## Overview of formats



## Single nut with flange FEM-E-B

Mounting dimensions similar to DIN 69051, Part 5 Flange type B

With seals With left-hand version in some cases Preload class: C0, C00, C1, C2, C3 Tolerance grade: T3<sup>2)</sup>, T5, T7, T9

**Note:** The front lube unit is only available for the right-hand version.

## A When setting up applications, do not allow components to collide with the front lube unit.

- $\mathbf{d}_0$  = nominal diameter
- P = lead (R = right-hand, L = left-hand)
- $\mathbf{D}_{W} =$ ball diameter

i = number of ball track turns



BASA	20 x 5R x 3	FEM-E-B - 4 00	1 2   T7   R	82Z120	41Z120   1250   0   1				
Category	Size	Part number	Load ratings	3)	Linear speed <sup>1)</sup>				
			dyn. C	stat. C <sub>0</sub>	V <sub>ma</sub>				
	d <sub>0</sub> x P x D <sub>w</sub> - i		(N)	(N)	(m/mir				
Α	16 x 5R x 3 - 4	R1502 010 63	14,800	16,100	30				
Α	16 x 10R x 3 - 3	R1502 040 83	11,500	12,300	60				
Α	16 x 16R x 3 - 3	R1502 060 63	11,200	12,000	96				
A	20 x 5R x 3 - 4	R1502 110 83	17,200	21,500	30				
A	20 x 10R x 3 - 4	R1502 140 63	16,900	21,300	) 60				
A	20 x 20R x 3.5 - 3	R1502 170 63	16,000	18,800	120				
A	25 x 5R x 3 - 4	R1502 210 83	19,100	27,200	30				
A	25 x 10R x 3 - 4	R1502 240 83	18,800	27,000	60				
<u>A</u>	25 x 25R x 3.5 - 3	R1502 280 63	17,600	23,300	150				
<u>A</u>	32 x 5R x 3.5 - 4	R1502 310 83	25,900	40,000	23				
<u>A</u>	32 x 10R x 3.969 - 5	R1502 340 84	38,000	58,300	47				
A	32 x 20R x 3.969 - 3	R1502 370 63	23,600	33,700	92				
A .	32 x 32R x 3.969 - 3	R1502 390 63	23,400	34,000	150				
A	40 x 5R x 3.5 - 5	R1502 410 84	34,900	64,100	19				
<u>A</u>	40 x 10R x 6 - 4	R1502 440 83	60,000	86,400	38				
B	40 x 10R x 6 - 6	R1502 440 84	86,500	132,200	38				
C	40 x 12R x 6 - 4	R1502 450 63	59,900	86,200	45				
С	40 x 16R x 6 - 4	R1502 460 63	59,600	85,900	60				
Α	40 x 20R x 6 - 3	R1502 470 83	45,500	62,800	75				
В	40 x 25R x 6 - 4	R1502 480 83	56,900	85,800	93				
В	40 x 30R x 6 - 4	R1502 4A0 83	56,300	85,100	112				
Α	40 x 40R x 6 - 3	R1502 490 63	44,400	62,300	150				
В	50 x 5R x 3.5 - 5	R1502 510 84	38,400	81,300	15				
В	50 x 10R x 6 - 6	R1502 540 84	95,600	166,500	30				
С	50 x 12R x 6 - 6	R1502 550 64	95,500	166,400	36				
С	50 x 16R x 6 - 6	R1502 560 64	95,300	166,000	48				
В	50 x 20R x 6.5 - 5	R1502 570 84	90,800	149,700	60				
В	50 x 25R x 6.5 - 4	R1502 580 84	71 800	149 700	75				
В	50 x 30R x 6.5 - 4	R1502 5A0 83	71,300	118,800	90				
В	50 x 40R x 6.5 - 3	R1502 590 63	55,800	85,900	1 1				
В	63 x 10R x 6 - 6	R1502 640 84	106,600	214,300	24				
В	63 x 20R x 6.5 - 5	R1502 670 84	100,700	190,300	48				
В	63 x 40R x 6.5 - 3	R1502 690 63	64,100	114,100	95				
<u>с</u>	80 x 10R x 6.5 - 6	R1502 740 84	130,100	291,700	19				
С	80 x 20R x 12.7 - 6	R1502 770 94	315,200	534,200	3				
С	80 x 40R x 12.7 - 4	R1502 790 94	216,600	367,600	60				
Versions wi	th left-hand lead	1	1						
В	16 x 5L x 3 - 4	R1552 010 63	14,800	16,100	;				
В	20 x 5L x 3 - 4	R1552 110 83	17,200	21,500	3				
В	25 x 5L x 3 - 4	R1552 210 83	19,100	27,200	30				
В	32 x 5L x 3.5 - 4	R1552 310 63	25,900	40,000	23				
В	40 x 5L x 3.5 - 5	R1552 410 64	34,900	64,100	19				
В	40 x 10L x 6 - 4	R1552 440 63	60,000	86,400	38				

