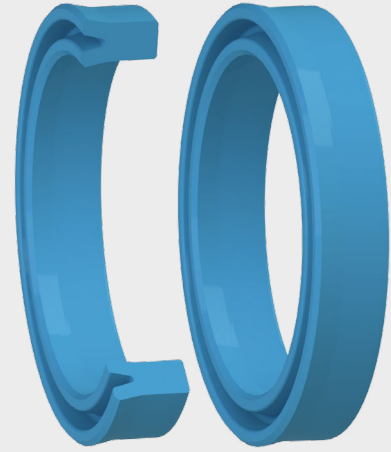


PISTON/ROD SEALS BECA 335



DESCRIPTION

The BECA 335 profile is a U-ring type single acting symmetrical seal with matching polyurethane lips. It can be used for both rod and piston applications.

ADVANTAGES

Optimised sealing effect
Excellent abrasion resistance
Very good wear resistance

APPLICATIONS

Agriculture
Mobile machinery
Lifting systems
Injection presses
Hydraulic cylinders

MATERIALS

PU 93 Shore A - Blue
PU 96 Shore A - Blue
High temp. PU 96 Shore A - Beige

Other grades of materials are available.
Please contact our experts.

TECHNICAL DATA

Temperature	-30°C / +110°C
Pressure	30 MPa
Speed	0.5 m/sec
Media	Mineral hydraulic oils

The figures above indicate the maximum values and may not be cumulated. They may be developed, depending on the materials used.

EXTRUSION GAPS

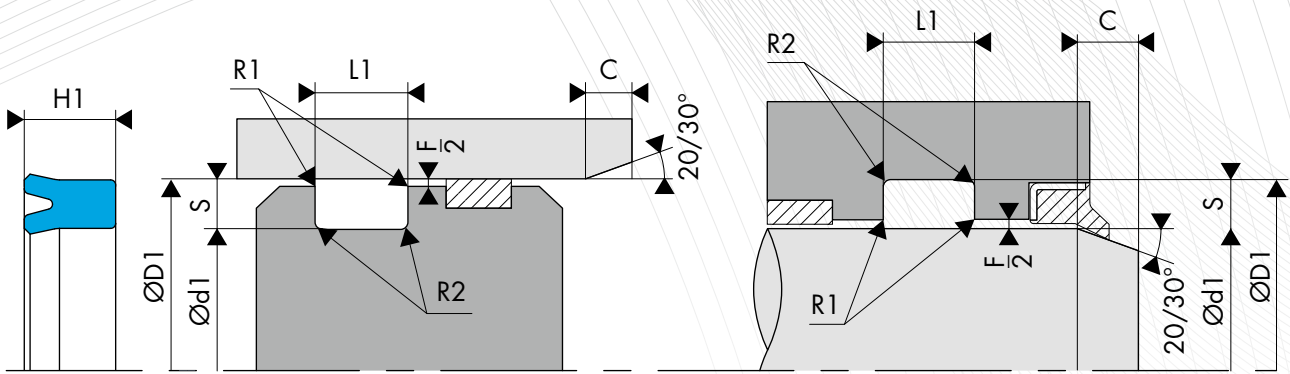
Bore diameter ØD1 Rod diameter Ød1	Radial gap F/2			
	≤ 5 MPa	≤ 10 MPa	≤ 20 MPa	≤ 30 MPa
≤ 60 mm	0.40	0.30	0.20	0.15
> 60 mm	0.50	0.40	0.30	0.20

SURFACE ROUGHNESS

Roughness	Dynamic surface area	Static surface area	Groove flanks
Ra	0.1 - 0.4 µm	≤1.6 µm	≤3.2 µm
Rz	0.63 - 2.5 µm	≤6.3 µm	≤10.0 µm
Rmax	1.0 - 4.0 µm	≤10.0 µm	≤16.0 µm

CHAMFERS AND RADIUS

Radial section S	Radius R1	Radius R2	Chamfer C
3.00	0.20	0.40	2.00
4.00	0.20	0.40	2.50
5.00	0.40	0.60	3.00
7.50	0.80	1.00	4.00
10.00	0.80	1.00	5.00



