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| KENYA STANDARD | DKS 414 :2021  ICS 59.080  Second Edition |

**Specification for school wear for boys and girls**



**TECHNICAL COMMITTEE REPRESENTATION**

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National Industrial Training Authority (NITA)

Ministry of Industrialization and Trade

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Spinknit Nakuru Ltd

Technical University of Kenya(TUK)

RIVATEX

Spinknit Ltd Nakuru

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| Kenya Bureau of Standards, Popo Road, Off Mombasa Road, P.O. Box 54974 - 00200, Nairobi, Kenya | |
|  | +254 020 6948000, + 254 722202137, + 254 734600471 |
|  | info@kebs.org |
|  | @KEBS\_ke |
|  | kenya bureau of standards (kebs) |

Foreword

This Kenya Standard was prepared by the Technical Committee on Ready Made Garments under the direction of the Textile Industry Standards Committee and the National Standards Council.

The standard has been prepared to assist the manufacturers in improving the quality of school wear for boys and girls of all ages. The manufacturers and all others concerned are urged to label the garments in accordance with the following standards:

This second edition of the standard cancels and replaces KS 414-1:1982 which has been technically revised.

1. **Scope**

This Kenya Standard specifies the requirements for the making of garments for school wear. This includes shorts, trousers, shirts and dresses. For school socks, school sweaters and fleece jackets use applicable standards.

**2 Normative references**

The following referenced documents 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.

KS EAS 223:2001 Specification for Zippers

KS ISO 1833 Textiles — Quantitative chemical analysis

KS ISO 3758 Care labelling using codes

**3 Terms and DEFINITIONS**

For the purposes of this standard the following definitions shall apply:

**3.1** **facing** — A form of garment finish applied to neaten and conceal a raw edge in place of a hem; also the lining in a garment on parts exposed by being turned back.

**3.2 fusible lining and interlining** — A lining or interlining which has been treated so that it adheres to other fabrics by the application of heat and pressure.

**3.3 lining —** Fabric shaped to cover the inside of garments; lining usually has smooth, non-irritant surface.

**3.4 interlining** — Material (layer of wool or fuzzy cotton) between the outer fabric and lining of some coats to provide warmth.

**3.5 interfacing** — Fabric sewn, fused or placed between the outer fabric and the lining in areas such as collars and lapels, cuffs, belts, buttonholes and opening edges.

**3.6 back-tack** — The sewing of a few additional stitches on top of the first or last stitches of a seam to prevent ripping or unravelling of the seam.

**3.7 bar-tack** — A reinforcement by means of close, repeated stitching used in apparel at points of strain such as at pocket corners, seam ends, belt loops, buttonholes, etc.

**3.8 raw edge** — A cut edge of fabric, which may unravel or fray if left in this state.

**3.9 seam** — Line of junction between two edges of fabric.

**3.10 taping of seams** — The sewing of a tape or narrow band of fabric into a seam to strengthen and stabilize the seam structure.

**3.11 trimmings, trims** — Ornamentations such as braids or embroidered badges used to enhance the aesthetic appeal of the garment.

**3.12 components** — Linings, buttons, zippers, tapes, hooks and eyes, etc.

**4.0 General requirements**

**4.1** Seams — Not less than 5 stitches per centimetre shall be used for seams.

**NOTE**: It is advisable not to exceed 6 stitches per cm.

**4.2** Seam Finishes — All seams shall be finished by the most suitable method if they are not covered by a lining (examples of seam finishes are zigzagging, edge-stitching, turned under, bound edge, overlock stitching, etc.).

**4.3** Depending on stitch type, blind stitching shall have 2 stitches per cm and 3 to 4 stitches per cm on another type.

**4.4** Button Sewing — Buttons shall be machine sewn through two layers of fabric with not less than 12 stitches per button including tying stitches correctly locked.

**4.5** Buttonholes — Not less than 14 stitches per cm shall be used. The stitches shall be measured on one side of the buttonhole and shall not include the bar-tacks. All ends of threads shall be securely fastened.

**4.6 Buttonholes**

**4.6.1** Thickness — Buttonholes shall be made through not less than two thicknesses of materials. and shall be stitched in accordance with **4.1.5**.

**4.6.2** Buttonhole Placement — The top buttonhole on a centre closing for a shirt shall be placed below the neckline edge at least half the width of the button plus 5 mm. The last buttonhole on a dress shall be 6 cm to 8 cm from the bottom and shall not be on the hem. Buttonholes shall not be placed closer than 1.6 cm from a closing edge. For a large button, the extension from the end of the buttonhole to the closing edge shall be not less than half the button's width plus 5 mm.