- 1) See "Characteristic speed  $d_0 \cdot n$  " on page 133 and "Critical speed  $n_{cr}$  " on page 174
- 2) Tolerance grade T3 for sizes shown in table page 12
- The load ratings are valid for tolerance grade T3 and T5 only.
- For other tolerance grades, please take into account the correction factor  ${\rm f}_{\rm ac}$  on page 133.
- 4) Lube port machining: flat surface  $L_3 \le 15$  mm, countersink  $L_3 > 15$  mm;
- 5) With left-hand lead the lube port position mirrors its position with right-hand lead!
- The axial lube port S<sub>x</sub> is always located on the pitch circle D<sub>6</sub> of the nut unit.





Size	(mm)										Mass				
	dı	d2	Di	Ds	Hole pattern	De	D7	L	Ls	4	Lio	L14	S4)	S.	m
doxPxDw-i			g6										1		(kg)
16 x 5R x 3 - 4	15	12.9	28	48	BB2	38	5.5	38	12	10	26	40.0	M6	4	0.19
16 x 10R x 3 - 3	15	12.9	28	48	BB2	38	5.5	45	12	16	33	40.0	M6	4	0.21
16 x 16R x 3 - 3	15	12.9	28	48	BB2	38	5.5	61	12	20	49	40.0	M6	4	0.26
20 x 5R x 3 - 4	19	16.9	36	58	BB2	47	6.6	40	12	10	28	44.0	M6	4	0.31
20 x 10R x 3 - 4	19	16.9	36	58	BB2	47	6.6	60	12	16	48	44.0	M6	4	0.40
20 x 20R x 3.5 - 3	19	16.7	36	58	BB2	47	6.6	77	12	25	65	44.0	M6	4	0.49
25 x 5R x 3 - 4	24	21.9	40	62	BB2	51	6.6	45	12	10	33	48.0	M6	4	0.36
25 x 10R x 3 - 4	24	21.9	40	62	BB2	51	6.6	64	12	16	52	48.0	M6	4	0.47
25 x 25R x 3.5 - 3	24	21.4	40	62	BB2	51	6.6	95	12	30	83	48.0	M6	4	0.63
32 x 5R x 3.5 - 4	31	28.4	50	80	BB2	65	9.0	48	13	10	35	62.0	M6	4	0.62
32 x 10R x 3.969 - 5	31	27.9	50	80	BB2	65	9.0	77	13	16	64	62.0	M6	4	0.84
32 x 20R x 3.969 - 3	31	27.9	50	80	BB2	65	9.0	84	13	25	71	62.0	M6	4	0.90
32 x 32R x 3.969 - 3	31	27.9	50	80	BB2	65	9.0	120	13	40	107	62.0	M6	4	1.21
40 x 5R x 3.5 - 5	39	36.4	63	93	BB1	78	9.0	54	15	10	39	70.0	M8x1	5	1.03
40 x 10R x 6 - 4	38	33.8	63	93	BB1	78	9.0	70	15	16	55	70.0	MBx1	5	1.19
40 x 10R x 6 - 6	38	33.8	63	93	BB1	78	9.0	90	15	16	75	70.0	M8x1	5	1.49
40 x 12R x 6 - 4	38	33.8	63	93	BB1	78	9.0	75	15	25	60	70.0	M8x1	5	1.27
