45 71
48 50	97 127	56 58	70	77	80	93.2	47	50 80
60 63	116 150	68 71	85	92	95	108.4	60	56 90
80	120 150	92	105	115	118	131.5	60	60 90

Clamping Detail

Code: G100

f — G70
— G37
c — G10
— G38
e — G110

Note: Should be ordered with **G70**.

Order: **G37.** d x l x l1

Material: 1.7131 (16MnCr5)
Hardness: 58 - 62 HRC