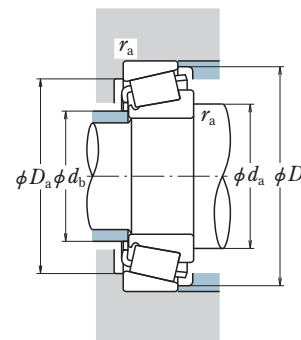
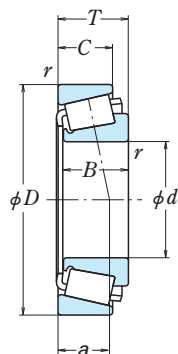


# SINGLE-ROW TAPERED ROLLER BEARINGS (INCH DESIGN)

Bore Diameter 155.575 – 165.100 mm



### Dynamic Equivalent Load

$$P = XF_r + YF_a$$

$F_a/F_r \leq e$		$F_a/F_r > e$	
X	Y	X	Y
1	0	0.4	$Y_1$

### Static Equivalent Load

$$P_0 = 0.5F_r + Y_0F_a$$

When  $F_r > 0.5F_r + Y_0F_a$ , use  $P_0 = F_r$

The values of  $e$ ,  $Y_1$ , and  $Y_0$  are given in the table below.

$d$	Boundary Dimensions (mm/inch)				CONE $r$ min.	CUP $r$ max.	Basic Load Ratings (kN) (kgf)			
	$D$	$T$	$B$	$C$			$C_r$	$C_{0r}$	$C_r$	$C_{0r}$
<b>155.575</b> 6.1250	330.200 13.0000	85.725 3.3750	79.375 3.1250	53.975 2.1250	6.4	6.4	760	1 060	77 500	108 000
	342.900 13.5000	85.725 3.3750	79.375 3.1250	53.975 2.1250	6.4	6.4	760	1 060	77 500	108 000
<b>158.750</b> 6.2500	205.583 8.0938	23.812 0.9375	23.812 0.9375	18.258 0.7188	1.5	1.5	127	249	12 900	25 400
	225.425 8.8750	41.275 1.6250	39.688 1.5625	33.338 1.3125	3.5	3.3	240	540	24 400	55 000
<b>159.951</b> 6.2973	244.475 9.6250	47.625 1.8750	50.005 1.9687	20.638 1.3125	3.5	3.3	330	510	34 000	52 000
	<b>160.325</b> 6.3120	288.925 11.3750	63.500 2.5000	63.500 2.5000	47.625 1.8750	7.0	3.3	615	935	62 500
<b>161.925</b> 6.3750	244.475 9.6250	47.625 1.8750	46.830 1.8437	33.338 1.3125	3.5	3.3	330	510	34 000	52 000
	374.650 14.7500	87.312 3.4375	79.375 3.1250	60.325 2.3750	6.4	3.3	855	1 090	87 000	111 000
<b>165.100</b> 6.5000	215.900 8.5000	26.195 1.0313	26.195 1.0313	20.638 0.8125	1.5	1.5	154	295	15 700	30 000
	225.425 8.8750	41.275 1.6250	39.688 1.5625	33.338 1.3125	3.5	3.3	240	540	24 400	55 000
	247.650 9.7500	47.625 1.8750	47.625 1.8750	38.100 1.5000	3.5	3.3	345	705	35 500	71 500
	254.000 10.0000	46.038 1.8125	46.038 1.8125	33.338 1.3125	4.8	3.3	370	595	37 500	61 000
	254.000 10.0000	46.038 1.8125	46.038 1.8125	33.338 1.3125	4.8	3.3	340	535	34 500	54 500
	288.925 11.3750	63.500 2.5000	63.500 2.5000	47.625 1.8750	7.0	3.3	615	935	62 500	95 500
	288.925 11.3750	63.500 2.5000	63.500 2.5000	47.625 1.8750	7.0	3.3	545	940	55 500	96 000
	298.450 11.7500	63.500 2.5000	63.500 2.5000	47.625 1.8750	7.0	3.3	545	940	55 500	96 000

Bearing Numbers	Abutment and Fillet Dimensions (mm)				CONE $r_a$ max.	CUP $r_a$ min.	Eff. Load Centers (mm) $a$	Constant $e$	Axial Load Factors		Mass (kg) approx.
	$d_a$	$d_b$	$D_a$	$D_b$					$Y_1$	$Y_0$	
<b>H936340 / H936310</b>	209	178	283	317	6.4	6.4	103.3	0.81	0.74	0.41	32.5
<b>H936340 / H936316</b>	209	178	289	323	6.4	6.4	103.3	0.81	0.74	0.41	35.3
<b>L432349 / L432310</b>	173	167	195	200	1.5	1.5	33.9	0.39	1.5	0.84	1.99
<b>46780 / 46720</b>	183	172	208	219	3.5	3.3	44.3	0.38	1.6	0.86	5.34
<b>81629 / 81962</b>	182	171	225	235	3.5	3.3	42.9	0.35	1.7	0.94	6.97
<b>HM237532 / HM237510</b>	202	183	266	278	7.0	3.3	52.7	0.32	1.9	1.0	17
<b>81637 / 81962</b>	183	172	225	235	3.5	3.3	42.9	0.35	1.7	0.94	6.67
<b>EE117063 / 117148</b>	217	188	325	355	6.4	3.3	98.6	0.71	0.85	0.47	42.2
<b>L433749 / L433710</b>	180	173	204	210	1.5	1.5	34.5	0.36	1.7	0.91	2.45
<b>46790 / 46720</b>	186	175	208	219	3.5	3.3	44.3	0.38	1.6	0.86	4.84
<b>67780 / 67720</b>	194	180	228	241	3.5	3.3	52.4	0.44	1.4	0.75	8.16
<b>M235145 / M235113</b>	191	178	235	245	4.8	3.3	41.9	0.32	1.9	1.0	7.72
<b>86650 / 86100</b>	191	178	235	246	4.8	3.3	44.9	0.37	1.6	0.89	7.56
<b>HM237535 / HM237510</b>	204	185	266	278	7.0	3.3	52.7	0.32	1.9	1.0	16.4
<b>94649 / 94113</b>	206	185	261	277	7.0	3.3	62.6	0.47	1.3	0.70	17.2
<b>94649 / 94118</b>	206	185	265	282	7.0	3.3	62.6	0.47	1.3	0.70	18.8