

T&B Conduit Fittings

Liquatite® Flexible Conduit—Aluminum

Type ACEA—Non-Halogen, Low Smoke, Flame Retardant



Type ACEA

This liquidtight flexible aluminum conduit is designed for applications where safety concerns exist regarding a material's reaction in a fire situation.

Trade Size	Type	Min. Jacket Thick. (mm)	Inside Bend Radius (mm)	Weight Kilogram 30 m	Length (m)	Cat. No.	Carton		Length (m)	Cat. No.	Reel		Length (m)	Cat. No.
							Length (m)	Cat. No.			Length (m)	Cat. No.		
3/8	ACEA038	0.8	50.8	5	60	ACEA038-30	-	-	300	ACEA038-300	-	-	-	-
1/2	ACEA050	0.8	63.5	7	30	ACEA050-30	30	-	300	ACEA050-300	-	-	-	-
3/4	ACEA075	0.9	76.2	9	30	ACEA075-30	45	ACEA075-45	150	ACEA075-150	-	-	-	-
1	ACEA100	0.9	101.6	13	30	ACEA100-30	-	-	120	ACEA100-120	-	-	-	-
1-1/4	ACEA125	0.9	114.3	18	15	ACEA125-15	-	-	75	ACEA125-75	-	-	-	-
1-1/2	ACEA150	1.0	139.7	25	15	ACEA150-15	-	-	45	ACEA150-45	-	-	-	-
2	ACEA200	1.0	177.8	33	15	ACEA200-15	-	-	30	ACEA200-30	-	-	-	-
2-1/2	ACEA250	1.3	241.3	47	8	ACEA250-8	-	-	-	-	-	-	-	-
3	ACEA300	1.3	330.2	60	8	ACEA300-8	-	-	-	-	-	-	-	-
4	ACEA400	1.5	355.6	87	8	ACEA400-8	-	-	-	-	-	-	-	-
5	ACEA500	2.5	508.0	114	8	**	-	-	-	-	-	-	-	-
6	ACEA600	2.5	571.5	143	8	**	-	-	-	-	-	-	-	-

See Chart on p.155 for dimensions and tolerances.

* See p.155 for label and packaging detail.

**Available on request.

Type ACEA Combustion & Flammability Properties

Combustion & Flammability Properties**	Test	Value
-Vertical Burn (Material)	UL94	V-0 Rating No Flaming Drips
-Vertical Burn (Conduit)	UL360	Pass No Flaming Drips
-Oxygen Index %	D2863	28.5
-Flame Spread Index	ASTM E162	9.8
-Flame Propagation	ASTM C542 (NFPA-130)	Pass No Flaming Drips
-Smoke Generation (Flaming)	ASTM E662 (NFPA 258)	Dm 103 (Corrected) Ds 47 @ 4.0 min
-Smoke Generation (Non-Flaming)	ASTM E662 (NFPA 258)	Dm 91 (Corrected) Ds 5 @ 1.5 min
-Toxic Gas Generation	SMP 801	Pass
-Toxicity Index	NES 713	3.9

**Test data is based on controlled laboratory conditions and does not necessarily reflect performance in actual fire conditions. Additional product information available upon request.

Construction

The flexible inner core of this product is made from an aluminum strip. As in type CEA, this core contains string packing between the helical convolutions in trade sizes 3/8" through 1-1/4". The specially formulated thermoplastic polyurethane jacket has excellent flame retardant characteristics as well as low smoke and toxicity generation characteristics. Acidic gases such as hydrogen chloride, hydrogen fluoride and hydrogen bromide are virtually eliminated as products of combustion.

Applications

This product is ideally suited for installation in confined or enclosed areas where construction materials must generate very little smoke, and have a low flame spread as well as low toxic gas emissions in the event of fire. Such applications include mass transit vehicles where ACEA is extensively used for wiring harnesses within and under passenger rail cars. Other applications include use in underground subway structures and tunnels.

Working Temperatures

-40°C to 80°C

Standard Colours

Machine Tool Grey. Other colours available upon request.

Note

A UL listed version is pending. Consult factory for availability of type ZHLA.