



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

UCF 209/H

Square flanged ball bearing unit with set screw locking, cast iron housing, JIS

These square flanged ball bearing units are compliant with Japanese Industrial Standards (JIS). They consist of an insert bearing, with an extended inner ring and set screw locking, and are suitable for applications where the direction of rotation is constant or alternating. The bearing is mounted in a cast iron housing, which can be bolted to a machine wall or frame. Ball bearing units can accommodate moderate initial misalignment, but normally do not permit axial displacement.

- Resist high levels of contamination
- Designed for high temperatures and speeds
- Accommodate relatively heavy loads
- Cost-effective

Overview

Dimensions

Shaft diameter	45 mm
Housing overall width	38 mm
Width, total	52.2 mm
Centre distance between bolt holes	105 mm
Bearing width, total	49.2 mm

Properties

Housing type	Flanged
Flanged housing type	Square
Number of bolt holes for fasteners	4
Fastening bolt hole type	Plain
Retaining feature, inner ring	Set screws
Bore type	Cylindrical
Rubber seating ring	Without
Material, housing	Cast iron
Material, bearing	Bearing steel
Coating	Without
Sealing, bearing	Seal and flinger on both sides
Sealing type	Contact, standard
Sealing, unit	Optional end cover
Lubricant	Grease
Relubrication hole	With
Grease fitting	With

Performance

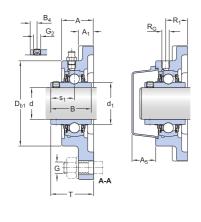
Basic dynamic load rating	33.2 kN
Basic static load rating	21.6 kN
Limiting speed	3 400 r/min
Note	Limiting speed with shaft tolerance h6

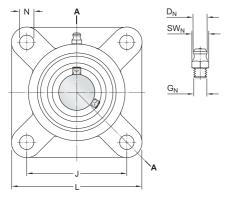
Logistics

Product net weight	2.04 kg
eClass code	23-05-16-02
UNSPSC code	31171536

Technical specification

Compliance with standard	JIS
Purpose specific	For material handling applications
Material, housing	Cast iron
Sealing, bearing	Seal and flinger on both sides
Sealing type, bearing	Contact, standard
Sealing, unit	Optional end cover
Coating	Without





Dimensions

d	45 mm	Bore diameter
d_1	≈ 56.8 mm	Outer diameter of inner ring
А	38 mm	Width of housing
A ₁	16 mm	Flange width
A ₅	26.5 mm	Standout of end cover
В	49.2 mm	Width of inner ring
B4	8 mm	Distance from locking device side face to thread centre
D _{b1}	108 mm	Top external diameter
J	105 mm	Distance between attachment bolts
L	137 mm	Overall length
N	16 mm	Diameter of attachment bolt hole
S ₁	30.2 mm	Distance from locking device side face to raceway centre
Т	52.2 mm	Overall width

THREADED HOLE

R	G	1/4-28 UNF	Housing thread for grease fitting
R	1	26 mm	Axial position of the housing thread

GREASE FITTING

D_N	6.6 mm	Diameter of head sphere of grease fitting
SW _N	7.94 mm	Hexagonal key size for the grease fitting
G_N	1/4-28 UNF	Thread of grease fitting

Calculation data

Basic dynamic load rating	С	33.2 kN
Basic static load rating	C_0	21.6 kN
Fatigue load limit	P_{u}	0.915 kN
Limiting speed		3 400 r/min
		Limiting speed with shaft tolerance h6

Mass

Mass bearing unit 2.1 kg

Mounting information

Set screw	G_2	M8x1
Hexagonal key size for set screw		4 mm
Recommended tightening torque for set screw		6.5 N·m
Recommended diameter for attachment bolts, mm	G	14 mm
Recommended diameter for attachment bolts, inch	G	0.5625 in

Compatible products

Spare part

Recommended product

Insert bearing with set screw locking and extended inner ring

YAR 209-2F

End cover for bearing units

ECY 209