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

GB 2679.2-1981

Replacing GB/T 2679.2-1995

**Sheet materials -- Determination of water vapour transmission
rate -- Gravimetric (Dish) method
(English Translation)**

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Foreword

This standard was drafted in accordance with GB/T 1.1-2009 given rules.

This standard replaces GB/T 2679.2-1995 "Paper and cardboard crease moisture permeability and moisture permeability measurement (disc method)", and GB/T 2679.2-the main technical changes compared to 1995 are as follows.

- Modify the standard name;
- Expanding the scope of the standard;
- Permeable cup inner diameter increases the accuracy requirements;
- Increasing the temperature and humidity constant temperature and humidity test equipment and conditions;
- Modified by the temperature $(38 \pm 0.5) ^\circ\text{C}$ to $(38 \pm 1) ^\circ\text{C}$;
- Increased use of blank samples;
- Modify the sample wax seal requirements;
- Modify the number of tests;
- Increasing the method of drawing moisture permeability calculated.

This revised standard adopts ISO 2528:1995 "sheet materials moisture permeability measured by weight (moisture-cup) Act." this standard and ISO 2528:1995 compared to the main technical differences are as follows.

--- On normative references, this standard has been adjusted technical differences, in order to adapt our technical conditions, the adjusted situation Focus is reflected in the status of Chapter 2, "Normative references", the specific adjustments are as follows.

- Modify with international standards of GB/T 450 instead of ISO 186;

- use equivalent to international standards of GB/T 10739 instead of ISO 187;
- Permeable cup different dimensions;
- Crease fold through different sample preparation methods and humidity;
- Modify the formula crease moisture permeability;
- Remove the ISO 2528:1995 in the informative Appendix C.

This standard and ISO 2528:1995, compared with more adjustments are given in Appendix A of this standard and ISO 2528 in the structure. Chapter 1995 Article ID Control List.

Please note that some of the content of this document may involve patents. Release mechanism of the present document does not assume responsibility for the identification of these patents.

The standard proposed by China National Light Industry Council.

The standard paper by the National Standardization Technical Committee (SAC/TC141) centralized.

This standard was drafted. Zhejiang Kane specialty materials Co., Ltd., China Pulp and Paper Research Institute, the national paper quality supervision and inspection Test center.

1 Scope

This standard specifies the moisture permeability of sheet materials and methods weight (permeable cup) Determination of moisture permeability of the crease.

This standard applies to flat, thin pages can hinder the water vapor permeability of packaging materials, such as paper, cardboard, plastic film, paper and film or metal Foil composite materials, rubber or plastic coated fabrics. This method is not applicable under the test conditions due to contact with hot wax and damage or bright Significantly shrink film. Moisture permeability of less than $1\text{g}/(\text{m}^2 \cdot 24\text{h})$ or greater than the material thickness of 3mm, so that this method is not recommended.

2 Normative references

The following documents for the application of this document is essential. For dated references, only the dated version suitable for use herein Member. For undated references, the latest edition (including any amendments) applies to this document.

GB/T 450 and take samples to an aspect of paper and paperboard samples, positive and negative determination (GB/T 450-2008, ISO 186.

2002, MOD)

GB/T 10739 paper, paperboard and pulp sample processing and testing standard

atmospheric conditions (GB/T 10739-2002, eqv ISO 187.

1990)

3 Terms and Definitions

The following terms and definitions apply to this document.

Moisture permeability watervapourtransmissionrate Under specified temperature and humidity conditions, the quantity of water vapor per unit time through unit area of specimen. In grams per square meter per 24 hours expressed $[G/(m^2 \cdot 24h)]$.

Note: The material moisture permeability depending on the thickness, composition and permeability, as well as temperature and relative humidity testing.

Crease moisture permeability watervapourtransmissionrateofcreasedmaterials Moisture permeability under the same test conditions, the crease of the sample moisture permeability difference and moisture permeability of the sample did not fold to 24h through the 100m long Sample mass of water vapor crease representation $[g/(24h \cdot 100m)]$.

Principle 4

Interior desiccant material to be measured by the sealing permeable cup is placed in conditions controlled temperature and humidity in the atmosphere, at the appropriate time interval weighing through Quality wet cup. When the increase in quality and the time interval is proportional to the moisture permeability can be calculated.

5.1 Permeable cup

5.1.1

made of aluminum or stainless steel, its diameter should be suitable for weighing in the balance. Light tough quality requirements, under the experimental conditions with