

JAPANESE
INDUSTRIAL
STANDARD

Translated and Published by
Japanese Standards Association

JIS C 7525 : 2009

(JELMA/JSA)

Reflector incandescent lamps

ICS 29.140.20

Reference number : JIS C 7525 : 2009 (E)

PROTECTED BY COPYRIGHT

Date of Establishment: 1964-03-01

Data of Revision: 2009-06-20

Date of Public Notice in Official Gazette: 2009-06-22

Investigated by: Japanese Industrial Standards Committee

Standards Board

Technical Committee on Electricity Technology

JIS C 7525 : 2009, First English edition published in 2010-01

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

PROTECTED BY COPYRIGHT

Contents

	Page
Introduction	1
1 Scope	1
2 Normative references	1
3 Terms and definitions	2
4 Type designation	3
5 Type designation and data sheet of lamp	3
6 Dimensions and performance	3
6.1 General matter	3
6.2 Dimensions	4
6.3 Performance	4
7 Tests	4
8 Inspections	4
8.1 Type inspection	4
8.2 Lot inspection	5
9 Designation and marking of product	6
9.1 Designation of product	6
9.2 Marking	6
Annex A (normative) Test methods	15
Annex B (informative) Maximum outline dimensions of lamps	17

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 for revision of Japanese Industrial Standard submitted by Japan Electric Lamp Manufacturers Association (JELMA)/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 C 7525 : 2003** is 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.

Reflector incandescent lamps

Introduction

This Japanese Industrial Standard was established in 1964 and has gone through 4 revisions to this day. The last revision was made in 2003. This time the normative references have been reviewed and the content, the composition and the wording, etc. have been revised over the entire standard.

Further, no International Standard corresponding to this Standard has been established at this point.

1 Scope

This Standard specifies reflector incandescent lamps (hereafter referred to as “lamps”) which comply with the requirements specified in JIS C 7551-1 and also satisfy the following conditions :

Rated power consumption 40 W or over up to and including 200 W

Rated voltage 100 V

Shape of glass bulb Type R

In addition, the shape and name of glass bulb are in accordance with JIS C 7710.

Cap E26/25

In addition, the type and dimensions of cap are in accordance with JIS C 7709-1.

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 7507 *Vernier, dial and digital callipers*

JIS C 7551-1 *Incandescent lamps — Safety specifications — Part 1 : Tungsten filament lamps for domestic and similar general lighting purposes*

JIS C 7709-1 *Lamp caps and holders together with gauges for the control of interchangeability and safety — Part 1 : Lamp caps*

JIS C 7709-3 *Lamp caps and holders together with gauges for the control of interchangeability and safety — Part 3 : Gauges*

JIS C 7710 *Designation method for glass bulbs of lamps*

JIS C 7801 *Measuring methods of lamps for general lighting*

JIS Z 8113 *Lighting vocabulary*

3 Terms and definitions

For the purpose of this Standard, the main terms and definitions given in **JIS Z 8113** and the following apply.

3.1 rated voltage

voltage or voltage range specified by related standards, or specified by the manufacturer or the responsible dealer

3.2 rated wattage

power consumption specified by related standards, or specified by the manufacturer or the responsible dealer

3.3 initial luminous flux

the total luminous flux at the rated voltage after ageing

3.4 maximum luminous intensity

the maximum luminous intensity in the light distribution of a lamp

3.5 beam spread

the angle made by two directions where the relative value of luminous intensity on the polar coordinate on the plain specified for the luminous intensity distribution characteristic of a lamp, takes 50 % of the maximum luminous intensity

3.6 beam flux

the luminous flux existing within the beam spread with the light centre of the luminous intensity distribution of a lamp being the apex

3.7 lumen maintenance

the percentage ratio of the total luminous flux after operation of the specified hours to the initial luminous flux

3.8 life

the operating hours until the filament breaks

3.9 rated life

the hours officially announced based on the mean value of the lives of the same type lamps manufactured for a long period of time

3.10 maximum lamp outline

space to be secured by a lamp fitting in order to guarantee fitting of an incandescent lamp

4 Type designation

The type designation is shown by item 1 to item 5 from the following :

Item 1	Item 2	Item 3	Item 4	Item 5
Symbol denoting lamp	Symbol denoting beam spread	Numeral and symbol denoting rated voltage	Numeral and symbol denoting rated wattage	Symbol denoting material of glass bulb
R	F : lamps with a beam spread of 35° or more	100 V	40 W 60 W 90 W 100 W 135 W 150 W 180 W 200 W	No mark : lamps of soft glass (mainly for indoor use) H : lamps of hard glass (mainly for outdoor use)

Symbols and numerals denoting further identification may be added to the end of this type designation.

5 Type designation and data sheet of lamp

The type designation of lamp and the data sheet number by which the lamp is specified shall be as stated in table 1.

Table 1 Type designation and data sheet number

Type designation	Data sheet number
RF100V40W	C 7525-JIS-2500J-1
RF100V60W	C 7525-JIS-2510J-1
RF100V100W	C 7525-JIS-2520J-1
RF100V150W	C 7525-JIS-2530J-1
RF100V200W	C 7525-JIS-2540J-1
RF100V90WH	C 7525-JIS-2550J-1
RF100V135WH	C 7525-JIS-2560J-1
RF100V180WH	C 7525-JIS-2570J-1

6 Dimensions and performance

6.1 General matter

The incandescent lamp specified in this Standard shall conform to the requirements in JIS C 7551-1 which is a related safety standard. The incandescent lamp shall be designed so that its performance is reliable when it is used usually and normally. Generally, this can be achieved by satisfying the following requirements.

6.2 Dimensions

The dimensions, when the test is performed in accordance with Annex A, shall be as given in figure 1 and data sheet. Furthermore, the maximum lamp outline required for the design of luminaires shall be in accordance with Annex B.

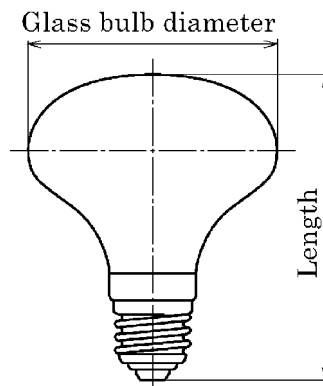


Figure 1 Dimensions of lamp

6.3 Performances

The performances shall be as follows :

- a) **Initial characteristics** When the tests are carried out in accordance with Annex A, the initial characteristics shall be such that the maximum luminous intensity and the beam flux shall be not less than 80 % of those specified in the data sheet. However, they shall be not less than 75 % for white coated lamps. The wattage shall not exceed 104 % of the rated wattage specified in the data sheet plus 0.5 W.
- b) **Life** When the test is carried out in accordance with Annex A, the life shall be such that the individual value is not less than 70 % of, and the mean value is not less than 96 % of the rated life specified in the data sheet.
- c) **Lumen maintenance** ¹⁾ The lumen maintenance, the total luminous flux is measured after lighting for 75 % of the rated life in accordance with Annex A and the ratio to initial luminous flux is obtained, the lumen maintenance so obtained shall be not less than the value specified in the data sheet.

Note ¹⁾ Since this Standard does not specify initial luminous flux, the lumen maintenance is informative.

7 Tests

The test conditions and test methods shall be as stated in Annex A.

8 Inspections

8.1 Type inspection