



FAG

23022-E1A-XL-K-M-C3

Spherical Roller Bearing

Spherical roller bearings 230..-E1A-K, main dimensions to DIN 635-2, with tapered bore, taper 1:12

X-life

Technical information



Your current product variant

Design	E1A	Without central rip
Bore type	K	Tapered, taper 1:12
Cage	M	Brass Cage
Radial internal clearance	C3 (Group 3)	Internal clearance larger than CN
Relubrication	Standard	
Special material	Standard	

Main Dimensions & Performance Data

d	110 mm	Bore diameter
D	170 mm	Outside diameter
B	45 mm	Width
C _r	400.000 N	Basic dynamic load rating, radial
C _{0r}	530.000 N	Basic static load rating, radial
C _{ur}	54.000 N	Fatigue load limit, radial
n _G	4.200 1/min	Limiting speed
n _{gr}	3.000 1/min	Reference speed
≈m	3,57 kg	Weight



Mounting dimensions

$d_{a \min}$	118,8 mm	Minimum diameter shaft shoulder
$D_{a \max}$	161,2 mm	Maximum diameter of housing shoulder
$r_{a \max}$	2 mm	Maximum recess radius
$d_{a \max}$	123 mm	Maximum diameter of shaft shoulder
$d_{b \min}$	118 mm	Minimum cavity diameter of the sleeve
$B_{a \min}$	14 mm	Minimum cavity width of the sleeve

Dimensions

r_{\min}	2 mm	Minimum chamfer dimension
D_1	154,6 mm	Bore diameter outer ring
d_s	3,2 mm	Diameter lubrication hole
n_s	6,5 mm	Width of lubricating groove

Temperature range

T_{\min}	-30 °C	Operating temperature min.
T_{\max}	200 °C	Operating temperature max.

Calculation factors

e	0,23	Limiting value of F_a/F_r for the applicability of diff. Values of factors X and Y
Y_1	2,9	Dynamic axial load factor
Y_2	4,31	Dynamic axial load factor
Y_0	2,83	Static axial load factor

Additional information

H322	Adapter sleeve
AHX322	Withdrawal sleeve



Characteristics

-  Radial load
-  Axial load in one direction
-  Axial load in two directions
-  Grease Lubrication
-  Oil Lubrication
-  Not sealed
-  Static angular error and misalignment
-  Dynamic angular error and misalignment