

**FAG****QJ220-N2-MPA-C3**

Four-point contact bearing

Four point contact bearing QJ2..-N2-MPA,
holding grooves, solid brass cage

Technical information



Your current product variant

Design, bearing outer ring	N2	Two retaining grooves in the outer ring on one side
Tolerance class	PN	Normal (ISO 492:2023)
Cage	MPA	Solid brass cage, outer ring guided
Dimensional / heat stabilization	S0	Rings dimensional stabilized up to 150°
Axial internal clearance	C3	Group 3 (C3), bigger than CN

Main Dimensions & Performance Data

d	100 mm	Bore diameter
D	180 mm	Outside diameter
B	34 mm	Width
C _r	224,000 N	Basic dynamic load rating, radial
C _{0r}	241,000 N	Basic static load rating, radial
C _{ur}	11,500 N	Fatigue load limit, radial
n _G	6,600 1/min	Limiting speed
n _{gr}	3,550 1/min	Reference speed
≈m	3.89 kg	Weight

Mounting dimensions

d _{a min}	112 mm	Minimum diameter shaft shoulder
D _{a max}	168 mm	Maximum diameter of housing shoulder
r _{a max}	2.1 mm	Maximum fillet radius



Dimensions

r_{\min}	2.1 mm	Minimum chamfer dimension
D_1	153.6 mm	Shoulder diameter outer ring
d_1	127.74 mm	Shoulder diameter inner ring
a	98 mm	Distance between the apexes of the pressure cones
a_n	10.1 mm	Height retaining slot
b_n	8.5 mm	Width retaining slot
r_n	2 mm	Radius retaining slot
	45 °	Angle retaining slot
α	35 °	Contact angle

Temperature range

T_{\min}	-30 °C	Operating temperature min.
T_{\max}	150 °C	Operating temperature max.

Characteristics



Radial load



Axial load in one direction



Axial load in two directions



Grease Lubrication



Oil Lubrication



Not sealed