



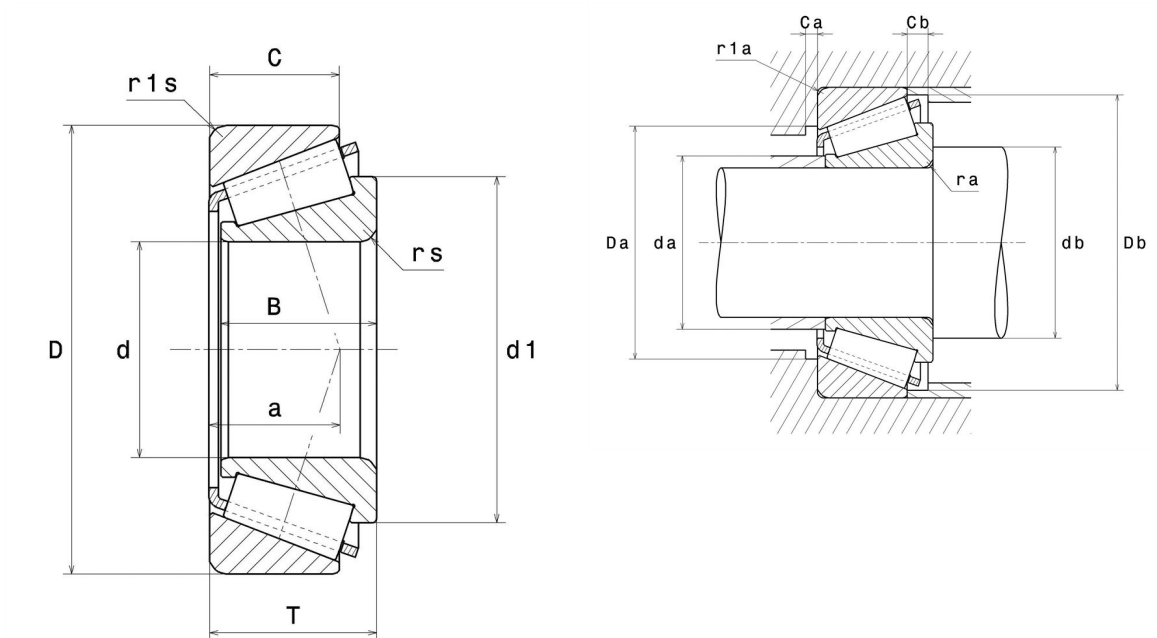
Technical data

32310U

Single row tapered roller bearings

Tapered roller bearing, pressed steel cage

Visual(s)



Product definition

d	50 mm
D	110 mm
B	40 mm
C	33 mm
T	42.25 mm
d1	78.5 mm
a	28.5 mm
rs min	2.5 mm
r1s min	2 mm
e	0.35
Y2	1.74
Y0	0.96
Mass	1.92 kg
ISO 355 reference	T2FD050
Brand	NTN

Product performance

Dynamic load, C	184 kN
Rating life coefficient, A2	1
Static load, C0	232 kN
Fatigue limit load, Cu	28.3 kN
Nlim (oil)	4,800 Tr/min
Nlim (grease)	3,600 Tr/min
Min operating temperature, Tmin	-40 °C
Max operating temperature, Tmax	120 °C
Characteristic cage frequency, FTF	0.41 Hz
Characteristic rolling element frequency, BSF	5.28 Hz
Characteristic outer ring frequency, BPF0	6.57 Hz
Characteristic inner ring frequency, BPFI	9.43 Hz

Abutment dimensions

da max	62 mm
db min	62 mm
Da min	90 mm
Da max	100 mm
Db min	102 mm
Ca min	3 mm
Cb min	9 mm
ra max	2 mm
r1a max	2 mm

Calculation factors

Equivalent dynamic radial load

$$P = X.F_r + Y.F_a$$

$F_a / F_r \leq e$		$F_a / F_r > e$	
X	Y	X	Y
1	0	0.4	Y ₂

Equivalent static radial load

$$P_0 = X_0.F_r + Y_0.F_a$$

X_0	Y_0
0.5	Y ₀

If $P_0 < F_r$, then use $P_0 = F_r$

The values for e, Y₂ and Y₀ are shown in the above table