## **Copper to Aluminum Conversion Chart**

As the demand for cost-effective and efficient electrical solutions continues to grow, many electrical professionals and engineers are exploring copper-to-aluminum cable conversions as a viable alternative. Aluminum conductors offer significant advantages in terms of weight and cost savings, making them an attractive option for various commercial, industrial, and utility applications. However, successful conversion requires a clear understanding of the differences in material properties, sizing considerations, and installation practices to ensure compliance with performance and safety standards.

This guide aims to provide an overview of the key factors involved in transitioning from copper to aluminum cables.

Copper to Aluminum Ampacity Conversion		
Size	Copper 90°C THHN, XHHW-2, RHW-2, USE-2	Aluminum 90°C THHN, XHHW-2, RHW-2, USE-2
8	55	45
6	75	55
4	95	75
3	115	85
2	130	100
1	145	115
1/0	170	135
2/0	195	150
3/0	225	175
4/0	260	205
250	290	230
300	320	260
350	250	280
400	380	305
500	430	350
600	475	385
700	520	425
750	535	435
800	555	445
900	585	480

The data in this table is obtained from NEC 310.15(B)(16) 2017 based on ambient temperature 30 deg. *C* and is for reference only





