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**NATIONAL STANDARD OF THE
PEOPLE'S REPUBLIC OF CHINA**

GB/T 13511.1-2025

**Assembled spectacles - Part 1: Single-vision and multifocal
prescription assembled spectacles**

配装眼镜第1部分：单焦和多焦定配眼镜

(English Translation)

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Foreword

This document is in accordance with the provisions of GB/T 1.1-2020 "Guidelines for standardization work Part 1: Structure and drafting rules for standardization documents" Drafting.

This document is Part 1 of GB/T 13511 "Fitting spectacles". GB/T 13511 has been published in the following parts.

- Part 1: Single-focal and multifocal prescription spectacles;
- Part 2: Progressive focus prescription glasses;
- Part 3: Single vision presbyopia spectacles;
- Part 4: Multifocal and progressive presbyopic lenses.

This document replaces GB 13511.1-2011 "Fitting spectacles - Part 1: Single vision and multifocals" and is consistent with GB 13511.1-2011.

In addition to structural adjustments and editorial changes, the main technical changes are as follows.

- a) The scope has been changed (see Chapter 1, Chapter 1 of the 2011 edition);
- b) The terms and definitions have been changed (see Chapter 3, Chapter 3 of the 2011 edition);
- c) Added requirements for the axial direction of the cylindrical lens when the absolute value of the cylindrical lens vertex power is $0.12\text{m}^{-1}\sim 0.25\text{m}^{-1}$ (see 4.2);
- d) Added the position requirements for fixed-point single-focus lenses (see 4.4);
- e) The requirements for assembly quality have been changed (see 4.10, 5.8 of the 2011 edition);
- f) Added the requirement for permanent marking of fixed-point single-vision lenses (see Chapter 6);
- g) The relevant requirements for presbyopic spectacles have been deleted [see 5.6.6~5.6.9 and 7.1c), 7.2b) of the 2011 edition].

This document is modified to adopt ISO 21987:2017 "Ophthalmic optics - Complete eyeglass lenses".

Compared with ISO 21987:2017, this document has many structural adjustments. The

structural number changes between the two documents are shown in the table below.

See Appendix A.

The technical differences between this document and ISO 21987:2017 and their reasons are as follows.

--- Added applicable conditions (see Chapter 1) to adapt to the standard system of GB/T 13511;

--- Removed normative references to ISO 7944, ISO 8429, ISO 8598-1, ISO 8624, ISO 8980.2 and ISO 14889 (See Chapter 3, 5.2, 5.3.1, 5.3.3, 5.3.6, 6.5, and Chapter 8 of ISO 21987) to adapt to my country's standard system;

--- Replaced ISO 8980.1 (see Chapter 3, 4.9.1, 5.10.1, 5.11) with the normative reference GB/T 10810.1 to adapt to our the technical conditions of the country and increase operability;

--- ISO 13666 (see Chapter 3) has been replaced by the normative reference GB/T 26397 to adapt to my country's technical conditions and increase the Operability;

--- Added normative references to GB/T 14214 (see 4.9.2, 5.10.2) to adapt to my country's technical conditions and increase operability;

--- Added normative references to GB 45184 (see 4.5.2, 4.8, 5.2, 5.6.2, 5.9) to adapt to my country's technical conditions and increase the Operability;

--- Added normative references to GB 45185 (see 4.1, 4.2, 4.4, 5.3, 5.5, 5.9) to adapt to my country's technical conditions and increase the Operability;

--- Changed the terms and definitions (see Chapter 3, see Chapter 3 of ISO 21987:2017) to adapt to my country's technical conditions and increase the Operability;

--- Deleted the general rules for classification, manufacturing of complete eyeglass lenses and optical requirements (see Chapter 4, 5.2, 5.3.1) to adapt to my country's standard system;

--- Deleted the horizontal prism deviation diagram and vertical prism deviation diagram (see Figure 1 and Figure 2 of ISO 21987:2017).

As Figures 1 and 2 are consistent with the requirements of Table 2 of this document, no graphical representation is required;

---Deleted the deviation of the vertex power of the main reference point of the progressive focus lens, the prism power requirements of progressive focus glasses, and the axial deviation of the polarized lens and non-permanent markings (see Table 2, 5.3.6, 5.6, 7.2 of ISO 21987:2017) to adapt to my country's standard system;

--- Changed the lens reference point thickness requirements (see 4.6, 5.4 of ISO

21987:2017) to adapt to my country's technical conditions;

--- Added light transmittance requirements (see 4.8) to adapt to my country's technical conditions;

--- Changed the assembly quality requirements (see 4.10, Chapter 8 of ISO 21987:2017) to adapt to my country's technical conditions;

--- Changed the marking and packaging (see Chapter 7, Chapter 9 of ISO 21987:2017) to adapt to my country's technical conditions;

--- Deleted the reference to this standard (see Chapter 10 of ISO 21987:2017) to adapt to my country's technical conditions.

The following editorial changes were made to this document.

--- To be consistent with my country's technical standard system, the name of the standard is changed to "Fitting spectacles - Part 1: Single-focal and multifocal prescription spectacles";

--- Deleted the informative Appendix C.

Introduction

Fitted glasses include custom-made glasses and presbyopia glasses, which are suitable for vision correction of people with various refractive errors or presbyopia.

The purpose of GB/T 13511 "Fitting glasses" is to standardize the fitting of glasses.

Production and use, improve the quality and safety of fitted glasses, and protect the vision health of consumers.

GB/T 13511, as a recommended national standard supporting the mandatory standards, consists of four parts.

--- Part 1: Single-focus and multifocal prescription glasses. The purpose is to ensure the quality and safety of single-focus and multifocal prescription glasses and to improve Work level.

--- Part 2: Progressive focus custom-made spectacles. The purpose is to ensure the quality and safety of progressive focus custom-made spectacles and improve the processing level.

--- Part 3: Single-vision presbyopia spectacles. The purpose is to improve the product quality of single-vision presbyopia spectacles and protect the visual health and Safe to use.

--- Part 4: Multifocal and progressive presbyopia lenses. The purpose is to improve the product quality of multifocal and progressive presbyopia lenses and ensure the quality of presbyopia lenses.

The visual health and safety of use of the elderly.