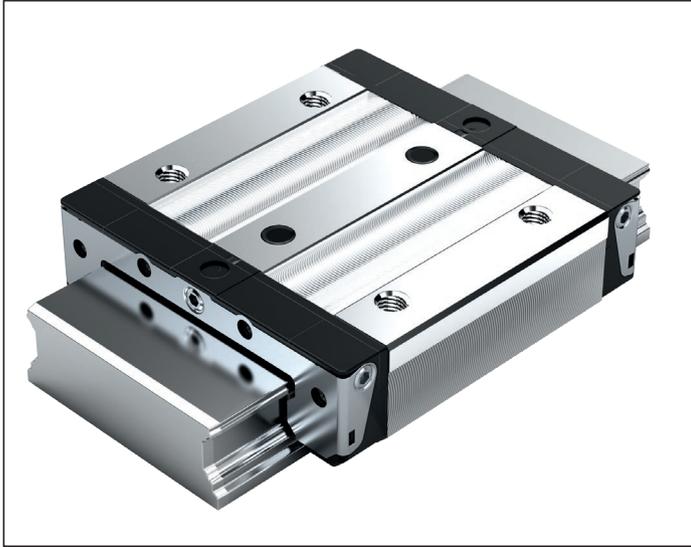# CNS – compact, normal, standard height

Ball runner block made of steel
R1672 ... 2.

Dynamic characteristics

Travel speed: v_{max} = 5 m/s

Acceleration: a_{max} = 500 m/s^2

(If $F_{comb} > 2.8 \cdot F_{pr}$: a_{max} = 50 m/s^2)

Note on lubrication:

▶ Pre-lubricated

Further ball runner blocks CNS

▶ Corrosion-resistant
   ball runner blocks see below

Order example

Options:

▶ Ball runner blocks CNS
▶ Sizes 25/70
▶ Preload class C1
▶ Accuracy class H
▶ With standard seal,
   without ball chain

Material number:
R1672 213 20

Options and material numbers

Size	Ball runner blocks with size	Preload class		Accuracy class			Seals on ball runner blocks			
							without ball chain		with ball chain	
		C0	C1	N	H	P	SS	DS	SS	DS
20/40[1]	R1672 5	9		4	3	–	20	–	22	–
			1	4	3	–	20	2Z	22	2Y
25/70	R1672 2	9		4	3	–	20	–	22	–
			1	4	3	–	20	2Z	22	2Y
E.g.:	R1672 2		1		3		20			

Ball runner block
Resist CR[2]
R1672 ... 7.

Order example

Options:

▶ Ball runner blocks CNS
▶ Sizes 25/70
▶ Preload class C0
▶ Accuracy class H
▶ With standard seal,
   without ball chain

Material number:
R1672 293 70

Options and material numbers

Size	Ball runner blocks with size	Preload class	Accuracy class	Seals on ball runner blocks			
				without ball chain		with ball chain	
		C0	H	SS	DS	SS	DS
20/40[1]	R1672 5	9	3	70	7Z	72	7Y
25/70	R1672 2	9	3	70	7Z	72	7Y
E.g.:	R1672 2	9	3	70			

