Aerospace series - Titanium and titanium alloys - Technical specification - Part 002: Bar and section

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NATIONAL FOREWORD

Käesolev Eesti standard EVS-EN 4800-002:2010 sisaldab Euroopa standardi EN 4800-002:2010 ingliskeelset teksti.	This Estonian standard EVS-EN 4800-002:2010 consists of the English text of the European standard EN 4800-002:2010.
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Aerospace series - Titanium and titanium alloys - Technical specification - Part 002: Bar and section

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Luft- und Raumfahrt - Titan und Titanlegierungen Kneterzeugnisse - Technische Lieferbedingungen - Teil 002: Stangen und Profile

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EUROPEAN COMMITTEE FOR STANDARDIZATION
COMITÉ EUROPÉEN DE NORMALISATION
EUROPÄISCHES KOMITEE FÜR NORMUNG

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Foreword

This document (EN 4800-002:2010) has been prepared by the Aerospace and Defence Industries Association of Europe - Standardization (ASD-STAN).

After enquiries and votes carried out in accordance with the rules of this Association, this Standard has received the approval of the National Associations and the Official Services of the member countries of ASD, prior to its presentation to CEN.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by May 2011, and conflicting national standards shall be withdrawn at the latest by May 2011.

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Introduction

This standard is part of the series of EN metallic material standards for aerospace applications. The general organization of this series is described in EN 4258.

1 Scope

This standard defines the requirements for the ordering, manufacture, testing, inspection and delivery of titanium and titanium alloy bar and section. It shall be applied when referred to and in conjunction with the EN material standard unless otherwise specified on the drawing, order or inspection schedule.

2 Normative references

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

EN 2002-001*, Aerospace series — Metallic materials — Test methods — Part 001: Tensile testing at ambient temperature*

EN 2002-002, *Aerospace series — Metallic materials — Test methods — Part 002: Tensile testing at elevated temperature*

EN 2002-005, *Aerospace series — Test methods for metallic materials — Part 005: Uninterrupted creep and stress-rupture testing*

EN 2002-16, *Aerospace series — Metallic materials — Test methods — Part 16: Non-destructive testing — Penetrant testing* [1)]

EN 2032-1, *Aerospace series — Metallic materials — Part 1: Conventional designation*

EN 2032-2, *Aerospace series — Metallic materials — Part 2: Coding of metallurgical condition in delivery condition*

EN 2078, *Aerospace series — Metallic materials — Manufacturing schedule, inspection schedule, inspection and test report — Definition, general principles, preparation and approval*

EN 2954-002, *Aerospace series — Macrostructure of titanium and titanium alloy wrought products — Part 002: Macrostructure of bar, section, forging stock and forgings*

EN 2955, *Aerospace series — Recycling of titanium and titanium alloy scrap*

EN 3114-001, *Aerospace series — Test method — Microstructure of (α + β) titanium alloy wrought products — Part 001: General requirements*

EN 3114-002, *Aerospace series — Test method — Microstructure of (α + β) titanium alloy wrought products — Part 002: Microstructure of bars, sections, forging stock and forgings*

EN 3238*, Aerospace series — Metallic materials — Test method — Shear test for wires and rivets*

EN 3683, *Aerospace series — Test methods — Titanium alloy wrought products — Determination of primary α content — Point count method and line intercept method*

EN 3684, *Aerospace series — Test methods — Titanium alloy wrought products — Determination of β transus temperature — Metallographic method*

EN 3874, *Aerospace series — Test method for metallic materials — Constant amplitude force-controlled low cycle fatigue testing* [1)]

1) In preparation at the date of publication of this standard.

EN 3976, *Aerospace series — Titanium and titanium alloys — Test method — Chemical analysis for the determination of hydrogen content*

EN 3987, *Aerospace series — Test methods for metallic materials — Constant amplitude force-controlled high cycle fatigue testing*

EN 3988, *Aerospace series — Test method for metallic materials — Constant amplitude strain-controlled low cycle fatigue testing* [2)]

EN 4050-1, *Aerospace series — Test method for metallic materials — Ultrasonic inspection of bars, plates, forging stock and forgings — Part 1: General requirement* [2)]

EN 4050-4, *Aerospace series — Test method for metallic materials — Ultrasonic inspection of bars, plates, forging stock and forgings — Part 4: Acceptance criteria* [2)]

EN 4258, *Aerospace series — Metallic materials — General organization of standardization — Links between types of EN standards and their use*

EN 4259, *Aerospace series — Metallic materials — Definition of general terms* [2)]

EN 9100*, Quality Management Systems — Requirements for Aviation, Space and Defense Organizations*

EN 9133*, Aerospace series — Quality management systems — Qualification procedure for aerospace standard parts*

EN ISO 643, *Steels — Micrographic determination of the apparent grain size (ISO 643:2003)*

EN ISO 4288, *Geometrical product specifications (GPS) — Surface texture: Profile method — Rules and procedures for the assessment of surface texture (ISO 4288:1996)*

EN ISO 6892-1, *Metallic materials — Tensile testing — Part 1: Method of test at room temperature (ISO 6892-1:2009)*

prEN ISO 6892-2, *Metallic materials — Tensile testing — Part 2: Method of test at elevated temperature (ISO/DIS 6892-2:2009)*

TR 2410, *Aerospace series — Metallic materials — Relationship between dimensional standards and material standards* [3)]

AMS 2750, *Pyrometry* [4)]

ASTM E 399, *Standard test method for linear-elastic plane-strain fracture toughness k/c of metallic materials* [4)]

2) In preparation at the date of publication of this standard.

3) Published as ASD-STAN Technical Report at the date of publication of this standard.

4) Published by: American Society for Testing and Materials (ASTM), 100 Barr Harbor Drive, PO Box C700, West Conshohocken, PA, 19428-2959 USA.