**Machine glazed Kraft Paper for food packaging—Specification**

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**Machine glazed Kraft Paper for food packaging —Specification**

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**Foreword**

This Kenya Standard was prepared by the Technical Committee on Packaging (053) under the guidance of the Standards Projects Committee, and it is in accordance with the procedures of the Kenya Bureau of Standards.

Machine glazed Kraft paper or board is one which has had one side made smooth and glossy by drying in contact with heated, polished metal cylinder which forms part of the drying section of the machine.

In the manufacturing sector, machine glazed Kraft paper is used for packaging of bread, grocery, cereals, confectionery, among others

This standard shall be useful manufacturers of dry foods, converters importers, exporters, standards enforcement agencies and other stakeholders.

Parameters covered in the standard include tensile, strength, moisture, pH, cobb, dimension Limits of heavy metals and organic contaminants, Microbiological requirements among others.

During the preparation of this standard, reference was made to the following document:

**Information from the packaging Industry**

Acknowledgement is hereby made for the assistance derived from this source.

**Machine glazed Kraft Paper for food packaging —Specification**

**1 Scope**

This Kenya Standard specifies the requirements and methods of sampling and test for Machine glazed Kraft Paper for food packaging.

**2 Normative references**

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

*EAS 880, Waxed paper for packaging of confectionery — Specification*

*EAS 930 Paper and board food contact packaging material — Specification*

*EAS 933, Paper and board intended to come into contact with foodstuffs — Determination of formaldehyde in an aqueous extract*

[*ISO 186 Paper and board -- sampling to determine average quality*](https://www.iso.org/contents/data/standard/03/42/34233.html)

*ISO 216 Writing paper and certain classes of printed matter -- Trimmed sizes -- A and B series, and indication of machine direction*

*ISO 536 Paper and board -- Determination of grammage*

*ISO 2758 Paper -- Determination of bursting strength*

*ISO 1974 Paper -- Determination of tearing resistance -- Elmendorf method*

*ISO 1924-3, Paper and board — Determination of tensile properties — Part 3: Constant rate of elongation method (100 mm/min)*

*ISO 187 Paper and board -- Conditioning of samples*

*ISO 9184-1**Paper, board and pulps -- Fibre furnish analysis -- Part 1: General method*

[*ISO 4046-1*](http://www.iso.org/iso/home/store/catalogue_tc/catalogue_detail.htm?csnumber=29836) *Paper, board, pulps and related terms -- Vocabulary -- Part 1: Alphabetical index*

*ISO 4046-2. Defines terms related to pulping, in both English and French.*

*ISO 4046-3: Defines terms related to paper making, in both English and French*

*ISO 4046-4: Defines terms related to paper and board grades and converted products, in both English and French.*

*ISO 5637 Paper and Board -- Determination of water absorption after immersion in water*

*ISO 6588-1 Paper, board and pulps — Determination of pH of aqueous extracts — Part 1: Cold extraction*

*ISO 8784-1, Pulp, paper and board — Microbiological examination — Part 1: Total count of bacteria, yeast, mould based on disintegration*

*ISO 16532-3 Paper and Board -- Determination of grease resistance -- Part 3: turpentine test for voids in glassine and greaseproof papers*

*ISO 3781 Paper and Board -- Determination of tensile strength after immersion in water*

**3. Terms and definition**

For the purposes of this standard the terminologies given in KS ISO 4046 part 1 to 5 and others below shall apply.

**3.1**

**Machine glazed Kraft Paper**

paper which has had one side made smooth and glossy by drying in contact with heated, polished metal cylinder which forms part of the drying section of the machine

**4 Requirements**

**4.1 General requirements**

The fibre used shall be purely virgin pulp and shall be machine glazed Kraft paper and free from visible specks, creases, cuts holes and other paper defects.

**5. Specific requirements**

**5.1 Specific requirements for Machine glazed Kraft Paper for food packaging**

Machine glazed Kraft Paper for food packaging shall meet the physical requirements as specified in table 1

Table 1 — Physical requirements for Machine glazed Kraft Paper for food packaging

|  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **S/No.** | **Characteristic** | | **Requirement** | | | | | | | | | **Test method** |
|  | Grammage, g/m2, min, ± 5 % | | 35 | 40 | 50 | 60 | 70 | 80 | 90 | 100 | 110 | KS ISO 536 |
|  | Moisture content, %, range | | 5-8.5 | | | | | | | | | KS ISO 287 |
|  | Tensile strength, kN/m, min | MD | 2.5 | 2.85 | 3.5 | 4.5 | 5 | 5.9 | 6.6 | 7.1 | 7.6 | KS ISO 1924-3 |
| CD | 1.4 | 1.65 | 2 | 2.5 | 2.7 | 3.1 | 3.4 | 3.6 | 3.9 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |
|  | Burst Strength, Kpa, min | | 90 | 105 | 135 | 180 | 215 | 245 | 270 | 300 | 335 | KS ISO 1924-3 |
|  | Burst Index,Kpa.m2/g,min | | 3.15 | | | | | |  |  |  | *KS ISO 2758* |
|  | Tear Strength, mN, min. | MD | 155 | 195 | 270 | 350 | 410 | 495 | 590 | 710 | 785 | KS ISO 1924-3 |
| CD | 165 | 200 | 300 | 405 | 470 | 575 | 690 | 815 | 945 |
|  | pH | 5 —8.5 | | | | | | | | | | KS ISO 6588- |
|  | Cobb (60s),max | 35 | | | | | | | | | | *KS ISO 5637* |

|  |
| --- |
|  |

**5.2 Limits of heavy metals and organic contaminants for** machine glazed Kraft paper

machine glazed Kraft paper shall meet the Limits of heavy metals and organic contaminants as specified in EAS 930

**5.3 Microbiological requirements** for Machine glazed kraft paper

Machine glazed Kraft paper shall meet the microbial requirements as specified in EAS 930

**5.4 Dimension**

**5.4.1** When tested in accordance with ISO 216 the dimensions (length and width) of the sheet shall be as specified in the marking within a tolerance of ± 0.5.

**5.4.2** For machine glazed Kraft paper supplied in reels, the width and diameter of the reel shall be as declared and the diameter shall be within a tolerance of ± 6 mm when tested in accordance with Annex A.

**6 Packaging and Labelling**

**6.1 Packaging**

**6.1.1** Machined glazed Kraft paper shall be packed in suitable materials that prevents it from damage, contamination during handling, storage and transportation.

**6.2 Labelling**

**6.2.1 Bulk package**

The bulk package of machine glazed Kraft paper shall be legibly and indelibly marked with the following information .

1. Manufacturer’s name, address and /or registered trade mark.
2. Description of goods, “machine glazed Kraft paper”.
3. Dimensions.
4. Batch number or code
5. Instruction for correct use
6. Instruction for storage and disposal.
7. The declaration, ‘country of origin.

**6.2.2 Machine glazed Kraft paper**

The Machine glazed Kraft paper shall be legibly and indelibly marked with the following information

1. Manufacturer’s name, address and /or registered trade mark.
2. Batch number or code
3. Instruction for correct use, storage and disposal.

**7 Sampling**

Sampling of the machined glazed Kraft paper shall be done in accordance to ISO 186

Annex A  
  
(normative)  
Measurement of dimensions

**A.1** Measure to the nearest 0.5 mm, the width, (parallel to the cross direction of the paper) of each five test specimen taken across full width of five separate rolls and record the average of the results.

**A.2** Measure to the nearest 1 mm, the diameter of each of the five rolls and record the results. Check for compliance with 5.4.2.