1. Scope

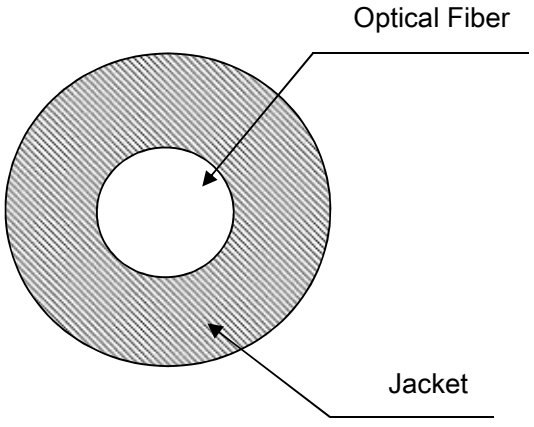
This specification covers basic requirements for the structure and optical performances of SH-4001.

2. Structure

Table 1

Item			SH-4001		
			Specification		
		Unit	Min.	Typ.	Max.
Optical Fiber	Core Material	—	Polymethyl-Methacrylate Resin		
	Cladding Material	—	Fluorinated Polymer		
	Core Refractive Index	—	1.49		
	Refractive Index Profile	—	Step Index		
	Numerical Aperture	—	0.5		
	Core Diameter	μm	920	980	1040
	Cladding Diameter	μm	940	1,000	1,060
Jacket	Material	—	Polyethylene		
	Color	—	Black		
	Diameter	mm	2.13	2.20	2.27
Approximate Weight		g/m	4		
Indication on the Jacket		—	●●● SUPER ESKA ●●● : Blue		

Sectional View



No

3. Performances

Table 2

Item		Acceptance Criterion and/or [Test Condition]	SH-4001 Specification			
			Unit	Min.	Typ.	Max.
Maximum Rating	Storage Temperature	No Physical Deterioration [in a Dry Atmosphere]	℃	-55	-	+70
	Operation Temperature	No Deterioration in Optical Properties* [in a Dry Atmosphere]	℃	-55	-	+70
		No Deterioration in Optical Properties** [under 95%RH condition]	℃	-	-	+60
Optical Properties	Transmission Loss [650nm Collimated Light]	[25℃ 50%RH]	dB/km	-	-	190
		[Operation Temperature]	dB/km	-	-	210
Mechanical Characteristics	Minimum Bend Radius	Loss Increment ≦0.5dB [A Quarter Bend]	mm	25	-	-
	Repeated Bending Endurance	Loss Increment ≦1dB [in Conformity to the JIS C 6861]***	Times	10,000	-	-
	Tensile Strength	Tensile Force at 5% Elongation [in Conformity to the JIS C 6861]	N	70	-	-
	Twisting Endurance	Loss Increment ≦1dB [Sample Length : 1m Tensile Force : 4.9N]	Times	5	-	-
	Impact Endurance	Loss Increment ≦1dB [in Conformity to the JIS C 6861]	N・m	0.2	-	-

All tests are carried out under temperature of 25℃ unless otherwise specified.

* Attenuation change shall be within +/- 10% after 1,000 hours.
** Attenuation change shall be within +/- 10% after 1,000 hours, except that due to absorbed water.
*** Bend Angle +/-90° ,Bend Radius 15mm,Tension 500g

The specifications is subject to change without notice.
The information contained herein is presented as guide for the product selection.
Please contact our business department for the issue of an official specification sheet.