

# DRAFT UGANDA STANDARD

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## Knitted polyester/cellulosic blended fabric — Specification

PUBLIC REVIEW DRAFT



Reference number  
DUS DEAS 222: 2016

**Compliance with this standard does not, of itself confer immunity from legal obligations**

**A Uganda Standard does not purport to include all necessary provisions of a contract. Users are responsible for its correct application**

PUBLIC REVIEW DRAFT

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## National foreword

Uganda National Bureau of Standards (UNBS) is a parastatal under the Ministry of Trade, Industry and Cooperatives established under Cap 327, of the Laws of Uganda, as amended. UNBS is mandated to co-ordinate the elaboration of standards and is

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- (c) the National Enquiry Point on TBT Agreement of the World Trade Organisation (WTO).

The work of preparing Uganda Standards is carried out through Technical Committees. A Technical Committee is established to deliberate on standards in a given field or area and consists of representatives of consumers, traders, academicians, manufacturers, government and other stakeholders.

Draft Uganda Standards adopted by the Technical Committee are widely circulated to stakeholders and the general public for comments. The committee reviews the comments before recommending the draft standards for approval and declaration as Uganda Standards by the National Standards Council.

This Draft Uganda Standard, DUS DEAS 222: 2016, *Knitted polyester/cellulosic blended fabric — Specification*, is identical with and has been reproduced from a Draft East African Standard, DEAS 222: 2016, *Knitted polyester/cellulosic blended fabric — Specification*, and is being proposed for adoption as a Uganda Standard.

This standard cancels and replaces US 360:2002, *Specification for knitted polyester/cellulosic blended fabric*, which has been technically revised.

This standard was developed by the Subcommittee on Textiles and textile products (SC 1) under the Textiles, leather, paper and related products' Standards Technical Committee (UNBS/TC 7).

Wherever the words, "East African Standard" appear, they should be replaced by "Uganda Standard."



DEAS 222: 2016

ICS 59.080

## **DRAFT EAST AFRICAN STANDARD**

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**Knitted polyester/cellulosic blended fabric — Specification**

**EAST AFRICAN COMMUNITY**

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## Foreword

Development of the East African Standards has been necessitated by the need for harmonizing requirements governing quality of products and services in the East African Community. It is envisaged that through harmonized standardization, trade barriers that are encountered when goods and services are exchanged within the Community will be removed.

In order to achieve this objective, the Community established an East African Standards Committee mandated to develop and issue East African Standards.

The Committee is composed of representatives of the National Standards Bodies in Partner States, together with the representatives from the private sectors and consumer organizations. Draft East African Standards are circulated to stakeholders through the National Standards Bodies in the Partner States. The comments received are discussed and incorporated before finalization of standards, in accordance with the procedures of the Community.

East African Standards are subject to review, to keep pace with technological advances. Users of the East African Standards are therefore expected to ensure that they always have the latest versions of the standards they are implementing.

EAS 222 was prepared by Technical Committee EAS/TC 061, *Textiles and Textile Products*.

This second edition cancels and replaces the first edition (EAS 222:2001), which has been technically revised



## Knitted polyester/cellulosic blended fabric — Specification

### 1 Scope

This Draft East African Standard specifies the requirements and test methods for knitted polyester/cellulosic blended fabric for apparel purposes.

### 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.

ISO 105-B01: Textiles — Tests for colour fastness — Part B01: Colour fastness to light: Daylight

ISO 105-B02: *Textiles -- Tests for colour fastness -- Part B02: Colour fastness to artificial light: Xenon arc fading lamp test*

ISO 139, Textiles — Standard atmospheres for conditioning and testing

ISO 3758: Textiles -- Care labelling code using symbols

ISO 12945-2:2000 Textiles -- Determination of fabric propensity to surface fuzzing and to pilling -- Part 2: Modified Martindale method

ISO 12945-1:2000 Textiles -- Determination of fabric propensity to surface fuzzing and to pilling -- Part 1: Pilling box method

ISO 1833-11, Textiles — Quantitative chemical analysis — Part 11: Mixtures of cellulose and Polyester fibres (method using sulphuric acid)

ISO 13938-2: Textiles -- Bursting properties of fabrics -- Part 2: Pneumatic method for determination of bursting strength and bursting distension

ISO 5077, Textiles — Determination of dimensional change in washing and drying

ISO 22198: Textiles -- Fabrics -- Determination of width and length

ISO 24153, Random sampling and randomization procedures

ISO 7771: Textiles -- Determination of dimensional changes of fabrics induced by cold-water immersion

EAS 237, Methods for determination of colour fastness of textile materials to washing.