* + 1. Stitching — Buttonholes shall be bar-tacked with not less than 5 stitches or fish-tailed and shall be clearly cut.

**4.6.4** Length — The length of the buttonhole shall be 3 mm greater than the diameter plus the thickness of the button.

**4.6.5** Distance Between Holes — Distance between buttonholes shall be not more than 10 cm on blouses and shirts, and not more than 12 cm on dresses and skirts and 3 cm to 4 cm on trousers.

**4.6.7 Facings** — Facings for fold-back collars shall be such that the inside edge of the facing does not show. The raw edges shall be either finished with overlock or zigzag stitches. Where buttons and buttonholes are used facings shall be wide enough to form a second thickness of material for securing the button and making the buttonhole.

**4.6.8 Hems** — The minimum hem shall be:

1. (a) on dresses and skirts 4 cm to 5 cm.
2. (b) on trousers and slacks 5 cm.

**4.6.9 Reinforcing** — All reinforcing at points which require strengthening shall be bar-tacked or back sewn. The ends of all seams and stitching, unless secured by other stitching and all breaks in the thread, shall be securely back-stitch tacked.

**4.6.10 Belt-loops** — Belts loops on tunics and dresses shall be firmly attached to the garment into the side seams and bar-tacked where necessary. Narrow belt loops 1 cm or less in width on shorts, slacks, skirts and trousers shall be bar-tacked at both ends.

**4.6.11 Sewing Threads** — Synthetic or synthetic natural fibre blend fabrics in which the synthetic is the majority shall be sewn only which synthetic blend threads. Natural fibre fabrics shall be sewn with mercerized cotton threads. Buttons and buttonholes shall be sewn with blends, cotton (coated with beeswax) , nylon or polyester or any other appropriate synthetic stronger than cotton. The shade of sewing thread shall match with that of the fabric.

**4.6.12 Pockets** — All pockets shall be reinforced at each corner or at each end of the opening by means of bar-tacking. Where the garment is of woollen flannel fabric, light weight or loosely woven fabric the pockets shall be reinforced and any bar-tacking shall be stitched through both the pocket and the reinforcing material.

Inserted pockets shall be made of synthetic or synthetic blend fabric. The seams of pockets shall be secured by an interlock stitch plus a safe seam.

**4.6.13 Trimmings and Components** — All trims and components shall be compatible in performance with the base cloth.

* + 1. Buttons — The buttons shall be of good quality and conform to KS 398 Specification for plastic buttons.
    2. Eyelets and Hooks — These shall be of good quality and rust-proof.

**4.6.16 Zippers** — Zippers shall conform to the requirements of KS EAS 223

**4.6.17 Linings and Interfacings** — Linings and interfacings shall have characteristics of colour fastness and dimensional stability similar to those of the base cloth. The bonding of fusible interlinings shall withstand the laundering and or dry cleaning specified on the label without breakdown. The characteristics of the interlining shall conform to KS 08-214, Specification for woven interlinings and linings.

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**4.6.18**  The garments shall be free from the following fabrication defects:

1. prominently noticeable stains,
2. prominently noticeable defective stitching,
3. loose ends of sewing thread getting easily frayed,
4. any other defect which would significantly mar the appearance or affect the serviceability or durability of the garment,
5. hole, cut or tear, and
6. prominently noticeable non-alignment of pockets, buttons and buttonholes.

**5.0 SPECIFIC REQUIREMENTS**

5.1 The fibre composition of the school wear shall be as declared subject to a tolerance of ± 5 %. This shall be determined in accordance with KS ISO 1833.

5.1 Size of school Uniforms

5.1.1 The waist of the trouser and shorts of age 4-8 years shall be elasticated and shall be of the following sizes indicated in Table 1.

**Table 1: CHILDREN ELASTICATED TROUSERS BOTH GIRLS AND BOYS**

|  |  |
| --- | --- |
| WAIST(inches) | LENGTH(inches) |
| 22 | 22 |
| 22 | 23 |
| 22 | 24 |
| 22 | 25 |
| 23 | 26 |
| 23 | 27 |
| 23 | 28 |
| 24 | 29 |
| 24 | 30 |
| 24 | 31 |
| 25 | 32 |
| 25 | 33 |
| 26 | 34 |

