

ICS 29.140.30

CCS K 71



**NATIONAL STANDARD OF THE
PEOPLE'S REPUBLIC OF CHINA**

GB/T 21093-2007

**High-pressure mercury vapour lamps -- Performance
specifications**

高压汞灯 性能要求

(English Translation)

Issued on: September 5, 2007

Implemented on: May 1, 2008

**Issued by: General Administration of Quality Supervision, Inspection and
Quarantine of the People's Republic of China, Standardization
Administration of the People's Republic of China**

Table of Contents

Preface

1 Overview

2 Parameter Table

Appendix A (Normative) Lamps and temperature rise characteristics of the measurement method

Foreword

This standard corresponds to IEC 60188.:2001 "high-pressure mercury lamp performance requirements" (in English). This standard and one of IEC 60188.:2001 the degree of concordance is not equivalent.

This standard according to IEC 60188.:2001 "high-pressure mercury lamp performance requirements" redrafted, on this basis, combined with our country in recent years, high-pressure mercury the actual development of light and enacted.

The main content of this standard is revised in accordance with IEC 60188, in order to adapt to China's national conditions, the main differences are as follows.

1) Normative references.

--- GB/T 2900.65-2004 "Electrotechnical terminology lighting" instead of IEC 60050 (845) "International Electrotechnical Vocabulary (IEV) 845 Chapter. Lighting ";

--- GB 19652-2005 "discharge lamps (except fluorescent lamps) safety requirements" instead of IEC 62035 "discharge lamps (except fluorescent lamps) safety Claim";

--- GB/T 15042-2005 "Lamp accessories discharge lamps (except fluorescent lamps) with ballast performance requirements" instead of IEC 60923 "release Light ballasts (except fluorescent) performance requirements ";

--- Added GB/T 2828.1-2003 "Sampling procedures for the first part of the inspection by the reception quality limit (AQL) to retrieve the batch Inspection sampling plan "and GB/T 2829-2002" periodic inspection sampling procedures and tables (applicable to the stability of the test Test); "

--- Added GB/T 191-2000 "logo packaging transport and storage."

2) The following definition of 1.3 is added.

1.3.13 Individual life;

1.3.14 Average life expectancy averagelife;

1.3.15 lumenmaintenance lumen maintenance.

3) The classification and nomenclature added in 1.4 and the size of the lamp were checked with calipers. Lamp on the finished lamp with a standard amount Regulations for inspection. The initial value of the red ratio of the lamp is to be not less than 8% (this value is the recommended value and the IEC standard is undetermined).

4) Increased life characteristics and safety requirements.

5) Added light parameters to the lamp's parameter list.

6) Added "Inspection Rules" (Appendix D).

7) Added "Marking, Packaging, Transport and Storage" (Appendix E).

Need to explain a few questions.

1) The basis for the development of the technical parameters of the standard and level.

Since the IEC 60188 standard only specifies the electrical parameters of the lamp and the ballast, and the optical parameters, life parameters in the IEC standard does not the provisions of this standard in the non-equivalent based on the use of IEC 60188, with reference to several major international manufacturers of high-pressure mercury lamp product samples, Product-like real data as well as the major domestic manufacturers of high-pressure mercury lamp business standards, developed in this standard of technical indicators.

2) Electrical parameters. In accordance with the provisions of IEC 60188.

3) Optical parameters. Ratings and limits are based on China's major manufacturers to determine business standards.

4) Life. According to the international main high-pressure mercury lamp manufacturers sample data and China's major manufacturers to determine the level of business standards all life expectancy, individual life, lumen maintenance.

5) Dimensions. consistent with the provisions of IEC 60188.

6) As 700W and.2000W specifications of the lamp so far has not been consulted to the relevant manufacturer's information in the lamp parameter table in the parameters for these two specifications of the lamp is undecided.

This standard Appendix A, Appendix B, Appendix C, Appendix D, Appendix E, Appendix F is a normative appendix.

From the date of implementation of this standard, QB/T 2051-1994 "fluorescent high-pressure mercury lamp" abolished at the same time.

This standard proposed by the China Light Industry Federation.

This standard by the National Lighting Standardization Technical Committee (SAC/TC224) centralized.

This standard was drafted. Philips Lighting Co., Ltd. Yaming, Osram (China) Lighting Co., Ltd., Beijing Institute of Light Sources, the state Electric Light Source Quality Supervision and Inspection Center (Beijing).

1.1 Scope

This standard specifies the performance requirements of high-pressure mercury lamp for lighting (with fluorescent coating and transparent bulb).

Some of the requirements of this standard, see "related lamp parameter table." This standard gives part of the lamp parameters table, not included in the standard but other lamps falling within the scope of this standard, the relevant parameters are provided by the lamp manufacturer or distributor.

The requirements of this standard only involves type testing.

Note: The requirements of this standard and tolerances are consistent with the type test samples submitted by the manufacturer. In principle, this type of test sample the product should consist of a set of samples typical of the product the manufacturer has and should be as close as possible to the center of the product.

It can be said that the tolerances given in this standard and in accordance with the type test samples produced by most of the products will meet this standard. However, due to production Discrepancy, it is inevitable that there will be times when the product exceeds the specified tolerance. Guidance notes on sampling methods and testing in accordance with characteristics See IEC 60410.

1.2 Normative references

The following documents contain provisions which, through reference in this standard and become the standard terms. All dated references, which are subsequently owned Amendments (not including errata content) or revisions do not apply to this standard, however, encourage the parties to reach an agreement based on this standard research Whether you can use the latest versions of these files. For undated references, the latest version applies to this standard.

GB/T 191 Packaging - Pictorial signs (GB/T 191-2000, eqv ISO 780.:1997) GB/T 2828.1 Sampling procedures for inspection - Part 1. Batch inspection sampling plan by acceptance quality limit (AQL) (GB/T 2828.1-2003, ISO 2859-1.:1999, IDT) GB/T 2829-2002 periodic inspection count sampling procedures and tables (for the stability of the test process) GB/T 2900.65-2004 Electrotechnical terminology lighting [IEC 60050 (845). 1987, MOD] GB/T

15042 lamp accessories discharge lamps (except fluorescent tube fluorescent lamps) with ballast performance requirements (GB/T 15042-2005, IEC 60923.:2001, IDT) GB 19652-2005 discharge lamps (except fluorescent lamps) safety requirements (IEC 62035.:1999 + Revision 1, IDT) QB2274 light source product classification and model nomenclature Lamp caps and test gauges for the detection of safety and interchangeability - Part 1. Lamp caps

1.3 Terms and definitions

GB/T 2900.65-2004 identified and the following terms and definitions apply to this standard.

1.3.1

The main light from the partial pressure of more than 105Pa mercury vapor radiation, directly or indirectly generated by a high-intensity discharge lamp. [GB/T 2900.65-2004, Definition 845-07-20] Note. The term applies to both transparent and fluorescent coated fluorescent mercury lamps and self-ballasted mercury lamps. For fluorescent mercury lamps, part of the light is discharged from the tube by UV radiation Shot excited phosphor produced, some of the light is generated by the mercury vapor.

1.3.2

The approximate amount used to identify or identify a lamp.