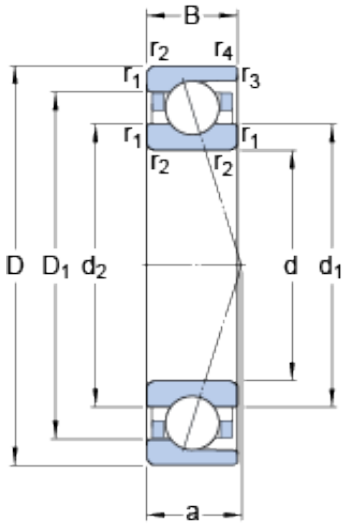

71901 ACD/HCP4A Bearing 2D drawings and 3D CAD models

12 mm x 24 mm x 6 mm SKF 71901 ACD/HCP4A angular contact thrust ball bearings for screw drives

Bearing No. 71901 ACD/HCP4A

Size	24x12x6 mm
Bore Diameter	24 mm
Outer Diameter	12 mm
Width	6 mm
d	12 mm
D	24 mm
B	6 mm
d_1	16 mm
d_2	16 mm
D_1	20 mm
$r_{1,2}$ - min.	0.3 mm
$r_{3,4}$ - min.	0.2 mm
a	7.3 mm
d_a - min.	14 mm
d_b - min.	14 mm
D_a - max.	22 mm
D_b - max.	22.6 mm
r_a - max.	0.3 mm
r_b - max.	0.2 mm
d_n	16.8 mm
Basic dynamic load rating - C	2.6 kN
Basic static load rating - C_0	1.2 kN
Fatigue load limit - P_u	0.05 kN

Limiting speed for grease lubrication	67000 r/min
Limiting speed for oil lubrication	100000 mm/min
Ball - D_w	3.175 mm
Ball - z	13
G_{ref}	0.12 cm3
Calculation factor - e	0.68
Calculation factor - Y_2	0.87
Calculation factor - Y_0	0.38
Calculation factor - X_2	0.41
Calculation factor - Y_1	0.92
Calculation factor - Y_2	1.41
Calculation factor - Y_0	0.76
Calculation factor - X_2	0.67
Preload class A - G_A	15 N
Preload class B - G_B	30 N
Preload class C - G_C	60 N
Preload class D - G_D	120 N
Calculation factor - f	1.04
Calculation factor - f_1	0.98
Calculation factor - f_{2A}	1
Calculation factor - f_{2B}	1.07
Calculation factor - f_{2C}	1.12
Calculation factor - f_{2D}	1.17
Calculation factor - f_{HC}	1.04
Preload class A	34 N/micron
Preload class B	44 N/micron
Preload class C	57 N/micron
Preload class D	76 N/micron

Category	Precision Ball Bearings
Inventory	0.0
Manufacturer Name	SKF
Minimum Buy Quantity	N/A
Weight / Kilogram	0.01
Product Group	B00308
Enclosure	Open
Precision Class	ABEC 7 | ISO P4
Material - Ball	Ceramic
Number of Bearings	1 (Single)
Contact Angle	25 Degree
Preload	None
Raceway Style	1 Rib Outer Ring
Cage Material	Phenolic
Rolling Element	Ball Bearing
Flush Ground	No
Inch - Metric	Metric
Other Features	Single Row | Angular Contact | High Capacity Basic Design
Long Description	12MM Bore; 24MM Outside Diameter; 6MM Width; Open Enclosure; ABEC 7 | ISO P4 Precision; Ceramic Ball Material; 1 (Single) Bearing; 25 Degree Contact Angle; Phenolic Cage Material; 1 Rib Outer Ring Rac
Category	Precision Ball Bearings
UNSPSC	31171531
Harmonized Tariff Code	8482.10.50.28
Noun	Bearing
Keyword String	Ball Angular Contact
Manufacturer URL	http://www.skf.com

Outside Diameter	0.945 Inch | 24 Millimeter
Width	0.236 Inch | 6 Millimeter
Bore	0.472 Inch | 12 Millimeter
d_1	16 mm
d_2	16 mm
D_1	20 mm
$r_{1,2}$ min.	0.3 mm
$r_{3,4}$ min.	0.2 mm
d_a min.	14 mm
d_b min.	14 mm
D_a max.	22 mm
D_b max.	22.6 mm
r_a max.	0.3 mm
r_b max.	0.2 mm
d_n	16.8 mm
Basic dynamic load rating C	2.55 kN
Basic static load rating C_0	1.18 kN
Fatigue load limit P_u	0.05 kN
Attainable speed for grease lubrication	67000 r/min
Attainable speed for oil-air lubrication	100000 r/min
Ball diameter D_w	3.175 mm
Number of balls z	13
Reference grease quantity G_{ref}	0.12 cm^3
Preload class A G_A	15 N
Static axial stiffness, preload class A	34 N/ µ m
Preload class B G_B	30 N
Static axial stiffness, preload class B	44 N/ µ m
Preload class C G_C	60 N
Static axial stiffness, preload	57 N/ µ m

class C	
Preload class D G_D	120 N
Static axial stiffness, preload class D	76 N/ µ m
Calculation factor f	1.04
Calculation factor f_1	0.98
Calculation factor f_{2A}	1
Calculation factor f_{2B}	1.07
Calculation factor f_{2C}	1.12
Calculation factor f_{2D}	1.17
Calculation factor f_{HC}	1.04
Calculation factor e	0.68
Calculation factor (single, tandem) Y_2	0.87
Calculation factor (single, tandem) Y_0	0.38
Calculation factor (single, tandem) X_2	0.41
Calculation factor (back-to-back, face-to-face) Y_1	0.92
Calculation factor (back-to-back, face-to-face) Y_2	1.41
Calculation factor (back-to-back, face-to-face) Y_0	0.76
Calculation factor (back-to-back, face-to-face) X_2	0.67
Mass bearing	0.01 kg