1) Caution: Ball runner blocks, not combinable with ball guide rail R167.8.. ..!
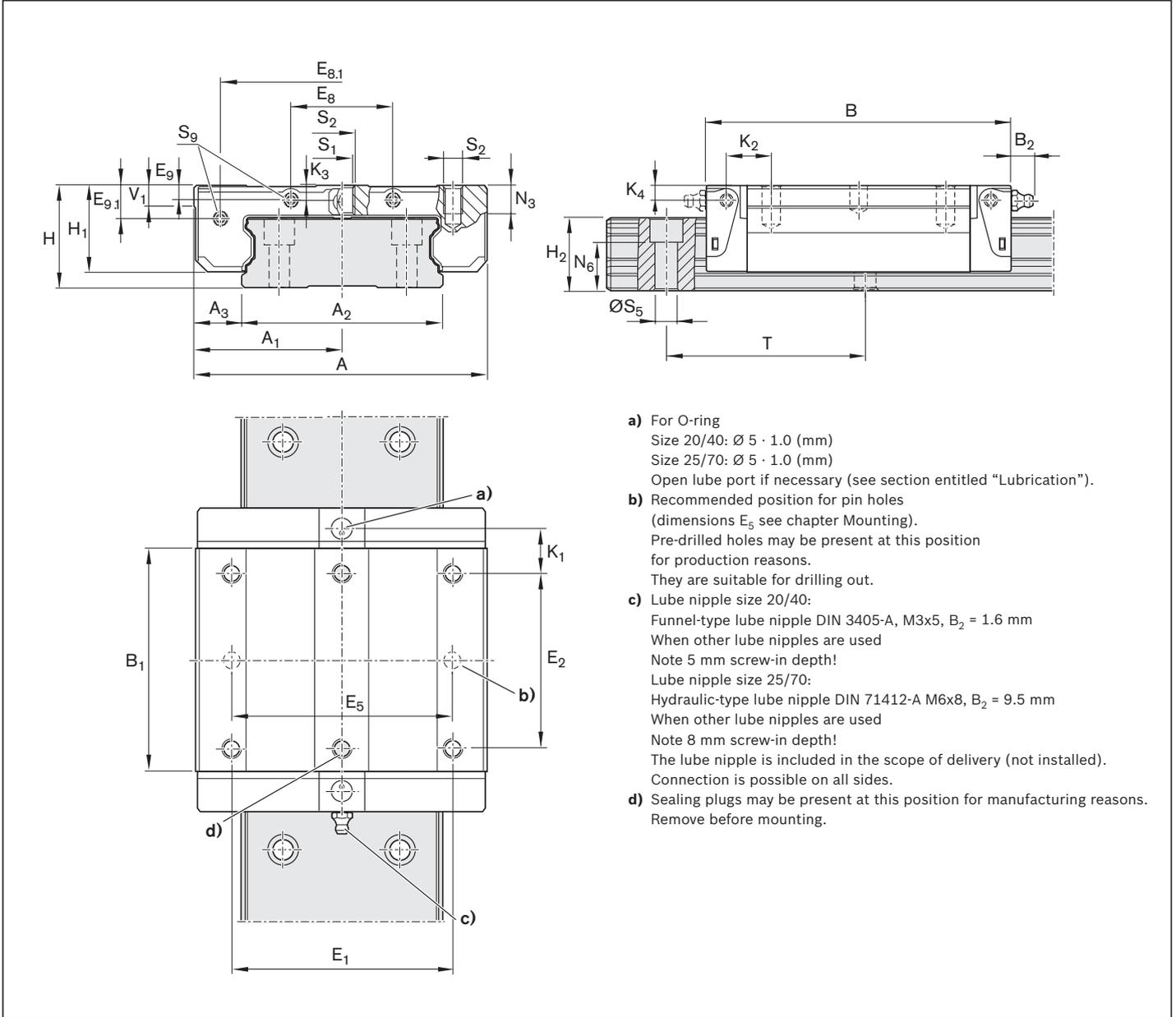
Preload classes
C0 = Without preload (clearance)
C1 = Moderate preload

Seals
SS = Standard seal
DS = Double-lip seal

Key
gray numbers
= No preferred variant /
   combination
(partially longer delivery times)

a) For O-ring
Size 20/40: Ø 5 · 1.0 (mm)
Size 25/70: Ø 5 · 1.0 (mm)
Open lube port if necessary (see section entitled "Lubrication").

b) Recommended position for pin holes
(dimensions E_5 see chapter Mounting).
Pre-drilled holes may be present at this position
for production reasons.
They are suitable for drilling out.

c) Lube nipple size 20/40:
Funnel-type lube nipple DIN 3405-A, M3x5, B_2 = 1.6 mm
When other lube nipples are used
Note 5 mm screw-in depth!
Lube nipple size 25/70:
Hydraulic-type lube nipple DIN 71412-A M6x8, B_2 = 9.5 mm
When other lube nipples are used
Note 8 mm screw-in depth!
The lube nipple is included in the scope of delivery (not installed).
Connection is possible on all sides.

d) Sealing plugs may be present at this position for manufacturing reasons.
Remove before mounting.

Size	Dimensions (mm)																		
	A	A_1	A_2	A_3	B	B_1	E_1	E_2	E_8	$E_{8.1}$	E_9	$E_{9.1}$	H	H_1	H_2	K_1	K_2	K_3	K_4
20/40	62	31	42	10.0	73.0	51.3	46	32	18	53.4	3.4	8.1	27	22.50	18.30	14.6	15.00	3.5	3.5
25/70	100	50	69	15.5	104.7	76.5	76	50	35	83.5	4.9	11.3	35	29.75	23.55	19.4	20.45	5.2	5.2

Size	Dimensions (mm)								Mass (kg)	Load capacities[1] (N)		Load moments[1] (Nm)			
	N_3	N_6 ±0.5	S_1	S_2	S_5	S_9	T	V_1		C	C_0	M_t	M_{t0}	M_L	M_{L0}
20/40	6	12.5	5.3	M6	4.4	M2.5x1.5^{+3}	60	6.0	0.3	14900	20600	340	470	140	190
25/70	8	14.4	6.7	M8	7.0	M3x2$^{+4.5}$	80	7.5	1.0	36200	50200	1 350	1870	490	680

[1] Load ratings and load moments for ball runner block **without** ball chain. Load ratings and load moments for ball runner block **with** ball chain ☞🖹 14
Determination of the dynamic load capacities and load moments is based on a stroke travel of 100,000 m according to DIN ISO 14728-1.
Often only 50,000 m are actually stipulated. For comparison: Multiply the values **C**, M_t and M_L by 1.26 according to the table.