

**JB**

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

**JB/T 10394.2-2002**

---

**General technical requirements for painting equipment - Part 2:  
Weldments**

涂装设备通用技术条件 第2部分：焊接件

**(English Translation)**

**Issued on: December 27, 2002**

**Implemented on: April 1, 2003**

---

**Issued by: Ministry of Industry and Information Technology of the  
People's Republic of China**

## Table of Contents

Foreword I

1 Scope

2 Normative References

3 Terms and Definitions

4 General Requirements

5 Parent Metal of Weldment

6 Cutting

7 Sizing and Edge Processing of Steels

8 Forming and Bending of Steels

9 Welding Material

10 Welding

10.1 Preparation before Welding

10.2 Pre-heating before Welding

10.3 Welding

11 Welds

12 Inspection

13 Marking, Packaging, Transport and Storage

13.1 Marking

13.2 Packaging

13.3 Transport and Storage

Figure 1 Dislocation e of Cylinder Suture

Figure 2 Outside Diameter and Bending Radius of Pipes

Figure 3 Plate Splicing

Figure 4 Groove Type for Plate Splicing

Figure 5 Splicing Type of Profiles

Figure 6 Nominal Dimension of Angle and Its Reference Point

Table 1 Dimensional Deviation of Materials mm

Table 2 Geometric Tolerance of Sized Steels mm

Table 3 Dimension Allowance of Bent and Sized Cylinder mm

Table 4 Pre-heating of Common Steels before Welding

Table 5 Allowable Deviation for Welded Connection and Assembly

Table 6 Tolerance for Straightness, Flatness and Parallelism of Weldment mm

Table 7 Dimension Limit Deviation for the Length with Unnoted Tolerance mm

Table 8 Limit Deviation for the Angle with Unnoted Tolerance mm

Table 9 Accuracy Grades of Dimension, Angle and Geometric Tolerance of Welding Structural Member

## 1 Scope

This part specifies technical requirements, testing method, marking, packaging, transport and storage of painting equipment weldment.

This standard is applicable to painting equipment weldment made of carbon steel, common low-alloy structural steel, heat resistant steel and stainless steel in manual or automatic arc welding, gas shielded welding and gas welding.

This standard is not applicable to pressure vessels.

## 2 Normative References

The following normative documents contain provisions which, through reference in this part of JB/T 10394, constitute provisions of this part. For dated references, subsequent amendments to (excluding correction to), or revisions of, any of these publications are not applicable to this part. However, the parties who enter into agreement according to this part are encouraged to research whether the latest editions of these documents may be applied or not. For undated references, their latest editions are applicable to this part.

GB/T 324-1988 "Welds - Symbolic Representation on Drawings" (eqv ISO 2553: 1984)

GB/T 983-1995 "Stainless Steel Covered Electrodes" (neq ANSI/AWS A5.4: 1992)

GB/T 985-1988 "Basic Forms and Sizes of Weld Grooves for Gas Welding, Manual arc Welding and Gas-shielded Arc Welding"

GB/T 3375 "Welding Terminology"

GB/T 5117-1995 "Carbon Steel Covered Electrodes" (neq ANSI/AWS A5.1: 1991)

GB 50205-1995 "Code for Construction and Acceptance of Steel Structure Engineering"

GB 50236-1998 "Code for Construction and Acceptance of Field Equipment, Industrial Pipe Welding Engineering"

JB/T 5000.3-1998 "Heavy Mechanical General Techniques and Standards - Weldment"

### **3 Terms and Definitions**

For the purpose of this part of JB/T 10394, the terms and definitions established in GB/T 3375 apply.

#### **4.1**

The weldment shall be manufactured in accordance with design drawing, technology document and this part.

#### **4.2**

The painting equipment project construction shall comply with this part and current relevant standards and regulations of the nation.

#### **4.3**

The welder engaged in the welding of painting equipment shall be tested and certificated before the operation of welding. The certificate shall be indicated with welding conditions and valid period. The welder shall be reassessed if he or she stops welding for over 6 months.