First edition



DRAFT TANZANIA STANDARDS

Textiles – Insect Screening and Louver Cloth Woven from Vinyl-Coated Glass Yarns – Specification

TANZANIA BUREAU OF STANDARDS

FOREWORD

This Draft Tanzania Standard is being developed by the Apparel Technical Committee under supervision of the Textile and Leather Divisional Standards Committee and it is in accordance with the procedures of the Tanzania Bureau of Standards.

In the preparation of this Draft Tanzania Standard assistance has been obtained from the following standard:

ASTM D3656 - 13 - Standard Specification for Insect Screening and Louver Cloth Woven from Vinyl-



1. SCOPE

This Draft Tanzania Standard covers the requirements for vinyl-coated glass yarn insect screening and louver cloth used extensively in soffit and louver vents to keep out largest insects, birds, and airborne litter, while at the same time providing for adequate ventilation and air circulation. Also, it is designed and woven primarily for installation in or on any dwelling, patio, screening enclosure, building, or structure for the purpose of keeping out flies, mosquitoes, and most insects.

2. NORMATIVE REFERENCES

The following referenced documents are indispensable for the application 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:

- TZS 21: Determination of Mass per unit area
- TZS 22: Textiles Woven fabrics Determination of breaking load and extension
- TZS 40: Method for determination of colour fastness of textiles material to day light
- TZS 44: Textiles Woven or knitted fabrics Determination of length and width

3. TERMS AND DEFINITION

3.1 For the purpose of this Draft Tanzania Standard, the following terms and definitions shall apply:

3.1.1 Glass yarn

yarn composed of glass fibres twisted from continuous filament strands or from staple fibre sliver

3.1.2 Insect screening

protective screen covering consisting of netting; designed to keep insects from entering a building through the open window, can be mounted in a frame.

4. CLASSIFICATION

4.1 Vinyl-coated glass yarn insect screening is produced in two basic classes and mesh to afford required strength and insect protection using yarns as directed in Specification D3374. These two classes are as follows:

4.1.1 Class 1

Insect screening woven from vinyl-coated glass yarn having a nominal thickness of 0.292 mm [0.0115 in.].

4.1.2 Class 2

Insect screening woven from vinyl-coated glass yarn having a nominal thickness of 0.330 mm [0.013 in.].

- **4.2** The mesh, width, and colours are listed in Table 1.
- **4.2.1** For vinyl-coated glass yarn insect screening not listed in Table 1, the mesh, width, and colours shall be agreed upon between the buyer and seller.

5. GENERAL REQUIREMENTS

5.1 Material:

5.1.1 Workmanship

Insect screening or louver cloth shall be made utilizing input yarns that meet the requirements specified in this Draft Tanzania Standard.

5.1.2 Plasticizers

The material used to coat or impregnate the fibrous glass yarn shall be a compound of polymerized or copolymerized vinyl chloride resin, plasticized with phosphate or phthalate ester plasticizers exclusively, pigmented and stabilized to meet the requirements herein.

5.1.3 Selvage

Vinyl-coated glass insect screening and louver cloth may be supplied with or without selvages as agreed between the buyer and supplier.

5.1.4 Yarn Splices

Vinyl-coated glass yarn splices shall be permitted provided they show no tails and do not exceed 25 mm [1 in.] in length. Yarn splices in the insect screening or louver cloth shall not exceed 15 per standard 30 m [100 ft] roll, and no more than one splice shall occur in any 930 cm² [1 ft²] of product.

Table 1: Requirements for Mass per unit area and Breaking Strength

		. (
S/N	Characteristics	Class 1 Class 2 Class 2			Test methods	
		18 × 16	18 × 14	20 × 20	8 × 8	
		Mesh	Mesh	Mesh	Mesh	
		25.4 mm	25.4 mm	25.4 mm	25.4 mm	
1	Mass per unit area, g/m², min	100	140	170	65	TZS 21
	Fabric stability/tensile strength					
2	N, min					
	Warp	35	40	50	20	TZS 22
	Weft (fill)	25	35	40	20	

6. PHYSICAL REQUIREMENTS

6.1 Appearance

Unless otherwise agreed upon between the buyer and the supplier, a roll shall be defective if it contains two or more defects as described in 5.1.1.

6.2 Mesh

The standard average mesh shall be approximately even-spaced as specified in Table 2, which is 60.5 mesh per 25 mm. There are no tolerance requirements within 13 mm of the selvage.

6.3 Roll Length

Each roll of insect screening or louver cloth complying with this Draft Tanzania Standard shall contain 30 linear M, with tolerance of -0, +0.6 m as given in Table 2.

6.4 Width

The standard average roll width shall be as specified in Table 1 subject to tolerance of +7 or −0 mm

6.5 Mass per Unit Area

The minimum average mass per unit area for each class shall be as specified in Table 1.

6.6 Flame Resistance

There shall be no propagation of flame along any specimen for longer than 10 s after removal of the flame source and no single specimen may propagate flame along its entire length in any time increment.

Table 2: Generally Available Mesh and Widths

S/N	Product	Class	Standard construction warp by fill – Mesh 25.4 mm	Standard widths, mm
		1	18 × 16	610, 762, 813, 914, 1067, 1219, 1524, 1829, 2134
1	Insect screening	2	18 × 14	914, 1219, 1524, 1829, 2134, 2438, 2743
		2	18 × 14	914, 1219, 1829, 2134,
		2	20 x 20	914, 1219, 1524, 1829,
2	Louver cloth	2	Less than 12 x 12	6, 8, 12, 24, 36, 48
Test method		Physi	cal	TZS 44

7. SAMPLING AND TEST SPECIMENS

7.1 Sampling

On a continual basis, samples are taken randomly from each mesh and tested to ensure compliance, unless otherwise agreed upon between the buyer and the supplier.

7.2 Test Specimens

For insect screening or louver cloth appearance, width, and length testing, a roll shall serve as a test specimen. For other properties, take the test specimen(s) from the roll. No specimen shall be taken closer than 25 mm from the edge or 0.9 m from the end of the roll.