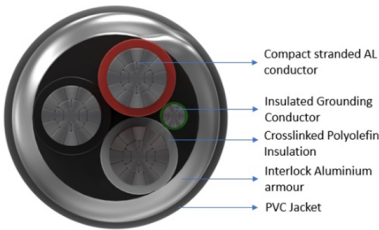
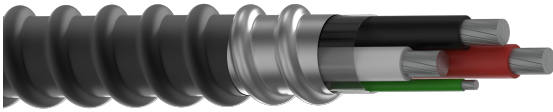


POLYCAB AL XHHW-2 TYPE MC ALUMINIUM ARMOUR PVC JACKET

Industrial Cable, 600/1000 V AC



Images not to scale. Follow table for dimensions

APPLICATION

POLYCAB AL XHHW-2 Type MC Aluminium armour PVC jacketed cable is recommended to use in commercial, residential, industrial as well as non-patient care area of health care facilities (NEC 517.12) as power, control, signal and lighting cable. It is suitable to use in theatre, audience area of motion pictures, television studio and similar location (NEC 520.5) also it is allowable in assembly occupancies (NEC 518.4). It can be used as branch circuits to swimming pool, hot tub and spa application as per NEC 680.14 and 330.12(2)(a) and (b); in Class I Div. 2, Class II Div. 2 and Class III Div. 1 hazardous locations. It is suitable to install in cable tray (NEC 392) and also in open air, raceway, channel, conduit and duct; permitted as arial cable on a messenger (NEC 396.10(A)). It can be installed under raised floor for IT equipment (NEC 645.5 (E)). Further, it may be installed in direct burial or embedded in concrete (NEC 330.12(2)(a) or sunlight exposed area and also in wet (NEC 330.10(A)(11)) or dry location.

CHARACTERISTICS

Voltage Rating
600/1000 V

Operation Temperature
-25°C to 90°C

OUTSTANDING FEATURES

- Heat resistant
- Sunlight resistant
- Flame retardant

STANDARD FOLLOWS

ASTM B800, ASTM B801, ASTM B836
UL 44
UL 1569
UL 1685
NFPA 70 ARTICLE 330
NEMA RV-1
ANSI/NEMA WC 70/ICEA S-95-658-2021

COMPLIANCE

Conductor resistance test ASTM B801
Insulation resistance UL 44
Vertical tray flame test UL 1685
FT4 Test UL 1685, IEEE 1202
(For 1/0 AWG and above)
RoHS & REACH

CONSTRUCTION

- Compact Stranded conductor Aluminium Alloy AA 8000 series as per ASTM B800, ASTM B801 & ASTM B836
- Accompanied with green insulated compact stranded Aluminium alloy AA 8000 series grounding conductor as per ASTM B800, ASTM B801 & ASTM B836.
- Insulated with a flame retardant Crosslinked Polyolefin type XHHW-2 as per UL 44.
- Binder tape rapped over the cores as per UL 1569
- Interlock Aluminium armour is applied over the assembly.
- Sunlight resistant, flame-retardant PVC jacket is applied over the complete assembly. Colour: Black

Core Identification

No.	120V/208V/240V	No	277V/480V
2	Black/White	2	Brown/Gray
3	Black/Red/White	3	Brown/Orange/Gray
4	Red/Black/White/Blue	4	Brown/Orange/Yellow/ Gray
Ground	Green	Ground	Green

APPROVAL



NOTES

**Also available with lightweight galvanised steel armour.

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Table 1: Dimensional Characteristics

