

### SECTION 3 : TECHNICAL SPECIFICATIONS

The color/shade of the uniform material preferably should be common for entire state of Kerala, however in case if the SMCs/ PTAs/Schools request for other color combinations, the agencies will have to offer 3 other color combinations as per specification given below and supply accordingly. A common colour / design combination is desired for the entire state for the true spirit of uniformity among children.

**a) Material to be supplied as per detailed Technical Specifications given below:**

**i. Shirting:- (Polyster - Cotton):**

Sl. NO	Test Parameter	Requirement	Tolerance
1	Warp Count	2/60s PC	+/- 5 %
2	Weft Count	30 s PC	+/- 5%
3	Blend Composition (Warp & Weft)	67:33	+/- 3 Units
4	Ends/Inchs.	64	+ 5%-2.5%
5	Picks /Inches	62	+ 5%-2.5%
6	width	91 Cms/137 cms	+/- 1 cm
7	Length	17 Mtrs and above	
8	Mass (GSM)	115 grams	+ 5%- 2.5.%
9	Breaking Strength warp	50 Kgf	- 5 % on average.
10	Breaking strength Weft	50 Kgf	- 5% on average.

11	Crease recovery angle	As per Standard IS 15852:2009	As per Standard IS 15852:2009
12	Pilling Resistance		
13	P.H.Value (Hot method )		
14	Color Fastness to Light		
15	Colour Fastness to washing Test 2		
16	Colour Fastness to perspiration		
17	Colour Fastness to Rubbing		
18	Colour Fastness Hot Pressing		
19	Tear Strength		As per Standard
20	Abrasion resistance		IS 15852:2009

ii. Suiting: (Polyster - Viscose)

Sl. No.	Test Parameter	Requirement	Tolerance
1.	Warp Count (fibre dyed)	2/30s PV	+/- 5%
2.	Weft Count (fibre dyed)	2/30s PV	+/- 5%
3.	Blend Composition (Warp/Weft)	70:30	+/- 3 Units

4.	Ends/Inches	62	+5%-2.5%
5.	Picks/Inches	46	+5%-2.5%
6.	Width	137 cms.	+/-1 cms.
7.	Mass (GSM)	190 Grams	+5%-2.5%
8.	Breaking strength Warp	90 kgf	-5% on average
9	Breaking strength Weft	65 kgf	-5% on average
10.	Crease recovery angle		
11.	Pilling Resistance		
12	P.H. Value (Hot method)		
13	Colour Fastness to Light	As per Standard	As per Standard
14.	Colour Fastness to Washing Test 2	ISI 5853:2009	ISI 5853:2009
15.	Dry-Cleaning		
16.	Colour fastness to Perspiration		
17.	Colour fastness to Rubbing		
18.	Colour fastness to Hot Pressing		

iii. Dupatta:

Sl. No.	Parameters	Requirement
1.	Polyester	100%
2.	Width	52 CM
3.	Length	1.60 Meter

4.	Crease recovery angle	As per Standard ISI 5852:2009
5.	Pilling Resistance	
6.	P.H.Value	

**GENERAL POINTS TO BE OBSERVED:**

The Deputy Director of Education (DDEs)/ District Project Officers (DPOs) in the District and Assistant Education Officer (AEOs)/ Block Programme Officers (BPOs) in the blocks will monitor and support the SMCs/ PTAs in the process of procurement, distribution and subsequent payment of uniforms.

a) DESIGN AND COLOUR:

Each bidder will have to give 5 different combinations (upper & lower) uniforms in design and colour. The samples of successful bidders will be pooled together. From this pool, a final selection will be made after consulting the stakeholders. The successful bidder will be given the selected colour and design. This may range from 6-12 combinations. The bidder will have to supply from these combinations based on the indent submitted by the School Management Committee. The School Management Committee will select one combination from the pooled combinations. There shall be a single colour and design for one school.

Class wise requirement of cloth for boys and girls for stitching of uniforms is provided in **Annexure 2**

b) Type of Uniform patterns:

i. Boys

Category	Class I to VII	Class VIII
Suiting	Knickers	Pants *
Shirting	Half shirt	Half shirt
Total students (approximate)	As per Annexure - 2	As per Annexure - 2

ii. Girls

Category	Class I to VII	Class VIII
Suiting	Skirt	Skirt or churidhar top with depatta
Shirting	Shirt	Long skirt or churidhar bottom
Total students	As per Annexure - 2	As per Annexure - 2

(approximate)		
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- \* Some schools may have full pants instead of half pants in **Class I to VII**
- \*\* Some schools may have full skirt instead of half skirts in **Class I to VII**