



# HK 0509

Popular item

## Drawn cup needle roller bearings

### Bearing data

[Tolerances,](#)

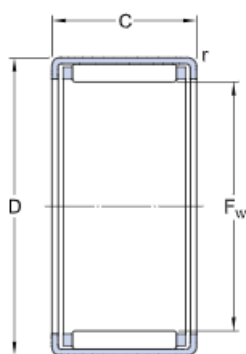
table

### Design considerations

[Shaft and housing tolerances,](#)

table

## Technical specification



### DIMENSIONS

$F_w$	5 mm
D	9 mm
C	9 mm
r	min. 0.4 mm

## CALCULATION DATA

Basic dynamic load rating	C	2.38 kN
Basic static load rating	$C_0$	2.08 kN
Fatigue load limit	$P_u$	0.22 kN
Reference speed		22 000 r/min
Limiting speed		24 000 r/min

## MASS

Mass bearing	0.002 kg
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## ASSOCIATED PRODUCTS

Radial shaft seal with a low cross-sectional height, single lip

G 5x9x2 S

## More information

## Product details

[Designs and variants](#)[Bearing data](#)[Loads](#)[Temperature limits](#)[Permissible speed](#)[Design considerations](#)[Mounting](#)[Designation system](#)

## Engineering information

[Principles of rolling bearing selection](#)[General bearing knowledge](#)[Bearing selection process](#)[Bearing failure and how to prevent it](#)

## Tools

[SimPro Quick](#)[Bearing Select](#)[Engineering Calculator](#)[LubeSelect for SKF greases](#)[Heater Selection Tool](#)[skf.com/mount](#)

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