DIMENSIONS

Part number	Rod diameter Ød1 f8 Groove diameter Ød1 f8	Groove diameter ØD1 H9 Bore diameter ØD1 H10	Seal height H1	Groove width L1 0/+0.5
335.0040094	4.00	9.00	4.00	4.50
335.0040104	4.00	10.00	4.00	4.50
335.0700148	7.00	14.00	8.00	9.00
335.0140086	8.00	14.00	6.00	6.50
335.0100166	10.00	16.00	6.50	7.50
335.0180105	10.00	18.00	5.50	6.00
335.0180106	10.00	18.00	6.00	6.50
335.0190104	10.00	19.00	4.00	5.00
335.0100226	10.00	22.00	6.00	7.00
335.0250107	10.00	25.00	7.00	8.00
335.0120184	12.00	18.00	4.50	5.50
335.0120185	12.00	18.00	5.00	6.00
335.0120186	12.00	18.00	6.00	6.50
335.0190124	12.00	19.00	4.50	5.00
335.0220128	12.00	22.00	8.00	9.00
335.0120248	12.00	24.00	7.00	8.00
335.0200134	13.00	20.00	4.50	5.00
335.0200135	13.00	20.00	5.50	6.50
335.0130206	13.00	20.00	6.00	7.00
335.0250131	13.00	25.00	10.00	11.00
335.0200144	14.00	20.00	4.50	5.50
335.0140205	14.00	20.00	5.00	6.00
335.0220144	14.00	22.00	4.00	5.00
335.0220146	14.00	22.00	6.00	7.00
335.0220149	14.00	22.00	9.00	10.00
335.0250146	14.00	25.00	6.00	7.00
335.0220154	15.00	22.00	3.50	4.00
335.0250155	15.00	25.00	5.80	7.00
335.0250158	15.00	25.00	8.00	9.00
335.0250150	15.00	25.00	10.00	11.00
335.0160224	16.00	22.00	4.00	4.50
335.0240166	16.00	24.00	5.50	6.00
335.0160249	16.00	24.00	9.00	10.00
335.0260168	16.00	26.00	8.00	9.00
335.0320168	16.00	32.00	8.00	9.00
335.0250184	18.00	25.00	4.00	5.00
335.0180288	18.00	28.00	8.00	9.00
335.0300188	18.00	30.00	8.00	9.00
335.0250195	19.00	25.00	5.00	6.00
335.0250196	19.00	25.00	6.00	7.00
335.1925838	19.00	25.80	3.30	3.80

Part number	Rod diameter Ød1 f8 Groove diameter Ød1 f8	Groove diameter ØD1 H9 Bore diameter ØD1 H10	Seal height H1	Groove width L1 0/+0.5
335.0200285	20.00	28.00	4.00	5.00
335.0300207	20.00	30.00	7.50	8.50
335.0300208	20.00	30.00	8.00	9.00
335.0300200	20.00	30.00	10.00	11.00
335.0350201	20.00	35.00	10.00	11.00
335.0220305	22.00	30.00	5.00	6.00
335.0220306	22.00	30.00	6.00	7.00
335.0320228	22.00	32.00	8.00	9.00
335.0340228	22.00	34.00	8.00	9.00
335.0240326	24.00	32.00	5.70	6.30
335.0320247	24.00	32.00	7.00	8.00
335.0240408	24.00	40.00	8.00	9.00
335.0400241	24.00	40.00	10.00	11.00
335.0250306	25.00	30.00	6.00	7.00
335.0330251	25.00	33.00	10.00	11.00
335.0350255	25.00	35.00	5.00	6.00
335.0350256	25.00	35.00	6.00	7.00
335.0350258	25.00	35.00	8.00	9.00
335.1035025	25.00	35.00	10.00	11.00
335.0380251	25.00	38.00	10.00	11.00
335.0400255	25.00	40.00	5.00	6.00
335.0400257	25.00	40.00	6.00	7.00
335.0400250	25.00	40.00	10.00	11.00
335.0250441	25.00	44.00	10.00	11.00
335.0380257	25.40	38.10	7.93	9.00
335.0280357	28.00	35.00	6.50	7.30
335.0350288	28.00	35.00	8.00	9.00
335.0280385	28.00	38.00	5.50	7.00
335.0380287	28.00	38.00	7.00	7.50
335.0280408	28.00	40.00	8.90	9.90
335.0280401	28.00	40.00	10.00	11.00
335.2850451	28.50	45.00	10.50	11.50
335.0300365	30.00	36.00	5.00	6.00
335.0300366	30.00	36.00	6.00	6.50
335.3039565	30.00	39.50	6.50	7.50
335.0400305	30.00	40.00	5.00	6.00
335.0400306	30.00	40.00	6.50	7.50
335.0400307	30.00	40.00	7.00	8.00
335.0400308	30.00	40.00	7.50	8.00
335.0400300	30.00	40.00	10.00	11.00
335.0420306	30.00	42.00	6.00	7.00

