



SKF FYJ 80 TF

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.

Technical specifications

General	
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	Without
Coating	Without

Dimensions	
Bore diameter	80 mm
Outer diameter of inner ring	97.4 mm
Width of housing	54.5 mm
Flange width	22 mm
Depth of centring recess	3.2 mm
Width of inner ring	77.8 mm
Overall bearing width	77.8 mm
Distance from locking device side face to thread centre	12 mm
Top external diameter	162 mm
Base external diameter	171 mm
Diameter of housing centering recess	179.4 mm
Centre distance between bolt holes	165 mm
Overall length	208 mm
Diameter of attachment bolt hole	23 mm
Distance from locking device side face to raceway centre	47.6 mm
Overall width	81.6 mm
Housing thread for grease fitting	1/4-28 UNF
Axial position of the housing thread	34.5 mm
Diameter of head sphere of grease fitting	6.5 mm
Hexagonal key size for the grease fitting	7 mm
Thread of grease fitting	1/4-28 SAE-LT
Distance of dowel pins	184 mm
Axial offset of dowel pins	51.5 mm
Recommended diameter for dowel pins	4 mm
Attachment bolt diameter	20 mm
Shaft diameter	80 mm
Housing overall width	54.5 mm
Width, total	81.6 mm
Bearing width, total	77.8 mm

Calculation data	
Basic dynamic load rating	72.8 kN
Basic static load rating	53 kN
Fatigue load limit	2.16 kN
Limiting speed	2400 r/min
	Limiting speed with shaft tolerance h6

Mounting information	

Set screw	M10x1
Hexagonal key size for set screw	5 mm
Recommended tightening torque for set screw	16.5 N·m
Recommended diameter for attachment bolts, mm	20 mm
Recommended diameter for attachment bolts, inch	0.75 in

Performance	
Basic dynamic load rating	72.8 kN
Basic static load rating	53 kN
Limiting speed	2400 r/min
Note	Limiting speed with shaft tolerance h6

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	Without
Lubricant	Grease
Relubrication hole	With
Grease fitting	With

Logistics	
Product net weight	6.7 kg
eClass code	23-05-16-02
UNSPSC code	31171536

SKF drawings

