

Translated English of Chinese Standard: GB/T297-2015

www.ChineseStandard.net

Sales@ChineseStandard.net

GB

NATIONAL STANDARD OF THE PEOPLE'S REPUBLIC OF CHINA

ICS 21.100.20
J 11

GB/T 297-2015

Replacing GB/T 297-1994

Rolling bearings – Tapered roller bearings – Boundary dimensions

GB/T 297-2015 How to BUY & immediately GET a full-copy of this standard?

1. www.ChineseStandard.net;
2. Search --> Add to Cart --> Checkout (3-steps);
3. No action is required - Full-copy of this standard will be automatically & immediately delivered to your EMAIL address in 0~25 minutes.
4. Support: Sales@ChineseStandard.net. Wayne, Sales manager

Issued on: February 4, 2015

Implemented on: October 1, 2015

**Issued by: General Administration of Quality Supervision, Inspection and Quarantine of the People's Republic of China;
Standardization Administration of the People's Republic of China.**

Table of Contents

Foreword.....	3
1 Scope	4
2 Normative references	4
3 Terms and definitions	4
4 Symbols	4
5 Codes	6
6 Designation example	6
7 Dimensions.....	6

Foreword

This Standard was drafted in accordance with the rules given in GB/T 1.1-2009.

This Standard replaces GB/T 297-1994, *Rolling bearings – Tapered roller bearings - Boundary dimensions*. Compared with GB/T 297-1994, the main technical changes of this Standard are as follows:

- it adds “Terms and Definitions” (see Chapter 3);
- it modifies part of the symbols (see Chapter 4; Chapter 3 of Edition 1994);
- it adds “Codes” (see Chapter 5);
- it adjusts the sequence of the tables (see Table 1 to Table 10; Table 1 to Table 10 of Edition 1994);
- it adds part of the bearing types and dimensions of series 02, 22 and 23 (see Table 5, Table 6 and Table 10);
- it adds the serial codes of ISO dimensions (see Table 1 to Table 10); and
- it deletes the contrast between the codes of the new and old bearings (Annex A of Edition 1994).

This Standard was proposed by China Machinery Industry Federation.

This Standard shall be under the jurisdiction of the National Standardization Technical Committee on Rolling Bearings (SAC/TC 98).

The drafting organizations of this Standard: Luoyang Bearing Research Institute Co., Ltd., Fujian Province Yongan Bearing Co., Ltd., China Jinfa Bearing Co., Ltd. and Dalian Guangyang Bearing Co., Ltd.

The main drafters of this Standard: Guo Baoxia, Chen Defu, Li Xianhong and Yang Xingnian.

The previous editions replaced by this Standard are as follows:

- GB 297-1964, GB 297-1984 and GB/T 297-1994;
- GB 298-1964.

Rolling bearings –

Tapered roller bearings – Boundary dimensions

1 Scope

This Standard specifies the boundary dimensions of single-row tapered roller bearings in accordance with GB/T 273.1-2011 (hereinafter referred to as bearings).

This Standard applies to the design and selection of bearings.

2 Normative references

The following referenced documents are indispensable for the application of this document. For dated references, only the edition dated applies to this document. For undated references, the latest edition of the referenced documents (including all amendments) applies to this Standard.

GB/T 272-1993, *Rolling bearing – Identification code*

GB/T 273.1-2011, *Rolling bearings – Boundary dimensions general plan – Part 1: Tapered roller bearings*

GB/T 274-2000, *Rolling bearings – Chamfer dimension – Maximum values*

GB/T 6930-2002, *Rolling bearings – Vocabulary*

JB/T 2974-2004, *Rolling bearings – Identification code – Supplemental regulations*

3 Terms and definitions

For the purpose of this document, the terms and definitions defined in GB/T 6930-2002 shall apply.

4 Symbols

The following symbols apply to this document.

Unless specified otherwise, the symbols in Figure 1 and the numerical values in Table 1 to Table 10 are all nominal dimensions.

NOTE The figures are only structural examples; the bearings are not necessary to be identical

to the structures in the figures, but they shall meet the dimensions specified.

B : inner ring width.

C : outer ring width.

D : bearing outer diameter.

d : bearing inner diameter.

E : outer ring back inner diameter.

r : inner ring back chamfer dimension.

r_{min} : inner ring back minimum single chamfer dimension.

r_1 : outer ring back chamfer dimension.

$r_{1\text{min}}$: outer ring back minimum single chamfer dimension.

r_2 : front chamfer dimensions of outer ring and inner ring.

T : bearing width.

α : contact angle.

This is an excerpt of the PDF (Some pages are marked off intentionally)

Full-copy PDF can be purchased from 1 of 2 websites:

1. <https://www.ChineseStandard.us>

- SEARCH the standard ID, such as GB 4943.1-2022.
- Select your country (currency), for example: USA (USD); Germany (Euro).
- Full-copy of PDF (text-editable, true-PDF) can be downloaded in 9 seconds.
- Tax invoice can be downloaded in 9 seconds.
- Receiving emails in 9 seconds (with download links).

2. <https://www.ChineseStandard.net>

- SEARCH the standard ID, such as GB 4943.1-2022.
- Add to cart. Only accept USD (other currencies - <https://www.ChineseStandard.us>).
- Full-copy of PDF (text-editable, true-PDF) can be downloaded in 9 seconds.
- Receiving emails in 9 seconds (with PDFs attached, invoice and download links).

Translated by: Field Test Asia Pte. Ltd. (Incorporated & taxed in Singapore. Tax ID: 201302277C)

About Us (Goodwill, Policies, Fair Trading...): <https://www.chinesestandard.net/AboutUs.aspx>

Contact: Wayne Zheng, Sales@ChineseStandard.net

Linkin: <https://www.linkedin.com/in/waynezhengwenrui/>

----- The End -----