5.1.2 The trouser and shorts for boys of age 10-18 years shall be of the following sizes indicated in Table 2.

5.1.3 The size of the trouser for girls shall be of the following sizes indicated in Table 3

**Table 2: BOYS TROUSERS AND SHORTS MEASUREMENTS**

|  |  |
| --- | --- |
| **WAIST (INCHES )** | **LENGTH(INCHES** |
| 25 | 34,35,36 |
| 26 | 35,36,37 |
| 27 | 36,37,38 |
| 28 | 37,38,39 |
| 29 | 38,39,40 |
| 30 | 39,40,41 |
| 31 | 40,41,42 |
| 32 | 41,42, 43 |
| 33 | 42,43,44 |
| 34 | 43,44,45 |
| 35 | 43,44,45 |
| 36 | 43,44,45 |
| a = the 3 measurements for length represent short, regular or long .  Example  A manufacturer can make A trouser of waist 25 with a short length of 34  Or make  A trouser of waist 25 with regular length of 35 | |

**Table 3: GIRLS TROUSERS MEASUREMENTS**

|  |  |  |
| --- | --- | --- |
| **WAIST(inches)** | **LENGTH(Inches)** | **HIPS(inches)** |
| 25 | 32 or 33 or 34 | 34,35,36 |
| 26 | 33,34,35 | 35,36,37 |
| 27 | 34,35,36 | 36,37,38 |
| 28 | 35,36,37 | 37,38,39 |
| 29 | 36,37,38 | 38,39,40 |
| 30 | 37,38,39 | 39,40,41 |
| 31 | 38,39,40 | 40,41,42 |
| 32 | 39,40,41 | 41,42,43 |
| 33 | 40,41,42 | 42,43,44 |
| 34 | 41,42,43 | 43,44,45 |
| 35 | 41,42,43 | 44,45,46 |
| 36 | 41,42,43 | 46,47,48 |

5.1.4 The sizes of the straight skirts shall be as indicated in Table 4

5.1.5 The length of the skirts from the waist of 25 inches shall not be less than 25 inches

**Table 4: SKIRTS (STRAIGHT) MEASUREMENTS**

|  |  |
| --- | --- |
| **WAIST(inches)** | **HIPS(inches)** |
| 25 | 35,36 37 |
| 26 | 36,37,38 |
| 27 | 37,38,39 |
| 28 | 38,39,40 |
| 29 | 39,40,41 |
| 30 | 40,41,42 |
| 31 | 41,42,43 |
| 32 | 42,43,44 |
| 33 | 43,44,45 |
| 34 | 44,45,46 |
| 35 | 45,46,47 |
| 36 | 47,48,49 |

5.1.6 The size of girls dresses shall be as indicated in the Table 5

**Table 5: DRESSES MEASUREMENTS**

|  |  |  |
| --- | --- | --- |
| **Burst (inches)** | **Waist (Inches)** | **Length (inches)** |
| 26 | 24 | 24 |
| 28 | 25 | 26 |
| 30 | 26 | 28 |
| 32 | 27 | 30 |
| 34 | 28 | 32 |
| 36 | 29 | 34 |
| 38 | 30 | 36 |
| 40 | 31 | 38 |
| 42 | 32 | 40 |
| 44 | 34 | 42 |

* + 1. The sizes of the school shirts shall be as indicated in Table 6 and 7

Table 6: Child 3-12 years (in CM)

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | **XS** | **S** | **M** | **L** |
| Neck | 29 | 29 | 31 | 32 |
| Chest | 78 | 82 | 86 | 90 |

Table 7: Teenage 13-19 years (in CM)

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | **XS** | **S** | **M** | **L** |
| Neck | 29 | 29 | 31 | 32 |
| Chest | 78 | 82 | 86 | 90 |

5.1.8 The fabric for making school shall comply with the requirements in KS 541 part 1 and 2

5.1.9 The colourfastness properties of the school wear shall comply with requirement in Table 7 below

**Table 7: Colourfastness properties**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Characteristic |  | NUMERICAL RATING, min. | | TEST METHOD |
| Light | | Colour change | Staining | KS ISO 101-B01  KS ISO 101-B02 |
| 6 | — |
| Rubbing | Dry | — | 4 | KS ISO 101-X12 |
| Wet | — | 4 |
| Perspiration, | Acid | 5 | 5 | KS ISO 105 E04 |
| Alkali | 5 | 5 |
| Washing | | 5 | 5 | KS ISO 105 C10 |
| Peroxide washing | | 4 | 4 | KS ISO 105 N02 |

1. **Marking**

The following information shall be on label securely attached to the garment

1. Manufacturer name and address or Trade mark
2. Size designation shall be as follows;
   1. Trousers for boys shall be designated by waist and length measurements of the garment
   2. Trouser for girls shall be designated by waist, length and hips measurements of the garment
   3. Dresses shall be designated by burst and Length measure
   4. Straight skirts shall be designated by waist and hip measurement of the garment
   5. Shirts shall be designated by the chest and neck measurement of the garment.
3. Care instructions as per KS ISO 3758
4. Country of manufacture