Cat 5e Multi-Pair

HITACHI
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Product Highlights

- REACH & RoHS 2 compliant.
- Made in USA.
- UL Verified.
- Low Smoke Plenum construction.
- Tested from 1 to 100 MHz.
- Power sum compliance ensures minimum signal corruption due to alien crosstalk.
- Supports up to 80 watts of power.

Packaging

- 1,000 foot (305m) reels

Options

- Consult factory for 50-pair design construction and availability

Applications

- Including:

Gigabit Ethernet (IEEE 802.3ab)
100 Mbps Ethernet (IEEE 802.3u)
1000 Mbps ATM
622 Mbps ATM
15W PoE (IEEE 802.3af)
30W PoE+ (IEEE 802.3at)
60W PoE++ (IEEE 802.3bt Type 3)

Temp Range

- Storage Temperature
  -40C to +60C (-40F to +140F)
- Installation Temperature
  0C to +60C (+32F to +140F)
- Operation Temperature
  -20C to +75C (-4F to +167F)

Hitachi Cable America reserves the right to revise any specifications.

Category 5e Power Sum Multi-pair (Plenum)

(c(UL)us Listed Type CMP, CSA Type FT6)

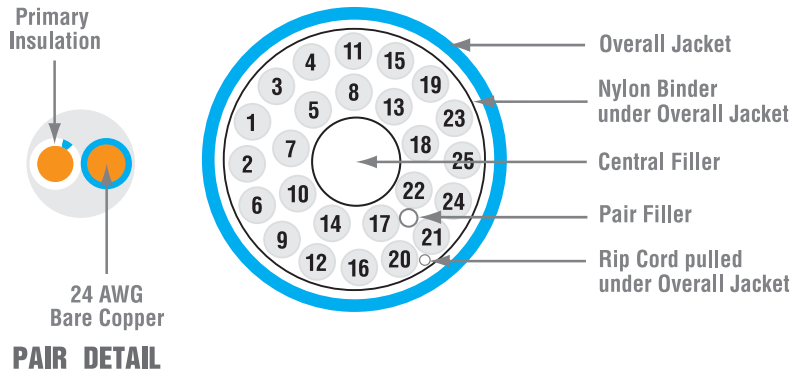
HITACHI PART NO.	NO. OF PAIRS	CALCULATED CABLE O.D. in.	mm	CABLE WEIGHT lbs/1000ft	kg/305m
30203-50	25	.454	11.531	141.0	64.0

Category 5e Power Sum Multi-pair (Riser)

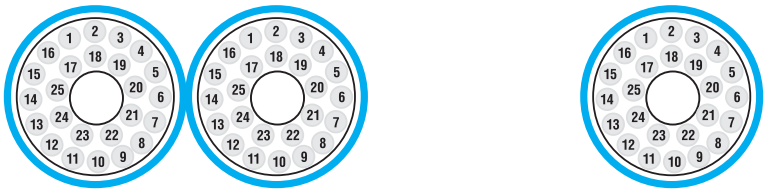
(c(UL)us Listed Type CMR, CSA Type FT4)

HITACHI PART NO.	NO. OF PAIRS	CALCULATED CABLE O.D. in.	mm	CABLE WEIGHT lbs/1000ft	kg/305m
30093-50	25	.49	12.4	133.25	60.44
30172-100	50	.49 x .99	12.45 x 25.15	267.0	121.11

Features



DIELECTRIC MATERIALS	RISER	PLENUM
Primary Insulation	Polyolefin	Plenum-rated fluoropolymer
Overall Jacket	Flame-retardant thermoplastic	Plenum-rated fluoropolymer
Central Filler	Flame-retardant thermoplastic	Plenum-rated polymer
Pair Filler	Flame-retardant thermoplastic	Plenum-rated polymer



50-pair 25-pair

Diagram scale approx. 3:1

Category 5e

Electrical Characteristics

Input impedance	100 ± 15Ω (1.0 to 100 MHz)
Maximum resistance unbalance	5%
Maximum capacitance unbalance	330 pF/100 meters
Maximum delay skew	45 ns/100 meters
Nominal velocity of propagation (NVP)	68%, riser 70%, plenum
Voltage Rating	300 Volts
Ampacity[1]	.4 Amps/conductor

Transmission Specifications

ANSI/TIA 568-C.2 Category 5e Verified

ISO/IEC 11801, 2nd ed. Class D Compliant

	Ins. Loss		NEXT		PSNEXT		ACR		PSACR		ACRF		PSACRF		Return Loss	
Freq. (MHz)	Std.	Max.	Std.	Min.	Std.	Min.	Cal.	Min.	Cal.	Min.	Std.	Min.	Std.	Min.	Std.	Min.
1	2.0	2.0	65.3	65.3	62.3	62.3	63.3	63.3	60.3	60.3	63.8	63.8	60.8	60.8	20.0	20.0
4	4.1	4.1	56.3	56.3	53.3	53.3	52.2	52.2	49.2	49.2	51.8	51.8	48.8	48.8	23.0	23.0
8	5.8	5.8	51.8	51.8	48.8	48.8	46.0	46.0	43.0	43.0	45.7	45.7	42.7	42.7	24.5	24.5
10	6.5	6.5	50.3	50.3	47.3	47.3	43.8	43.8	40.8	40.8	43.8	43.8	40.8	40.8	25.0	25.0
16	8.2	8.2	47.2	47.2	44.2	44.2	39.0	39.0	36.0	36.0	39.7	39.7	36.7	36.7	25.0	25.0
31.25	11.7	11.7	42.9	42.9	39.9	39.9	31.2	31.2	28.2	28.2	33.9	33.9	30.9	30.9	23.6	23.6
62.5	17.0	17.0	38.4	38.4	35.4	35.4	21.4	21.4	18.4	18.4	27.9	27.9	24.9	24.9	21.5	21.5
100	22.0	22.0	35.3	35.3	32.3	32.3	13.3	13.3	10.3	10.3	23.8	23.8	20.8	20.8	20.1	20.1

1. Ampacity rating per NEC 725.144 of NFPA NEC (2017) up to 192 cable bundle.