Part number	Rod diameter Ød1 f8	Groove diameter ØD1 H9	Seal height H1	Groove width L1 0/+0.5
	Groove diameter Ød1 f8	Bore diameter ØD1 H10		
335.0300420	30.00	42.00	10.00	11.00
335.0300451	30.00	45.00	10.00	11.00
335.3153843	31.50	38.40	3.30	3.80
335.5083179	31.75	50.80	9.52	10.52
335.3831845	31.80	38.00	4.50	
335.0400326	32.00	40.00	5.50	6.00
335.0400327	32.00	40.00	6.00	7.00
335.0320426	32.00	42.00	6.00	7.00
335.1042032	32.00	42.00	10.00	11.00
335.0320437	32.00	43.00	6.50	7.50
335.0440321	32.00	44.00	9.00	10.00
335.0320451	32.00	45.00	10.00	11.00
335.0450321	32.00	45.00	11.00	12.00
335.0500321	32.00	50.00	10.00	11.00
335.0440342	34.00	44.00	12.00	13.00
335.0340466	34.00	46.00	6.00	7.00
335.0340468	34.00	46.00	8.00	9.00
335.3494769	34.92	47.63	9.52	10.52
335.0400355	35.00	40.00	5.00	5.50
335.0350436	35.00	43.00	6.00	7.00
335.0430358	35.00	43.00	8.00	9.00
335.0450356	35.00	45.00	6.00	7.00
335.0350457	35.00	45.00	6.50	7.20
335.0450358	35.00	45.00	8.00	9.00
335.0450350	35.00	45.00	10.00	11.00
335.3504528	35.00	45.20	7.00	8.00
335.0500350	35.00	50.00	10.00	11.00
335.0550351	35.00	55.00	10.00	11.00
335.0360456	36.00	45.00	6.00	7.00
335.5718365	36.55	57.18	8.00	8.80
335.0500386	38.00	50.00	6.00	7.00
335.0550380	38.00	55.00	10.00	11.00
335.0380509	38.10	50.80	9.52	10.52
335.0450394	39.00	45.00	4.50	5.00
335.0500405	40.00	50.00	5.00	6.00
335.0500406	40.00	50.00	6.00	7.00
335.0500407	40.00	50.00	6.50	7.50
335.0500408	40.00	50.00	7.00	8.00
335.7050040	40.00	50.00	7.50	8.50
335.0500409	40.00	50.00	9.00	10.00
335.0500400	40.00	50.00	10.00	11.00
335.0550409	40.00	55.00	9.00	10.00
335.0550401	40.00	55.00	10.00	11.00
335.0400602	40.00	60.00	12.50	13.50
335.0400605	40.00	60.00	15.00	16.00
335.0600408	40.00	60.00	18.00	19.00
335.0420500	42.00	50.00	10.00	11.00
335.0520429	42.00	52.00	9.00	10.00
335.0440658	44.00	65.00	8.00	9.00
335.0440579	44.45	57.15	9.52	10.52
335.0550456	45.00	55.00	6.00	7.00
335.0550450	45.00	55.00	10.00	11.00
335.0600459	45.00	60.00	9.00	10.00
335.0600450	45.00	60.00	10.00	11.00
335.0580480	48.00	58.00	10.00	11.00
335.0480628	48.00	62.00	8.00	9.00
335.0486348	48.00	63.40	8.00	9.00
335.0480683	48.00	68.00	12.00	13.00

