

- ii. Manufacturer's production code from which plant location, machine and date of manufacture can be identified.
 - iii. The project or contract number.
- D. All materials used in the finished pipe shall be resistant to internal exposure to drainage flows and reagents listed in Table 1 above, when tested in accordance with the provisions of ASTM D543, to a temperature of 40°C.
- E. The liner shall meet, or exceed, the physical properties given in Table 29-4 below.

Table 29-4: Spiral Wound Liner Properties

Property	Test Method	Value
Short term flexural modulus	ASTM D790	>2400N/mm ²
Long term flexural modulus	ASTM D790	>800N/mm ²
Short term tensile strength	ASTM D638	41N/mm ²
Long term tensile strength	ASTM D638	20N/mm ²
Heat distortion temperature	-	70°C
Specific density	ASTM D1505	1.4
Allowable long term strain	-	2%
Hardness - Shore D	ASTM D2240	75

- F. At the time of installation the liner shall be homogenous throughout, uniform in colour, free of cracks, holes, foreign materials, blisters and deleterious faults.
- G. The strength of the liner shall be enhanced by the provision of stainless steel reinforcement wound into the liner at the time of installation.
- H. The steel reinforcement shall be stainless steel type 316L. The steel shall meet or exceed the physical properties given in Table 29-5 below.

Table 29-5: Physical Properties of Reinforcement

Property	Value
Tensile strength	> 250N/mm ²
Modulus of elasticity	190-200 kN/mm ²
Coefficient of thermal expansion	9 X 10 ⁻⁶ °C

- I. Stiffness of spiral wound liners and stainless steel reinforcement to be submitted for DMAT approval.