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भारतीय मानक मसौदा
सर्जरी के लिए प्रत्यारोपण - घुटने के संपूर्ण कृत्रिम अंग का
घिसाव
भाग 5: पेटेलोफेमोरल जोड़ का टिकाव

Draft Indian Standard

Implants for Surgery — Wear of Total Knee
Prostheses
Part 5: Durability Performance of the Patellofemoral Joint

ICS 11.040.40

Orthopaedic Instruments, Implants and
Accessories Sectional Committee, MHD 02

Last date for comments: **18 July 2024**

NATIONAL FOREWORD

(Adoption clause will be added later)

The text of ISO Standard has been approved as suitable 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:

- Wherever the words 'International Standard' appear referring to this standard, they should be read as 'Indian Standard'.
- 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 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 5833, Implants for surgery — Acrylic resin cements | IS 8641 : 2015 ISO 5833 : 2002 Implants for surgery - Acrylic resin cements (Third Revision) | Identical |
| ISO 7207-1, Implants for surgery — Components for partial and total knee joint prostheses — Part 1: Classification, definitions and designation of dimensions | IS 12376 (Part 1) : 2015 ISO 7207-1 : 2007 Implants for surgery - Components for partial and total knee joint prostheses: Part 1 classification, definitions and designation of dimensions (Second Revision) | Identical |
| ISO 14243-1, Implants for surgery — Wear of total knee-joint prostheses — Part 1: Loading and displacement parameters for wear-testing machines with load control and corresponding environmental conditions for test | IS 18075 (Part 1) : 2023 ISO 14243-1:2009 Implants for surgery – Wear of total knee-joint prostheses – Part 1: Loading and displacement parameters for wear-testing machines with load control and corresponding environmental conditions for test | Identical |
| ISO 14243-2, Implants for surgery — Wear of total knee-joint prostheses — Part 2: Methods of measurement | IS 18075 (Part 2) : 2023 ISO 14243-2: 2016 Implants for surgery – Wear of total knee-joint prostheses – Part 2: Methods of measurement | Identical |
| ISO 14243-3, Implants for surgery — Wear of total knee-joint prostheses — Part 3: Loading and displacement parameters for wear-testing machines with displacement control and corresponding environmental conditions for test | IS 18075 (Part 3) : 2023 ISO 14243-3:2014 Implants for surgery Wear of total knee-joint prostheses Part 3 Loading and displacement parameters for wear-testing machines with displacement control and corresponding environmental conditions for test | Identical |

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)’.

Note: The technical content of the document has not been included as it is identical with the corresponding ISO standard. For details, please refer to ISO 14243-5: 2019 or kindly contact:

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SCOPE

This document specifies the relative angular movement between articulating patellofemoral joint components, the pattern of the applied force, speed and duration of testing, sample configuration and test environment to be used for the durability testing of total knee-joint prostheses in wear-testing machines with load control and displacement.