Part number	Rod diameter Ød1 f8	Groove diameter ØD1 H9	Seal height H1	Groove width L1 0/+0.5
	Groove diameter Ød1 f8	Bore diameter ØD1 H10		
335.0600506	50.00	60.00	6.00	7.00
335.0600500	50.00	60.00	10.00	11.00
335.0500626	50.00	62.00	6.00	7.00
335.0650509	50.00	65.00	9.00	10.00
335.0650501	50.00	65.00	10.00	11.00
335.0700501	50.00	70.00	10.00	11.00
335.0700502	50.00	70.00	12.00	13.00
335.0700504	50.00	70.00	13.50	14.50
335.0500639	50.80	63.50	9.52	10.52
335.0620522	52.00	62.00	12.00	13.00
335.0520649	52.00	64.00	9.00	10.00
335.0530626	53.00	62.00	6.50	7.50
335.0630536	53.00	63.00	6.00	7.00
335.0630538	53.00	63.00	7.30	8.00
335.0630531	53.00	63.00	10.00	11.00
335.0550632	55.00	63.00	12.00	13.00
335.0650551	55.00	65.00	10.00	11.00
335.0650552	55.00	65.00	12.00	13.00
335.0700559	55.00	70.00	9.00	10.00
335.0700551	55.00	70.00	10.00	11.00
335.0700552	55.00	70.00	12.00	13.00
335.0555718	55.50	71.00	8.00	8.50
335.0660567	56.00	66.00	6.00	7.00
335.0560661	56.00	66.00	10.00	11.00
335.0680582	58.00	68.00	12.00	13.00
335.0800584	58.00	80.00	14.00	15.00
335.0680607	60.00	68.00	7.00	8.00
335.0680608	60.00	68.00	8.00	9.00
335.0600685	60.00	68.00	24.50	25.00
335.0700606	60.00	70.00	6.00	7.00
335.0700601	60.00	70.00	10.00	11.00
335.0700602	60.00	70.00	12.00	13.00
335.0600722	60.00	72.00	12.00	13.00
335.0600759	60.00	75.00	9.50	10.50
335.0800601	60.00	80.00	10.00	11.00
335.0800602	60.00	80.00	12.00	13.00
335.0760621	62.00	76.00	14.00	15.00
335.0780631	63.00	78.00	11.00	12.00
335.0760646	64.00	76.00	6.00	7.00
335.0750656	65.00	75.00	6.00	7.00
335.0750651	65.00	75.00	10.00	11.00
335.0750652	65.00	75.00	12.00	13.00
335.0800659	65.00	80.00	9.00	10.00
335.0650802	65.00	80.00	11.00	12.00
335.0670872	67.00	87.00	12.00	13.00
335.0700788	70.00	78.00	8.00	9.00
335.0780705	70.00	78.00	25.00	26.00
335.0800706	70.00	80.00	6.00	7.00
335.0800701	70.00	80.00	10.00	11.00
335.0800702	70.00	80.00	12.00	13.00
335.0850702	70.00	85.00	12.00	13.00
335.0900702	70.00	90.00	12.00	13.00
335.0900724	72.00	90.00	14.00	15.00
335.0730859	73.00	85.00	9.00	10.00
335.8927382	73.80	89.20	12.00	13.00
335.0850756	75.00	85.00	6.00	7.00
335.0850752	75.00	85.00	12.00	13.00
335.0900759	75.00	90.00	8.80	9.80

