

UL2464-SB (RBT)

Conformity standard **UL 758**



Features

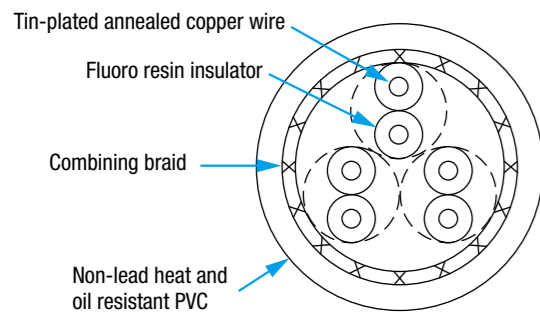
- Realizes superior abrasion and bending resistance by collaboration a fluororesin insulator and an combining braid.
- Product awarded with IPA Clean Class accreditation (Class 1).

Uses

- Power supply and signal transmission for robots, machine tools, and other equipment
- Power supply and signal transmission in clean environments such as semiconductor manufacturing facilities

Characteristics

- Rating temperature: 80°C
- Rating voltage: 300 V
- Withstand voltage: 2,000 VAC/5 min
- Min. insulating resistance (at 20°C): 1,000 MΩ·km

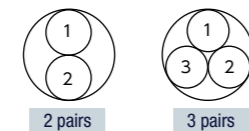


Example of cable structure

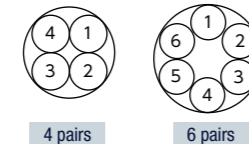
Wire core identification

Multiple pair type

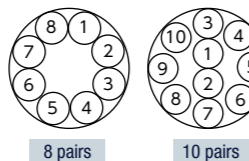
2 to 3 pairs		
Pair No.	Wire core No. 1	Wire core No. 2
1	Black	Brown
2	Black	Red
3	Brown	Red



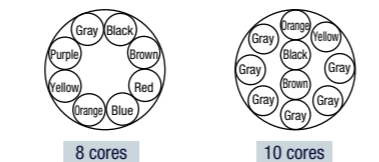
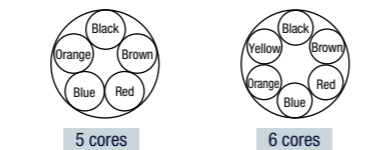
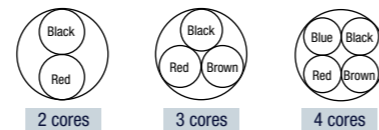
4 to 6 pairs					
Pair No.	Wire core No. 1	Wire core No. 2	Pair No.	Wire core No. 1	Wire core No. 2
1	Black	Brown	4	Brown	Red
2	Black	Red	5	Brown	Orange
3	Black	Orange	6	Red	Orange



7 to 10 pairs					
Pair No.	Wire core No. 1	Wire core No. 2	Pair No.	Wire core No. 1	Wire core No. 2
1	Black	Brown	6	Brown	Orange
2	Black	Red	7	Brown	Yellow
3	Black	Orange	8	Red	Orange
4	Black	Yellow	9	Red	Yellow
5	Brown	Red	10	Orange	Yellow



Multiple core type



Cable structure and performance

Multiple pair type of UL2464-SB (RBT)

AWG size	Configuration (No./No./mm)	Conductor		Insulator		Max. conductor resistance (at 20 °C) (Ω/km)	No. of pairs	Finished outer diameter (mm)	Approx. mass (kg/km)	Allowable current (A)	Bending radius (mm)
		Outer diameter (mm)	Standard thickness (mm)	Outer diameter (mm)							
25 (0.2mm ²)	40/0.08	0.6	0.15	0.9	104	2	5.9	40	4.0	40	
						3	6.1	46	3.5	40	
						4	6.5	55	3.2	40	
						5	7.0	65	2.7	50	
						6	7.4	75	2.5	50	
						8	8.6	95	2.3	60	
						10	9.2	110	2.2	60	
						12	9.4	120	2.0	60	
23 (0.3mm ²)	60/0.08	0.7	1.0	69.5	2	6.3	47	5.1	40		
					3	6.6	60	4.4	40		
					4	7.0	70	4.1	50		
					5	7.5	80	3.4	50		
					6	8.0	90	3.3	50		
					8	9.3	120	3.0	60		
					10	10.0	135	2.7	60		
					12	10.5	150	2.5	70		

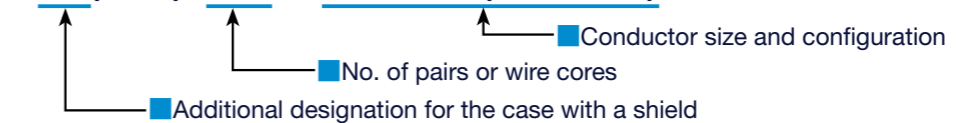
Multiple core type of UL2464-SB (RBT)

AWG size	Configuration (No./No./mm)	Conductor		Insulator		Max. conductor resistance (at 20 °C) (Ω/km)	No. of wire cores	Finished outer diameter (mm)	Approx. mass (kg/km)	Allowable current (A)	Bending radius (mm)
		Outer diameter (mm)	Standard thickness (mm)	Outer diameter (mm)							
20 (0.5mm ²)	7/14/0.08	1.0	0.4	1.8	42.3	2	6.5	50	10.0	40	
						3	6.8	60	8.4	50	
						4	7.3	75	7.5	50	
						5	7.8	85	7.0	50	
						6	8.6	100	6.6	60	
						2	6.9	60	12.7	50	
19 (0.75mm ²)	7/21/0.08	1.3	2.1	28.2	3	7.3	75	10.7	50		
					4	7.9	90	9.6	50		
					5	8.7	110	8.9	60		
					6	9.3	125	8.5	60		
					2	7.7	80	17.5	50		
					3	8.2	100	14.7	50		
17 (1.25mm ²)	7/36/0.08	1.7	2.5	16.4	4	9.0	125	13.1	60		
					5	9.8	145	12.4	60		
					6	10.5	170	11.7	70		
					2	8.8	105	23.4	60		
					3	9.3	135	19.8	60		
					4	10.5	165	17.0	70		
15 (2mm ²)	7/57/0.08	2.1	2.9	10.4	5	11.0	195	16.5	70		
					6	12.0	235	15.7	80		

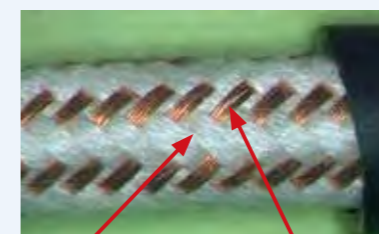
*The above-mentioned structure is a representative example. For other sizes and combinations, contact our salesperson in charge.
*The allowable current in the table above is of a value at ambient temperature of 40°C for single line wiring in air.

Example of product designation

UL2464-SB(RBT) 12P X 25AWG(40/0.08)



What is the combining braid?



Cotton yarn Annealed copper wire

The combining braid is constructed by combining annealed copper wire and cotton yarn to prevent the abrasion of shield element wires. The RBT Series adopted the combining braid, and thus realized the higher abrasion resistance and bending resistance.