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

JC/T 864-2023

**Polymer Emulsion Architectural Waterproof Coating
(English Translation)**

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Foreword

This document was drafted in accordance with the rules provided in GB/T 1.1-2020 Directives

for Standardization - Part 1.Rules for the Structure and Drafting of Standardizing Documents.

This document serves as a replacement for JC/T 864-2008 Polymer Emulsion Architectural Waterproof Coating. In comparison with JC/T 864-2008, apart from structural adjustments and

editorial modifications, the main technical changes are as follows.

- a) The scope of the Standard is modified (see Chapter 1; Chapter 1 of Version 2008);
- b) The product classification is modified (see 4.1; 3.1 of Version 2008);
- c) The technical indicators of appearance are modified (see 5.1; 4.1 of Version 2008);
- d) The low-temperature flexibility item is deleted; the inspection items, technical indicators and test methods for "density, low-temperature elongation at break, tear strength, low-temperature bending properties (standard state, heat treatment, alkali treatment, acid treatment, artificial weathering aging), water resistance, bond strength (standard state, damp substrate), flammability, water absorption (optional), and limits for hazardous substances" are added; the test methods for tensile properties (standard

state, heat treatment, alkali treatment, acid treatment, artificial weathering aging) are modified; the time for heat treatment and artificial weathering aging is extended (see 5.2, 6.6, 6.10 ~ 6.12, 6.14, 6.16, 6.22 ~ 6.30; 4.2 and 5.4 of Version 2008);

e) The specimen preparation method is adjusted, and the coating thickness is modified from "1.2 mm ~ 1.5 mm" into " (1.5 ± 0.2) mm" (see 6.3; 5.4.2 of Version 2008);

f) The judgment rules are modified (see 7.4; 6.3 of Version 2008);

g) The marking, packaging, transportation and storage requirements are modified (see Chapter 8; Chapter 7 of Version 2008).

Please be noted that some contents in this document may involve patents. The issuing organization of this document assumes no responsibility for identifying patents.

This document was proposed by China Building Materials Federation.

This document shall be under the jurisdiction of National Technical Committee on Constructional Materials and Decorative Materials of Standardization Administration of China

(SAC/TC 195).

The responsible drafting organizations of this document. SRIBS Testing, Inspection and Certification Co., Ltd.; Shanghai Oriental Yuhong Waterproof Technology Co., Ltd.; Guangdong Batf New Materials Co., Ltd.; Zhejiang Kelson Chemical Co., Ltd.

Polymer Emulsion Architectural Waterproof Coating

1 Scope

This Standard specifies the classification and labeling, requirements, test methods, inspection

rules, as well as marking, packaging, transportation and storage of polymer emulsion architectural waterproof coating.

This document applies to all types of aqueous waterproofing coatings made primarily from synthetic polymer emulsions with the addition of other additives. The products described in this

document are applicable to architectural waterproofing projects in environments where water

immersion is not prolonged.

2 Normative References

The contents of the following documents constitute indispensable clauses of this document through the normative references in the text. In terms of dated references, only the version with

the specified date applies to this document. In terms of references without a specified date, the

latest version (including all the modifications) is applicable to this document.

GB/T 528 Rubber, Vulcanized or Thermoplastic - Determination of Tensile Stress-strain Properties

GB/T 529-2008 Rubber, Vulcanized or Thermoplastic - Determination of Tear Strength (trouser, angle and crescent test pieces)

GB/T 6750 Paints and Varnishes - Determination of Density - Pycnometer Method

GB 8624-2012 Classification for Burning Behavior of Building Materials and Products

GB/T 8626-2007 Test Method of Flammability for Building Materials

GB/T 16422.2 Plastics - Methods of Exposure to Laboratory Light Sources - Part 2.Xenon-arc

Lamps

GB/T 16777-2008 Test Methods for Building Waterproofing Coatings

GB/T 18244-2022 Test Methods for Weathering Resistance of Building Waterproof Materials

GB/T 23990-2009 Determination of the Contents of Benzene, Toluene, Ethylbenzene and Xylene in Coatings by Gas Chromatography

GB/T 23991 Determination of Soluble Harmful Elements Content of Coatings

GB/T 23993 Determination of Formaldehyde Content of Waterborne Coatings - Spectrophotometric Method with Acetylacetone

GB/T 30647 Determination of Harmful Elements Total Content of Coatings

GB/T 41078-2021 Test Methods for Harmful Substances in Building Waterproofing Materials

JC/T 2435-2018 Mono-component Liquid Applied Polyurea Waterproofing Coating

JC/T 2663-2022 Test Method for Water Absorption of Building Waterproofing Membrane

3 Terms and Definitions

This document does not contain any terms or definitions that require clarification.

4.1.1 Products are classified into general-purpose (T) and high-elasticity (G) types in

accordance with application requirements.

NOTE 1: the main raw materials for general-purpose products are generally emulsions (such as pure acrylic emulsion and styrene-butadiene emulsion) synthesized using traditional emulsion polymerization methods.

NOTE 2: the main raw materials for high-elasticity products are generally emulsions (such as aqueous polyurethane emulsion) synthesized using non-traditional emulsion polymerization methods.

4.1.2 Products are classified into exposed (E) and non-exposed (N) types in accordance with

whether they can be used in the open.

4.2 Labeling

Products are labeled in the order of product name, document No., product type, and whether

they can be used in the open.

EXAMPLE. high-elasticity polymer emulsion architectural waterproof coating conforming to this

document are labeled as.

Polymer emulsion architectural waterproof coating JC/T 864-2023 G E

5.3 Limits for Hazardous Substances

The limits for hazardous substances in the product shall comply with the provisions of Table 2.

Table 2 -- Limits for Hazardous Substances