Part number	Rod diameter Ød1 f8	Groove diameter ØD1 H9	Seal height H1	Groove width L1 0/+0.5
	Groove diameter Ød1 f8	Bore diameter ØD1 H10		
335.0900750	75.00	90.00	10.00	11.00
335.0900752	75.00	90.00	12.00	13.00
335.0900806	80.00	90.00	6.00	7.00
335.0900801	80.00	90.00	10.00	11.00
335.0800903	80.00	90.00	12.00	13.00
335.0900803	80.00	90.00	13.50	14.50
335.0800921	80.00	92.00	10.00	11.00
335.0800952	80.00	95.00	12.00	13.00
335.1000802	80.00	100.00	12.00	13.00
335.0801009	80.00	100.00	18.00	19.00
335.0811011	81.00	101.50	10.30	11.30
335.0950852	85.00	95.00	12.00	13.00
335.1000852	85.00	100.00	12.00	13.00
335.1000908	90.00	100.00	8.00	9.00
335.1000909	90.00	100.00	9.00	10.00
335.1000902	90.00	100.00	12.00	13.00
335.1100902	90.00	110.00	12.00	13.00
335.1030952	95.00	103.00	12.00	13.00
335.1100952	95.00	110.00	12.00	13.00
335.1150952	95.00	115.00	12.00	13.00
335.1001105	100.00	110.00	4.90	5.50
335.1151002	100.00	115.00	12.00	13.00
335.1201002	100.00	120.00	12.00	13.00
335.1231049	104.80	123.80	9.50	10.50
335.1251052	105.00	125.00	12.00	13.00
335.1251055	105.00	125.00	15.00	16.00
335.1101242	110.00	124.00	12.50	13.50
335.1101252	110.00	125.00	12.00	13.00
335.1251131	113.00	125.00	10.50	11.50
335.1151306	115.00	130.00	5.00	6.00
335.1201305	120.00	130.00	4.90	5.50
335.1401205	120.00	140.00	15.00	16.00

Part number	Rod diameter Ød1 f8	Groove diameter ØD1 H9	Seal height H1	Groove width L1 0/+0.5
	Groove diameter Ød1 f8	Bore diameter ØD1 H10		
335.1401252	125.00	140.00	12.00	13.00
335.1401255	125.00	140.00	15.00	16.00
335.1451255	125.00	145.00	15.00	16.00
335.1301501	130.00	150.00	11.00	12.00
335.1501305	130.00	150.00	15.00	16.00
335.1401505	140.00	150.00	4.90	5.50
335.1601402	140.00	160.00	12.00	13.00
335.1511715	151.00	171.00	15.00	16.00
335.1551856	155.00	185.00	26.00	27.00
335.1601757	160.00	175.00	7.70	8.50
335.1801605	160.00	180.00	15.00	16.00
335.1601845	160.00	184.00	15.50	16.50
335.1751659	165.00	175.00	9.00	10.00
335.1701956	170.00	195.00	16.00	17.00
335.2001709	170.00	200.00	18.00	19.00
335.1742056	174.50	206.00	16.50	17.50
335.1751953	175.00	195.00	13.00	14.00
335.1752006	175.00	200.00	16.00	17.00
335.1852007	185.00	200.00	7.50	8.00
335.2211915	191.80	221.80	15.00	16.00
335.2002255	200.00	225.00	15.00	16.00
335.2252008	200.00	225.00	18.00	19.00
335.2302009	200.00	230.00	18.00	19.00
335.2022205	202.00	220.00	15.00	16.00
335.2112255	211.00	225.00	15.00	16.00
335.2402202	220.00	240.00	12.00	13.00
335.2402552	240.00	255.00	12.00	13.00
335.2602806	260.00	280.00	15.00	16.00
335.2803202	280.00	320.00	20.00	21.00
335.3603909	360.00	390.00	18.00	19.00
335.4304504	430.00	450.00	13.00	14.00
335.4805005	480.00	500.00	15.00	16.00

The figures highlighted in bold correspond to the rod diameters and bore diameters that are recommended by standard ISO 3320. Other intermediate sizes can be provided.