



Technical datasheet

NU309C3

Single row cylindrical roller bearings

Single row cylindrical roller bearing, floating, separable, pressed steel cage

Visual(s)



Product definition

d	45 mm
D	100 mm
B	25 mm
E	86.5 mm
F	58.5 mm
rs min	1.5 mm
r1s min	1.5 mm
Radial clearance class	C3
Mass (without HJ ring)	0.88 kg
Brand	NTN

Product performance

Dynamic load, C	74 kN
Static load, C0	71 kN
Fatigue limit load, Cu	8.7 kN
Nlim (oil)	8,400 rpm
Nlim (grease)	7,200 rpm
Min operating temperature, Tmin	-40 °C
Max operating temperature, Tmax	120 °C
Characteristic cage frequency, FTF	0.4 Hz
Characteristic rolling element frequency, BSF	4.98 Hz
Characteristic outer ring frequency, BPF0	4.44 Hz
Characteristic inner ring frequency, BPF1	6.56 Hz

Abutment dimensions

da min	53 mm
da max	57 mm
db min	60 mm
Da max	92 mm
ra max	1.5 mm
r1a max	1.5 mm

Calculation factors

Equivalent dynamic radial load

$$P = F_r$$

Equivalent static radial load

$$P_0 = F_r$$