No. of core	Conductor size	Insulation thickness	Ground wire size	Ground wire insulation	Nominal overall diameter	Approximate weight per 1000 ft
	AWG or kcmil	mils	AWG		inch	lbs
3	6	45	6	Green insulated	0.902	352
4	6	45	6	Green insulated	0.974	415
3	4	45	6	Green insulated	1.009	435
4	4	45	6	Green insulated	1.075	515
3	3	45	6	Green insulated	1.028	477
4	3	45	6	Green insulated	1.126	578
3	2	45	4	Green insulated	1.099	561
4	2	45	4	Green insulated	1.207	680
3	1	55	4	Green insulated	1.217	674
4	1	55	4	Green insulated	1.340	825
3	1/0	55	4	Green insulated	1.280	765
4	1/0	55	4	Green insulated	1.409	942
3	2/0	55	4	Green insulated	1.356	871
4	2/0	55	4	Green insulated	1.497	1081
3	3/0	55	4	Green insulated	1.444	1014
4	3/0	55	4	Green insulated	1.624	1300
3	4/0	55	2	Green insulated	1.570	1219
4	4/0	55	2	Green insulated	1.760	1559
3	250	65	2	Green insulated	1.713	1453
3	250	65	1	Green insulated	1.739	1488
4	250	65	1	Green insulated	1.934	1861
3	300	65	1	Green insulated	1.836	1670
4	300	65	1	Green insulated	2.047	2099
3	350	65	1	Green insulated	1.938	1855
4	350	65	1/0	Green insulated	2.162	2365
4	350	65	4/0	Green insulated	2.229	2501
3	400	65	1	Green insulated	2.024	2046
4	400	65	1/0	Green insulated	2.269	2617
4	400	65	3/0	Green insulated	2.301	2695
3	500	65	1	Green insulated	2.167	2397
3	500	65	2/0	Green insulated	2.193	2458
3	500	65	3/0	Green insulated	2.227	2508
3	500	65	250	Green insulated	2.271	2625
4	500	65	2/0	Green insulated	2.491	3191
4	500	65	3/0	Green insulated	2.500	3234
4	500	65	250	Green insulated	2.552	3355

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POLYCAB AL XHHW-2 TYPE MC ALUMINIUM ARMOUR PVC JACKET

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No. of core	Conductor size	Insulation thickness	Ground wire size	Ground wire insulation	Nominal overall diameter	Approximate weight per 1000 ft
	AWG or kcmil	mils	AWG		inch	lbs
3	600	80	1/0	Green insulated	2.428	2961
3	600	80	4/0	Green insulated	2.477	3094
3	600	80	350	Green insulated	2.555	3187
3	600	80	400	Green insulated	2.564	3337
4	600	80	3/0	Green insulated	2.749	3846
3	750	80	1/0	Green insulated	2.633	3499
3	750	80	3/0	Green insulated	2.655	3575
4	750	80	3/0	Green insulated	2.964	4545
4	750	80	750	Green insulated	3.231	5351

Table 2: Electrical Characteristics

Conductor Size	*Allowable ampacity (Amp.)			Maximum DC resistance at 20°C
AWG	60°C	75°C	90°C	Ω/km
6	40	50	55	2.21
4	55	65	75	1.39
3	65	75	85	1.10
2	75	90	100	0.875
1	85	100	115	0.693
1/0	100	120	135	0.550
2/0	115	135	150	0.436
3/0	130	155	175	0.346
4/0	150	180	205	0.274
250	170	205	230	0.232
300	195	230	260	0.194
350	210	250	280	0.166
400	225	270	305	0.145
500	260	310	350	0.116
600	285	340	385	0.0967
700	315	375	425	0.0829
750	320	385	435	0.0774

*Allowable ampacities shown are for general use as specified by the NEC 2011 Edition Section 310.16.

60°C – Relevant for TW and UF Aluminium wires

75°C – Relevant for RHW, THHW, THW, THWN, XHHW, XHWN & USE Aluminium wires

90°C – Relevant for TBS, SA, SIS, RHH, RHW-2, THHN, THHW, THW-2, THWN-2, USE-2, XHH, XHHW, XHHW-2, XHWN-2 and XHHN Aluminium wires

Notes:

Section 310.15(B) shall be referenced for ampacity correction factors where the ambient temperature is other than 30°C (86°F).

Section 310.15(C)(1) shall be referenced for more than three current-carrying conductors.

Section 310.16 shall be referenced for conditions of use