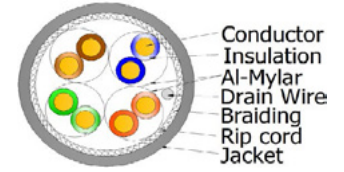


## Introduction:

TECUM shielded Cat6A S/FTP is the best selection for harsh environments and it eliminates the effect harmful electromagnetic fields based on the electrical and mechanical features mentioned in details below.



## Specification:

ITEM		UNIT	Description			
Conductor	Wire No.	/	4P			
	Material	/	Bare Copper			
	Size	AWG	23			
	Diameter	mm	0.57±0.01			
Insulation	Material	/	Skin-foam-skin PE			
	Colour	/	Blue/White-Blue	Orange/White-Orange	Green/White-Green	Brown/White-Brown
	Diameter	mm	1.3±0.05			
Foil Shield	/	/	AL-Mylar 100% Coverage			
Drain Wire	Material	/	Tinned copper			
	Size	mm	0.4±0.05			
Braid Shield	Material	/	Al-Mg ≥45% Coverage			
Rip cord	/	/	Yes			
Jacket	Material	/	PE			
	Colour	/	According Customer Requirement			
	Diameter	mm	7.8±0.3			
	Thickness	mm	0.55±0.1			

## Mechanical properties:

Operating temperature	-20 ~ 75C°
Minimum bending radius	8xCable OD
Jacket Elongation at break	≥100%
Jacket Tensile strength	≥9MPa
Jacket Aging conditions	100C°X48h
Jacket Elongation at break After Aging	≥50% Before Aging
Jacket Tensile Strength After Aging	≥70% Before Aging

**Electrical properties:**

Working capacity	$\leq 5.6\text{nF}/100\text{m}(@1\text{kHz})$
Capacitive unbalance to earth	$\leq 160\text{pF}/100\text{m}$
Delay skew	45ns/100m
Maximum conductor resistance	93.8 $\Omega$ /km
The maximum electric balance of the conductor	5%(@20C°)
Minimum insulation resistance	5000M $\Omega$ .km
Impedance: 1-100MHz	100 $\pm$ 15 $\Omega$
100-250MHz	100 $\pm$ 25 $\Omega$
250-500MHz	100 $\pm$ 32 $\Omega$

**High Frequency Electrical performance:(at 20°C 100m)**

Frequency (MHz)	ATT ( $\leq$ dB)	NEXT ( $\leq$ dB)	PSNEXT ( $\leq$ dB)	ELFEXT ( $\leq$ dB)	PS ELFEXT ( $\leq$ dB)	RL ( $\leq$ dB)	Note
1.00	2.10	74.30	72.30	64.80	20.00	19.0	Spread out 100m cable and test it
4.00	3.80	65.30	63.30	52.80	23.00	19.0	
8.00	5.30	60.80	58.80	46.70	24.50	19.0	
10.00	5.90	59.30	57.30	44.80	25.00	19.0	
16.00	7.50	56.20	54.20	40.70	25.00	18.0	
20.00	8.40	54.80	52.80	38.80	25.00	17.5	
25.00	9.40	53.30	51.30	36.80	24.30	17.0	
31.25	10.50	51.90	49.90	34.90	23.60	16.5	
62.50	15.00	47.40	45.40	28.90	21.50	14.0	
100.00	19.10	44.30	42.30	24.80	20.10	12.0	
200.00	27.60	39.80	37.80	18.80	18.00	9.0	
250.00	31.10	38.30	36.30	16.80	17.30	8.0	
350.00	34.30	37.10	35.10	15.30	16.80	6.6	
450.00	40.10	35.30	33.30	12.80	15.90	6.0	
500.00	45.30	33.80	31.80	10.80	15.20	6.0	

**Ordering Info:**

Part No.	Description
100103PESFTP	Outdoor Cat6A SFTP Cable, 23 AWG, PE Jacket, Solid twisted pair, Black