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**Paper and board—Determination of  
air permeance and air resistance  
(medium range)—Gurley method**

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In the event of any doubts arising as to the contents,  
the original JIS is to be the final authority.

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## **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 Technical Association of the Pulp and Paper Industry (JAPAN TAPPI)/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 P 8117:1998** is replaced with this Standard.

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# Paper and board—Determination of air permeance and air resistance (medium range)—Gurley method

## Introduction

This Japanese Industrial Standard has been prepared based on the second edition of **ISO 5636-5** published in 2003 with the method using the Oken type air permeance apparatus (hereafter referred to as “Oken tester”) not stated in the corresponding International Standard being added as the Japanese Industrial Standard.

The portions given sidelines or dotted underlines are the matters in which the contents of the original International Standard have been modified. A list of modifications with the explanations is given in Annex JA.

## 1 Scope

This Standard specifies the Gurley tester method and the Oken tester method of determining the air permeance and air resistance of paper and board (hereafter referred to as “Gurley method”). For the Gurley method it is applicable to papers and boards which have air permeances between  $0.1 \mu\text{m}/(\text{Pa}\cdot\text{s})$  and  $100 \mu\text{m}/(\text{Pa}\cdot\text{s})$  or air resistances between  $1.4 \text{ s}$  and  $1\,300 \text{ s}$ . For the Oken tester method the ranges for air permeance and air resistance of paper and board applied are not limited. It is unsuitable for rough-surfaced materials, which cannot be securely clamped to avoid leakage.

NOTE : The International Standard corresponding to this Standard is as follows.

ISO 5635-5:2003 *Paper and board—Determination of air permeance and air resistance (medium range)—Part 5: Gurley method* (MOD)

In addition, symbols which denote the degree of correspondence in the contents between the relevant International Standard and **JIS** are IDT (identical), MOD (modified), and NEQ (not equivalent) according to **ISO/IEC Guide 21**.

## 2 Normative references

The following standards contain provisions which, through reference in this text, constitute provisions of this Standard. For standards with the year indication, only the editions of the indicated year shall apply but the revisions (including amendments) made thereafter shall not apply. The normative references without the indication of the year shall apply only to the most recent editions (including amendments).

JIS K 6253 *Rubber, vulcanized or thermoplastic—Determination of hardness*

NOTE : Corresponding International Standard: ISO 48:1994 *Rubber, vulcanized or thermoplastic—Determination of hardness (hardness between 10 IRHD and 100 IRHD)* and Amendment 1 (1999) (MOD)

JIS P 8110 *Paper and board—Sampling to determine average quality*

NOTE : Corresponding International Standard: ISO 186 *Paper and board—Sampling to determine average quality* (IDT)