



Properties of non woven textile			
Sr. No	Property	Test Method	Value
I Polymer and Type			
1	Material/Polymer		Polypropylene/ Polyethylene/ Polyamide, Polyester or any combination thereof
2	Type/Structure		Non-woven Needle Punched and Mechanically or Thermally bonded type or equivalent
II Mechanical Properties			
1	Elongation at Failure (*)		>50% in both direction
2	Grab Strength (*): (i) On top of subgrade or prepared subgrade before laying blanket or any where within the embankment	ASTM D4632 2015	700 N
	(ii) Below the ballast and above the Blanket Layer		1750 N
III Hydraulic Properties			
1	Apparent Opening size	ASTM D4751- 2016	≤ 85 micron
2	Water Flow Rate normal to the Plane	ASTM D4491- 2017	1720 lit/m ² /Sec50 N
IV Survivability Properties			
1	Trapezoidal Tear Strength (*): (i) On top of subgrade or prepared subgrade before laying blanket or anywhere within the embankment	ASTM D4533- 2018	250 N
	(ii) Below the ballast and above the Blanket Layer		800 N
2	Puncture Strength CBR (*): (i) On top of subgrade or prepared subgrade before laying blanket or any where within the embankment.	ASTM D6241- 2014	1800 N
	(ii) Below the ballast and above the Blanket Layer		5800 N
V Durability Properties			
1	Abrasion Strength (% strength retained in breaking load) (*)	ASTM D4886 2018	80%
2	Ultraviolet Stability Requirement after 500 Hours of exposure Retained breaking strength in Strip tensile test	ASTM D4355- 2018	Not less than 70% (After unwrapping, the geotextile should be installed and covered within a maximum of 14 days)
3	Minimum retained Ultimate Tensile Strength(*)	EN:12447-2001 and EN ISO: 13438- 2004	50% (tested as per Clause B.4 of EN: 13250-2016, for 100 year service life)
* Is Minimum Average Roll Value (MARV), which is derived statistically as average value minus two standard deviations.			