



Image may differ from product. See technical specification for details.

# 207-2ZNR

#### Deep groove ball bearing with filling slots and integral sealing

Single row deep groove ball bearings with filling slots, a snap ring, and shields on one or both sides, accommodate more balls than standard deep groove ball bearings. They are of a simple, yet versatile, design and are robust in operation, requiring little maintenance. They can accommodate radial and axial loads in both directions. They have a higher radial load carrying capacity than the corresponding bearings without filling slots but have a limited axial load carrying capacity due to the filling slots. The snap ring, fitted in an annular groove in the outer ring, facilitates axial location of the bearings within their housings. The integral sealing can significantly prolong bearing service life because it keeps lubricant in the bearings and contaminants out.

- Snap ring facilitates axial location within housing
- Integral sealing prolongs bearing service life
- Simple, versatile and robust design
- Accommodate higher radial loads than corresponding bearings without filling slots, with limited axial loads in both directions
- Require little maintenance

### Overview

#### Dimensions

Bore diameter	1.378 in
Outside diameter	2.835 in
Width	0.669 in

#### Performance

Basic dynamic load rating	6 182 lbf
Basic static load rating	4 946 lbf
Reference speed	17 000 r/min
Limiting speed	8 000 r/min

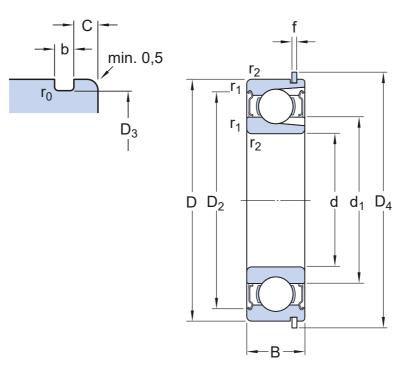
### Properties

Filling slots	With
Number of rows	1
Locating feature, bearing outer ring	Snap ring (fitted)
Bore type	Cylindrical
Cage	Sheet metal
Matched arrangement	No
Radial internal clearance	CN
Material, bearing	Bearing steel
Coating	Without
Sealing	Shield on both sides
Sealing type	Non-contact
Lubricant	Grease
Relubrication feature	Without

### Logistics

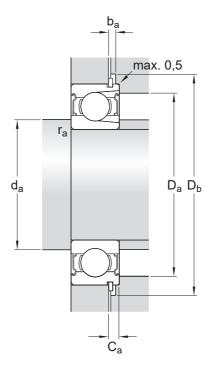
Product net weight	0.7011 lb
eClass code	23-05-08-01
UNSPSC code	31171504

## Technical specification



### Dimensions

d	1.378 in	Bore diameter
D	2.835 in	Outside diameter
В	0.669 in	Width
dı	≈ 1.848 in	Shoulder diameter
D2	≈ 2.468 in	Recess diameter
D <sub>3</sub>	2.709 in	Diameter of snap ring groove
D4	3.094 in	Outside diameter of snap ring
b	0.075 in	Width of snap ring groove
С	0.129 in	Distance from outer ring side face to snap ring groove
f	0.067 in	Width of snap ring
ro	max. 0.024 in	Bottom radius of snap ring groove
٢1,2	min. 0.043 in	Chamfer dimension



#### Abutment dimensions

d <sub>a</sub>	min. 1.654 in	Diameter of shaft abutment
d <sub>a</sub>	max. 1.843 in	Diameter of shaft abutment
Da	max. 2.559 in	Diameter of housing abutment
D <sub>b</sub>	min. 3.15 in	Diameter of snap ring recess in the housing
b <sub>a</sub>	min. 0.087 in	Width of snap ring recess in the housing
C <sub>a</sub>	max. 0.196 in	Distance from outer ring side face to snap ring back face
٢a	max. 0.039 in	Radius of shaft or housing fillet

### Calculation data

Basic dynamic load rating	C	6 182 lbf
Basic static load rating	C <sub>0</sub>	4 946 lbf
Fatigue load limit	Pu	209 lbf
Reference speed		17 000 r/min
Limiting speed		8 000 r/min

### Included products

#### GENERAL BEARING SPECIFICATIONS

- Tolerances: Normal (metric), P6, P5, Normal (inch)
- Radial internal clearance: Classes C2 to C5

#### **BEARING INTERFACES**

- Seat tolerances for standard conditions
- Tolerances and resultant fits

### More Information

Product details	Engineering information	interview Tools
Single row deep groove ball bearings		SKF Product select
Stainless steel deep groove ball	Principles of rolling bearing selection	SimPro Quick
bearings	General bearing knowledge	Bearing Frequency Calculator
Single row deep groove ball bearings with filling slots	Bearing selection process	LubeSelect for SKF greases
Double row deep groove ball bearings	Bearing interfaces	Heater selection tool
General bearing specifications	Seat tolerances for standard conditions	
Loads	Selecting internal clearance	
Temperature limits	Lubrication	
Permissible speed	Sealing, mounting and dismounting	
Designation system	Bearing failure and how to prevent it	



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