



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

YEL 209-2F

Insert bearing with an eccentric locking collar and extended inner ring

Insert bearings are based on sealed deep groove ball bearings. This variant is intended for use in applications where the direction of rotation is constant. It has an inner ring extended on both sides, with an eccentric locking collar, enabling quick and easy mounting onto the shaft.

- Quick and easy to mount onto the shaft
- Long service life
- Reduce noise and vibration levels

Overview

Dimensions

Bore diameter	45 mm
Outside diameter	85 mm
Width, total	56.3 mm
Width, inner ring	42.8 mm
Width, outer ring	22 mm

Performance

Basic dynamic load rating	33.2 kN
Basic static load rating	21.6 kN
Limiting speed	4 300 r/min
Note	Limiting speed with shaft tolerance h6

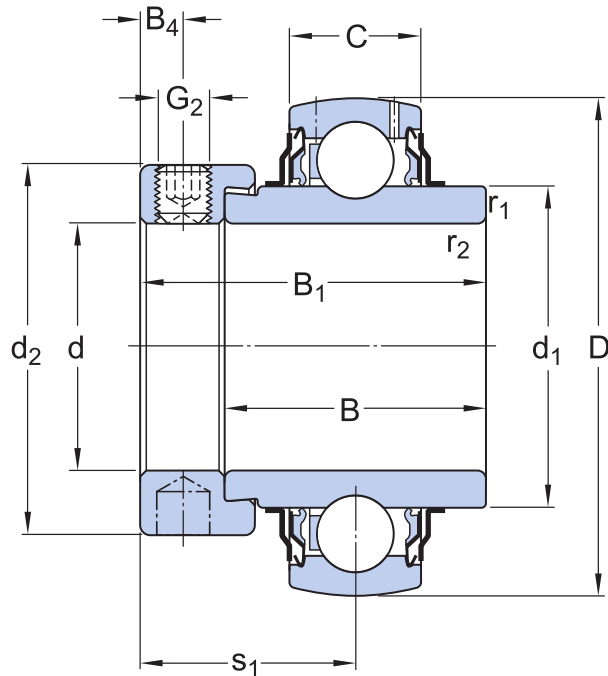
Properties

Retaining feature, inner ring	Eccentric collar
Bore type	Cylindrical
Rolling elements	Balls
Outer ring type	Spherical
Inner ring extension	On both sides
Cage	Non-metallic
Rubber seating ring	Without
Material, bearing	Bearing steel
Coating	Without
Sealing	Seal and flinger on both sides
Sealing type	Contact, standard
Lubricant	Grease
Relubrication feature	With

Logistics

Product net weight	0.771 kg
eClass code	23-05-08-02
UNSPSC code	31171536

Technical specification



Dimensions

d	45 mm	Bore diameter
D	85 mm	Outside diameter
B ₁	56.3 mm	Overall bearing width
B	42.8 mm	Width of inner ring
C	22 mm	Width of outer ring
d ₁	≈ 56.8 mm	Outside diameter of inner ring
d ₂	62 mm	Outside diameter of locking collar
B ₄	6.75 mm	Distance from side face to thread centre
r _{1,2}	min. 1 mm	Chamfer dimension of inner ring
s ₁	34.9 mm	Distance from locking device side face to raceway centre

Calculation data

Basic dynamic load rating	C	33.2 kN
Basic static load rating	C ₀	21.6 kN
Fatigue load limit	P _u	0.915 kN

Limiting speed		4 300 r/min
		Limiting speed with shaft tolerance h6
Calculation factor	f_0	14

Mounting information

Set screw	G ₂	M10x1
Hexagonal key size for set screw	N	5 mm
Recommended tightening torque for set screw		16.5 N·m

Associated products

Rubber seating ring	RIS 209 A
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Tolerances and clearances




GENERAL BEARING SPECIFICATIONS

- [Tolerances](#): table 1, table 2
- [Radial internal clearance](#): Standard inner ring, Other bearings

BEARING INTERFACES

- Shaft tolerances

More Information

 Product details	 Engineering information	 Tools
Designs and variants		SKF Product select
Lubrication	Principles of rolling bearing selection	Bearing Frequency Calculator
General bearing specifications	General bearing knowledge	SimPro Quick
Loads	Bearing selection process	Heater selection tool
Temperature limits	Bearing failure and how to prevent it	
Permissible speed		
Design considerations		
Mounting and dismounting		
Designation system		



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