EAS 255, Methods for quantitative chemical analysis of binary fibre mixture.

EAS 238, Method for determination of colour fastness of textile materials to perspiration.

EAS 244, Method for determination of colour fastness of textile materials to hot pressing.

EAS 239, Method for determination of colour fastness of textile materials to rubbing — Part 1: Dry and wet method.

EAS 241, Method for determination of colour fastness of textile materials to artificial light (Xenon arc lamp).

### 3 Requirements

#### 3.1 Composition

The blend composition when tested in accordance with ISO 1833-11, shall consist of polyester/cellulosic fibres. The proportions shall be as declared in 5.2 (ii), subject to a tolerance of  $\pm 5\%$ .

#### 3.2 Width

The width of the fabric when measured in accordance with ISO 22198 shall be as declared subject to a tolerance of  $\pm 3\%$ .

#### 3.3 Piece length

The piece length when determined in accordance with ISO 22198 shall be as declared subject to a tolerance of  $\pm 1\%$ .

#### 3.4 Dimensional change

When dimensional changes are determined in accordance with ISO 5077 it shall not exceed  $\pm 1\%$ .

#### 3.5 Colour fastness

The colourfastness ratings of coloured fabrics shall be as given in Table 1.

#### 3.6 Mass per unit area

The mass per unit area of the fabric shall be as declared subject to a tolerance of  $\pm 5\%$ .

#### 3.7 Bursting strength

The bursting strength of the fabric shall not be less than 170 kPa. This shall be tested in accordance with ISO 13938-2

Table 1 — Colour fastness rating

Colour fastness to	Rating (Minimum)		Test method
	Change in colour	Staining	
(a) Light	5	-	ISO 105-B01
(b) Washing	4	4	EAS 237
(c) Perspiration	4	4	EAS 238
(d) Rubbing			
Wet	4	4	EAS 239
Dry	4	4	EAS 239
(e) Hot pressing	4	4	EAS 244

### 4 Grading

4.1 The grading of the fabric shall be made on the basis of serious, major and minor defects as defined in Annex A. For the purpose of grading, in a fabric roll of 100 metres, the number of pieces in a roll shall not be more than six, and the shortest piece shall not be less than 3 metres.

4.1.1 The grading shall be as prescribed in Table 2.

**Table 2 — Grading of fabric**

Length of fabric	Type of defects	Number of defects permissible	
		Grade A (firsts)	Grade B (seconds)
100 metres	Serious	Nil	Nil
		Nil	6
	Minor	6	12

Note: Anything less than Grade B shall be considered a reject

## 5 Resistance to piling

When tested in accordance with ISO 12945-1 or ISO 12945-2, the resistance to pilling rating shall not be less than 4.

## 6 Marking and packaging

### 6.1 Packaging

The fabric shall be rolled and packed in suitable packing material that protects it from any damage during handling, transportation and storage.

### 6.2 Marking

The following information shall be legibly and indelibly marked on a label attached securely to the outer top layer of each piece of fabric:

- a) Manufacturer's name and/or trade mark.
- b) Fibre composition and proportion as a percentage.
- c) Width in centimetres.
- d) Length in metres.
- e) Stamp 'SECONDS' or "GRADE B" in clear letters if fabric is not grade A.
- f) Care instructions as given in accordance with ISO 3758

## 7 Sampling

Sampling shall be done in accordance with ISO 24153.

## **Annex A** (normative)

### **Classification of defects in Grading**

#### **A.1. Serious defects**

- a) Ladders more than 2.5 cm from the fabric edges
- b) Dropped stitches
- c) Occurrence of more than one needle line 2.5 cm from the fabric edges.

#### **A.2 Major defects**

- a) One continuous needle line more than 2.5 cm from the fabric edges.
- b) Continuous small hole/cuts and holes/cuts of size exceeding 1 cm
- c) Continuous oil and/or other stains and oil and/or other stains of size exceeding 1 cm.
- d) Misprints.
- e) Uneven colour distribution.
- f) Distortion of designs of more than 5 cm

#### **A.3 Minor defects**

- a) Mixed thread
- b) Bleeding of prints
- c) Stenter curved sides
- d) Needle lines up to 15 cm length
- e) Holes of size below 1 cm.
- f) Non-continuous colour and/or other stains of size below 1 cm

## Bibliography

DEAS 222:2016