

For Comments Only

BUREAU OF INDIAN STANDARDS

DRAFT FOR COMMENTS ONLY

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भारतीय मानक मसौदा

एयरोस्पेस — नट, हेक्सागोनल, स्लॉटेड (कैस्टेलेटेड), सामान्य ऊंचाई, एमजे थ्रेड्स के साथ फ्लैटों में सामान्य, वर्गीकरण: 600 एमपीए (परिवेश तापमान पर)/120 डिग्री सेल्सियस, 600 एमपीए (परिवेश तापमान पर)/235 डिग्री सेल्सियस, 900 एमपीए (परिवेश तापमान पर)/425 डिग्री सेल्सियस, 1100 एमपीए (परिवेश तापमान पर)/235 डिग्री सेल्सियस, 1100 एमपीए (परिवेश तापमान पर)/315 डिग्री सेल्सियस, 1100 एमपीए (परिवेश तापमान पर)/650 डिग्री सेल्सियस, 1 210 MPa (परिवेश के तापमान पर)/730 डिग्री C, 1 250 MPa (परिवेश के तापमान पर)/235 डिग्री C और 1 550 MPa (परिवेश के तापमान पर)/600 डिग्री C — आयाम

(पहला पुनरीक्षण)

Draft Indian Standard

Aerospace — Nuts, hexagonal, slotted (castellated), normal height, normal across flats, with MJ threads, classifications: 600 MPa (at ambient temperature)/120 degrees C, 600 MPa (at ambient temperature)/235 degrees C, 900 MPa (at ambient temperature)/425 degrees C, 1 100 MPa (at ambient temperature)/235 degrees C, 1 100 MPa (at ambient temperature)/315 degrees C, 1 100 MPa (at ambient temperature)/650 degrees C, 1 210 MPa (at ambient temperature)/730 degrees C, 1 250 MPa (at ambient temperature)/235 degrees C and 1 550 MPa (at ambient temperature)/600 degrees C — Dimensions

(First Revision)

ICS: 49.030.30

Air and Space Vehicles Sectional Committee, TED 14

Last date for receipt of comments is
24/08/2024

NATIONAL FOREWORD

(Identical Clause to be added later)

This draft Indian Standard (First Revision) which is identical with ISO 4147:1997 ‘Aerospace — Nuts, hexagonal, slotted (castellated), normal height, normal across flats, with MJ threads, classifications: 600 MPa (at ambient temperature)/120 degrees C, 600 MPa (at ambient temperature)/235 degrees C, 900 MPa (at ambient temperature)/425 degrees C, 1 100 MPa (at ambient temperature)/235 degrees C, 1 100 MPa (at ambient temperature)/315 degrees C, 1

100 MPa (at ambient temperature)/650 degrees C, 1 210 MPa (at ambient temperature)/730 degrees C, 1 250 MPa (at ambient temperature)/235 degrees C and 1 550 MPa (at ambient temperature)/600 degrees C — Dimensions’ issued by the International Organization for Standardization (ISO) will be adopted by the Bureau of Indian Standards on the recommendations of the Air and Space Vehicles Sectional Committee and approval of the Transport Engineering Division Council.

This draft standard was originally published in 1986. The first revision of this standard has been undertaken to keep pace with the latest technological developments and align it with the latest version of ISO 4147: 1997.

The text of ISO standard is proposed for publication as an Indian Standard without deviations. Certain terminologies and conventions are, however, not identical to those used in Indian Standards. Attention is particularly drawn to the following:

- a) Wherever the words ‘International Standard’ appear referring to this standard, they should be read as ‘Indian Standard’.
- b) Comma (,) has been used as a decimal marker, while in Indian Standards, the current practice is to use a point (.) as the decimal marker.

In this adopted standard, reference appears to certain International Standards for which Indian Standards also exist. The corresponding Indian Standards, which are to be substituted in their respective places, are listed below along with their degree of equivalence for the editions indicated:

<i>International Standard</i>	<i>Corresponding Indian Standard</i>	<i>Degree of Equivalence</i>
ISO 1234 Split pins	IS 549 : 2005/ISO 1234 : 1997 Split pins - Specification (<i>third revision</i>)	Identical under dual numbering
ISO 5855-2 : 1988 Aerospace — MJ threads — Part 2 Limit dimensions for bolts and nuts.	IS 10980 (Part 2) : 2014/ISO 5855-2 : 1999 Aerospace — MJ threads — Part 2 limit dimensions for bolts and nuts (<i>first revision</i>)	Identical under dual numbering
ISO 8788 : 1987 Aerospace — Fasteners — Tolerances of form and position for nuts	IS 15192 : 2002 Aerospace — Nuts — Tolerances of form and position	Modified/Technically Equivalent

The technical committee has reviewed the provisions of following International Standard referred in this adopted standard and has decided that it is acceptable for use in conjunction with this standard:

<i>International Standard</i>	<i>Title</i>
ISO 9139	Aerospace — Nuts, plain or slotted (castellated) — Procurement specification.

Attention is drawn to the possibility that some of the elements of this standard may be the subject of patent rights. The Bureau of Indian Standards shall not be held responsible for identifying any or all such patent rights.

This Standard also makes a reference to the BIS Certification Marking of the Product. Details of which is given in National Annex A.

For the purpose of deciding whether a particular requirement of this standard is complied with, the final value, observed or calculated, expressing the result of a test or analysis, shall be rounded off in accordance with IS 2 : 2022 ‘Rules for rounding off numerical values (*second revision*)’. The number of significant places retained in the rounded off value should be the same as that of the specified value in this standard.

SCOPE

This International Standard specifies the dimensions of hexagon slotted (castellated) nuts, normal height, normal across flats, with MJ threads, of classifications: 600 MPa/120 °C, 600 MPa/235 °C, 900 MPa/425 °C, 1100 MPa/235 °C, 1100 MPa/315 °C, 1100 MPa/650 °C, 1210 MPa/730 °C, 1 250 MPa/235 °C and 1550 MPa/600 °C.

These nuts are intended to be used with split pins in conformity with ISO 1234.

This International Standard is only applicable for the compilation of aerospace product standards.

FOR COMPLETE TEXT OF THE DOCUMENT KINDLY REFER ISO 4147: 1997 or CONTACT:

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NATIONAL ANNEX A

(National Foreword)

A-1 BIS CERTIFICATION MARKING

A-1.1 The product(s) conforming to the requirements of this standard may be certified as per the conformity assessment schemes under the provisions of the *Bureau of Indian Standards Act, 2016* and the Rules and Regulations framed thereunder, and the products may be marked with the Standard Mark