40 x 16R x 6 - 4	38	33.8	63	93	BB1	78	9.0	90	15	25	75	70.0	MBx1	5	1.51
40 x 20R x 6 - 3	38	33.8	63	93	BB1	78	9.0	88	15	25	73	70.0	MBx1	5	1.44
40 x 25R x 6 - 4	38	33.8	63	93	BB1	78	9.0	127	15	30	112	70.0	M8x1	5	1.91
40 x 30R x 6 - 4	38	33.8	63	93	BB1	78	9.0	145	15	35	130	70.0	M8x1	5	2.21
40 x 40R x 6 - 4	38	33.8	63	93	BB1	78	9.0	142	15	45	127	70.0	M8x1	5	2.16
50 x 5R x 3.5 - 5	49	46.4	75	110	BB1	93	11.0	54	15	10	39	85.0	M8x1	5	1.39
50 x 10R x 6 - 6	48	43.8	75	110	BB1	93	11.0	90	18	16	72	85.0	M8x1	5	2.14
50 x 12R x 6 - 6	48	43.8	75	110	BB1	93	11.0	105	18	25	87	85.0	MBx1	5	2.38
50 x 16R x 6 - 6	48	43.8	75	110	BB1	93	11.0	128	18	25	110	85.0	MBx1	5	2.75
50 x 20R x 6.5 - 5	48	43.4	75	110	BB1	93	11.0	132	18	25	114	85.0	MBx1	5	2.73
50 x 25R x 6.5 - 4	48	43.4	75	110	BB1	93	11.0	132	18	25	114	85.0	M8x1	-	2.78
50 x 30R x 6.5 - 4	48	43.4	75	110	BB1	93	11.0	151	18	35	133	85.0	MBx1	5	3.12
50 x 40R x 6.5 - 3	48	43.4	75	110	BB1	93	11.0	149	18	45	131	85.0	M8x1	5	3.04
63 x 10R x 6 - 6	61	56.8	90	125	BB1	108	11.0	90	22	16	68	95.0	M8x1	5	2.56
63 x 20R x 6.5 - 5	61	56.4	95	135	BB1	115	13.5	132	22	25	110	100.0	M8x1	5	4.51
63 x 40R x 6.5 - 3	61	56.4	95	135	BB1	115	13.5	149	22	45	127	100.0	M8x1	5	5.04
80 x 10R x 6.5 - 6	78	73.3	105	145	BB1	125	13.5	95	22	16	73	110.0	M8x1	5	3.40
80 x 20R x 12.7 - 6	76	67.0	125	165	BB1	145	13.5	170	25	25	145	130.0	M8x1	5	10.20
80 x 40R x 12.7 - 4	76	67.0	125	165	BB1	145	13.5	206	25	25	181	130.0	M8x1	5	11.60
Versions with left-hand	dlead														
16 x 5L x 3 - 4	15	12.9	28	48	BB2	38	5.5	38	12	10	26	40.0	M6	4	0.19
20 x 5L x 3 - 4	19	16.9	36	58	BB2	47	6.6	40	12	10	28	44.0	M6	4	0.31
25 x 5L x 3 - 4	24	21.9	40	62	BB2	51	6.6	45	12	10	33	48.0	M6	4	0.36
32 x 5L x 3.5 - 4	31	28.4	50	80	BB2	65	9.0	48	13	10	35	62.0	M6	4	0.62
40 x 5L x 3.5 - 5	39	36.4	63	93	BB1	78	9.0	54	15	10	39	70.0	M8x1	5	1.03
40 x 10L x 6 - 4	38	33.8	63	93	BB1	78	9.0	70	15	16	55	70.0	MBx1	5	1.19

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