

ROME STEEL ARMORED HEALTH CARE FACILITIES CABLE

Type ACTHH / HCF, 90°C, 600 Volts

2, 3 or 4 THHN Conductors plus Green Ground, Steel Armor

<p>APPLICATION: For wiring systems in hospitals, nursing homes, and other health related facilities requiring cables containing an insulated grounding conductor for proper grounding of all equipment subject to personnel contact. Cables have 90°C rated conductors for use in dry locations, and are suitable for use on ac circuits up to 600 volts. Cables may be used in cable tray and in environmental air-handling ceilings.</p> <p>STANDARDS:</p> <ol style="list-style-type: none"> Listed by Underwriters Laboratories as Type ACTHH per UL Standard 4 for Armored Cable. One and two hour fire rated per ANSI/UL Std 1479 for walls, ceilings and floor assemblies. Conforms to Federal Specification J-C-30B. Conforms to National Electrical Code, Article 333. <p>CONSTRUCTION: Two, three or four circuit conductors of annealed solid uncoated copper with color coded PVC-Nylon (THHN) insulation, plus one grounding conductor of annealed uncoated copper with green PVC-Nylon (THHN) insulation, paper wrap over each conductor, cabled, aluminum bonding strip, galvanized steel interlocked armor.</p>						
Standard Package						
Trade Size	Type of Circuit Conductors	Nominal Diameter Inches	Ampacity	Approx. Wt. Lb./1000 Ft.	Coil	NR Reel
14-2	THHN - Solid	.473	15	195		
14-3	THHN - Solid	.507	15	220		
14-4	THHN - Solid	.543	15	260		
12-2	THHN - Solid	.510	20	235	250'	1000'
12-3	THHN - Solid	.548	20	273	250'	1000'
12-4	THHN - Solid	.589	20	315		
10-2	THHN - Solid	.579	30	305		
10-3	THHN - Solid	.625	30	360		
10-4	THHN - Solid	.675	30	420		

NOTES: 1. Color Coding: 2/C - black, white + green
 3/C - black, white, red + green
 4/C - black, white, red, blue + green

Information on this sheet subject to change without notice.

Specification

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1. SCOPE

- 1.1 This specification describes two, three and four conductor Rome Steel Armored Health Care Facilities Cable, Type ACTHH, employing circuit conductors #14 to #10 AWG solid uncoated copper with THHN insulation and galvanized steel interlocked armor cladding. All cables contain a solid green THHN grounding conductor. The cables are suitable for use in dry locations at temperatures not exceeding 90°C on ac circuits up to 600 volts. Cables are intended for wiring systems in hospitals, nursing homes, and other health care related facilities in applications covered by Articles 333 and 517 of the National Electrical Code. Cables may also be used in environmental air handling ceilings per NEC 300-22(c). The cables are listed For CT Use for installation in cable trays. They are also one and two hour fire rated per ANSI/UL 1479 for use in walls, ceilings and floor assemblies.

2. APPLICABLE STANDARDS

- 2.1 The following standards form a part of this specification to the extent specified herein:
 - 2.1.1 Underwriters Laboratories Standard 4 for Armored Cable.
 - 2.1.2 Underwriters Laboratories Standard 83 for Thermoplastic Insulated Wires.
 - 2.1.3 Federal Specification J-C-30B.
 - 2.1.4 National Electrical Code - Article 333.

3. CONDUCTORS

- 3.1 Conductors shall be solid annealed uncoated copper per UL Standard 4 and UL Standard 83.

4. INSULATION

- 4.1 Each circuit conductor and the grounding conductor shall be insulated with PVC and jacketed with Nylon complying with the physical and electrical requirements of UL Standard 83 for Type THHN.
- 4.2 The average thickness of insulation, for a given conductor size, shall be as specified in UL Standard 83 for Type THHN. The minimum thickness at any point of the PVC insulation, shall not be less than 90% of the specified average thickness. The minimum thickness at any point of the nylon jacket, shall be as specified for Type THHN wire. The insulation shall be applied tightly to the conductor and shall be free-stripping.
- 4.3 Circuit conductor color coding shall be: 2/C - black, white; 3/C - black, white, red; 4/C - black, white, red, blue. The grounding conductor in each cable shall be green.
- 4.4 Each circuit conductor and ground shall be covered with a treated paper complying with the requirements of UL Standard 4.

5. ASSEMBLY

- 5.1 Insulated conductors shall be cabled together. Length of lay shall be in accordance with the requirements in UL Standard 4.

6. ARMOR

- 6.1 A galvanized steel interlocked armor shall be applied over the cable core complying with the requirements of UL Standard 4.
- 6.2 An aluminum bonding strip shall be placed between the conductor assembly and armor in accordance with the requirements in UL Standard 4. The bonding strip shall not be smaller than No. 16 AWG.
- 6.3 Armor shall be applied so that an insulating bushing can be readily inserted between the conductors and the armor at each termination.

7. TESTS

- 7.1 Cable shall be tested in accordance with UL requirements for Type ACTHH Armored Cable.
- 7.2 Cable shall be capable of passing the ribbon burner flame test requirements of UL and shall be UL listed For CT Use.