



Bearing No. 7007 CD/P4AH

K	0.5 mm
a	13.6 mm
d	35 mm
D	62 mm
B	14 mm
Ball - z	16
Size (mm)	62x35x14
Width (mm)	14
Mass bearing	0.15 kg
$d_n$	45.3 mm
$D_1$	53.3 mm
$d_1$	43.7 mm
$C_1$	8.4 mm
$D_1$	53.3 mm
$d_2$	43.7 mm
$C_1$	8.4 mm
$d_1$	43.7 mm
$d_n$	45.3 mm
$d_2$	43.7 mm
Bearing number	7007 CD/P4AH
Preload class A	36 N/micron
Preload class D	90 N/micron
Preload class B	47 N/micron
Preload class C	64 N/micron
$G_{ref}$	1.98 cm <sup>3</sup>
Number of balls z	16
$r_b$ max.	0.3 mm
$r_a$ max.	1 mm
$D_b$ max.	60 mm

$D_a$ max.	57.4 mm
$d_b$ min.	39.6 mm
$d_a$ min.	39.6 mm
Bore Diameter (mm)	62
Outer Diameter (mm)	35
$d_b$ - min.	39.6 mm
$r_b$ - max.	0.3 mm
$r_{1,2}$ min.	1 mm
$d_a$ - min.	39.6 mm
Calculation factor f	1.06
$r_a$ - max.	1 mm
$r_{3,4}$ min.	0.3 mm
$D_a$ - max.	57.4 mm
Ball - $D_w$	7.938 mm
$D_b$ - max.	60 mm
Calculation factor - f	1.06
$r_{3,4}$ - min.	0.3 mm
$r_{1,2}$ - min.	1 mm
Ball diameter $D_w$	7.938 mm
Basic dynamic load rating C	15.6 kN
Preload class D $G_D$	480 N
Preload class A $G_A$	60 N
Preload class C $G_C$	240 N
Preload class B $G_B$	120 N
Basic dynamic load rating - C	15.6 kN
Preload class A - $G_A$	60 N
Preload class B - $G_B$	120 N
Preload class C - $G_C$	240 N
Preload class D - $G_D$	480 N
Fatigue load limit $P_u$	0.4 kN

Calculation factor $f_1$	1
Calculation factor $f_0$	9.7
Calculation factor $f_{2D}$	1.09
Calculation factor - f	1
Calculation factor $f_{2C}$	1.05
Calculation factor $f_{HC}$	1
Calculation factor $f_{2B}$	1.02
Calculation factor $f_{2A}$	1
Limiting speed for oil lubrication	36000 mm/min
Fatigue load limit - $P_u$	0.4 kN
Calculation factor - $f_0$	9.7
Calculation factor - $f_{2D}$	1.09
Calculation factor - $f_{HC}$	1
Calculation factor - $f_{2A}$	1
Calculation factor - $f_{2C}$	1.05
Calculation factor - $f_{2B}$	1.02
Limiting speed for grease lubrication	24000 r/min
Basic static load rating $C_0$	9.5 kN
Static axial stiffness, preload class B	47 N/ $\mu$ m
Static axial stiffness, preload class C	64 N/ $\mu$ m
Static axial stiffness, preload class A	36 N/ $\mu$ m
Static axial stiffness, preload class D	90 N/ $\mu$ m
Attainable speed for grease lubrication	24000 r/min
Attainable speed for oil-air lubrication	36000 r/min

Basic static load rating - $C_0$	9.5 kN
Reference grease quantity $G_{ref}$	1.98 cm <sup>3</sup>