

JAPANESE INDUSTRIAL STANDARD

Translated and Published by Japanese Standards Association

 $JIS\ H\ 5202^{:2010}$

(JAA/JSA)

Aluminium alloy castings

ICS 77.150.10

Reference number: JIS H 5202: 2010 (E)

H 5202: 2010

Date of Establishment: 1955-10-07

Date of Revision: 2010-03-23

Date of Public Notice in Official Gazette: 2010-03-23

Investigated by: Japanese Industrial Standards Committee

Standards Board

Technical Committee on Non-Ferrous Metals

JIS H 5202 : 2010, First English edition published in 2010-12

Translated and published by: Japanese Standards Association 4-1-24, Akasaka, Minato-ku, Tokyo, 107-8440 JAPAN

In the event of any doubts arising as to the contents, the original JIS is to be the final authority.

© JSA 2010

All rights reserved. Unless otherwise specified, no part of this publication may be reproduced or utilized in any form or by any means, electronic or mechanical, including photocopying and microfilm, without permission in writing from the publisher.

Printed in Japan KA/HN

Contents

| | | Page | , |
|------------------------|--|---|---|
| Intro | duction ····· | 1 | |
| 1 | Scope ····· | 1 | |
| 2 | Normative referen | ces ······1 | |
| 3 | Classification and | symbols ·····3 | |
| 4 4.1 4.2 4.3 | Quality of castings Chemical composit | ion | |
| 5 | Shape and dimens | ions14 | |
| 6 6.1 6.2 6.3 | Chemical analysis Tensile test ······· | 14 | |
| 7 | Inspection ······· | 16 | |
| 8 | Repair on castings | 16 | |
| 9 | General matters of delivery ······16 | | |
| 10 | Markings ······ | 16 | |
| Anne | x JA (informative) | International Standard aluminium alloy castings that are approximate to JIS alluminium alloy castings | |
| Annex JB (informative) | | Comparison table between JIS and the corresponding International Standard23 | |

H 5202:2010

Foreword

This translation has been made based on the original Japanese Industrial Standard revised by the Minister of Economy, Trade and Industry, through deliberations at the Japanese Industrial Standards Committee as the result of proposal of revision of Japanese Industrial Standard submitted by Japan Aluminium Association (JAA)/Japanese Standards Association (JSA) with the draft being attached, based on the provision of Article 12 Clause 1 of the Industrial Standardization Law applicable to the case of revision by the provision of Article 14.

Consequently JIS H 5202:1999 has been replaced with this Standard.

This JIS document is protected by the Copyright Law.

Attention is drawn to the possibility that some parts of this Standard may conflict with a patent right, application for a patent after opening to the public, utility model right or application for registration of utility model after opening to the public which have technical properties. The relevant Minister and the Japanese Industrial Standards Committee are not responsible for identifying the patent right, application for a patent after opening to the public, utility model right or application for registration of utility model after opening to the public which have the said technical properties.

Aluminium alloy castings

JIS H 5202: 2010

Introduction

This Japanese Industrial Standard has been prepared based on the fourth edition of ISO 3522 published in 2007. While adopting the corresponding parts from the said International Standard without modifying any technical contents, this Standard also consists of preserved contents from the previous edition of JIS H 5202, which has conventionally and widely used.

Consequently, this Standard consists of the specifications of the aluminium alloy castings of all the types given in **ISO 3522**, excluding die-cast alloys, as well as those of the types given in the previous edition of **JIS H 5202**, all of which are classified by respective symbols. The portions with continuous sidelines or dotted underlines are the matters in which the contents of the corresponding International Standard have been modified. A list of modifications with the explanations is given in Annex JB.

1 Scope

This Standard specifies aluminum alloy castings, such as permanent mould castings and sand castings (hereafter referred to as the "castings").

NOTE: The International Standard corresponding to this Standard and the symbol of degree of correspondence are as follows:

ISO 3522: 2007 Aluminium and aluminium alloys — Castings — Chemical composition and mechanical properties (MOD)

The symbols which denote the degree of correspondence in the contents in the corresponding International Standard and **JIS** are IDT (identical), MOD (modified) and NEQ (not equivalent) according to **ISO/IEC Guide 21-1**.

2 Normative references

The following standards contain provisions which, through reference in this text, constitute provisions of this Standard. The most recent editions of the standards (including amendments) indicated below shall be applied.

| JIS B 0403 | Castings — System of dimensional tolerances and machining allowances |
|------------|--|
| JIS H 0001 | Aluminium, magnesium and their alloys — Temper designation |
| JIS H 0321 | General rules for inspection of non-ferrous metal materials |
| JIS H 1305 | Method for optical emission spectrochemical analysis of aluminium |