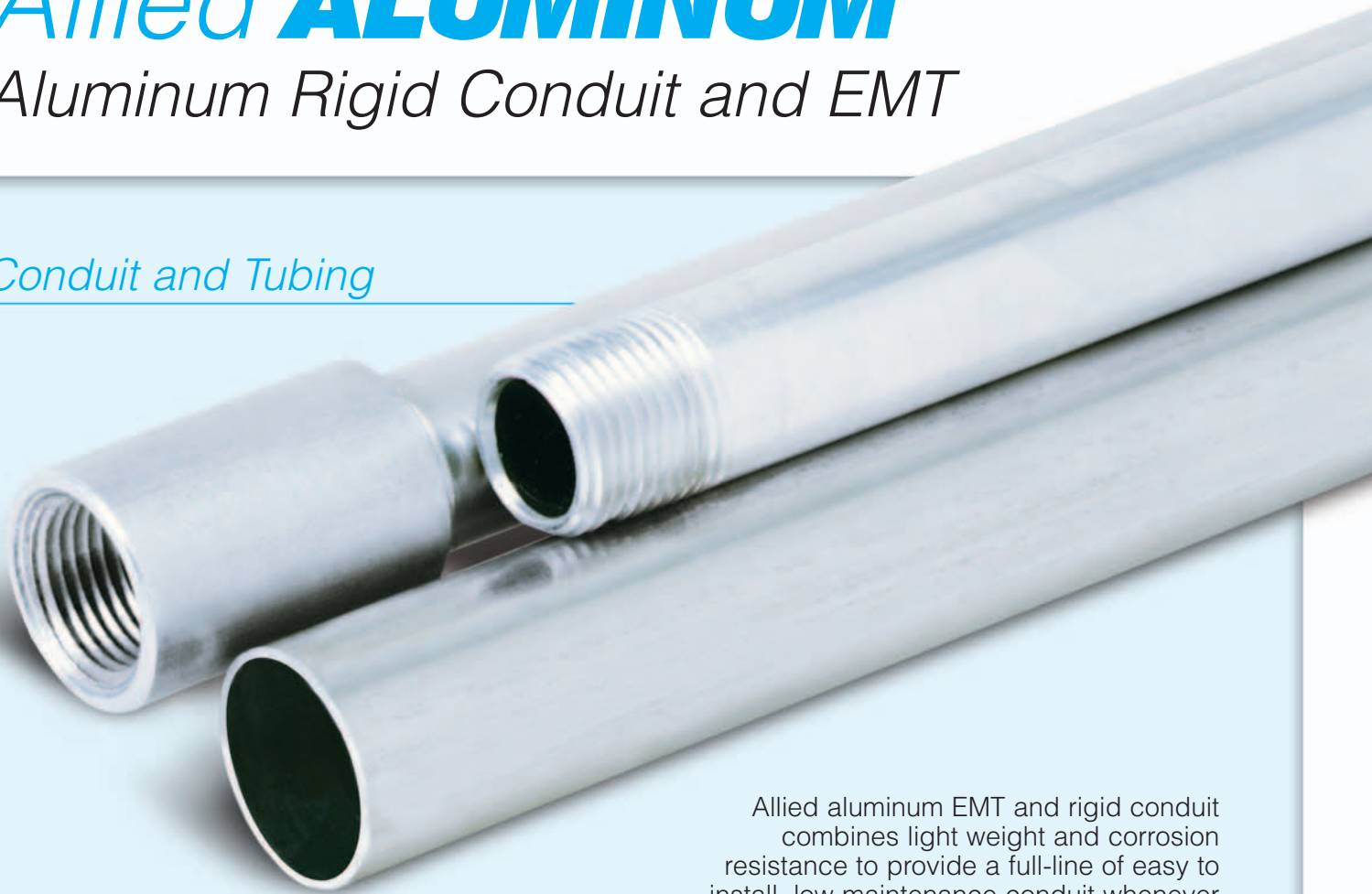


Allied **ALUMINUM**

Aluminum Rigid Conduit and EMT

Conduit and Tubing



Allied aluminum EMT and rigid conduit combines light weight and corrosion resistance to provide a full-line of easy to install, low maintenance conduit whenever specifications call for aluminum.

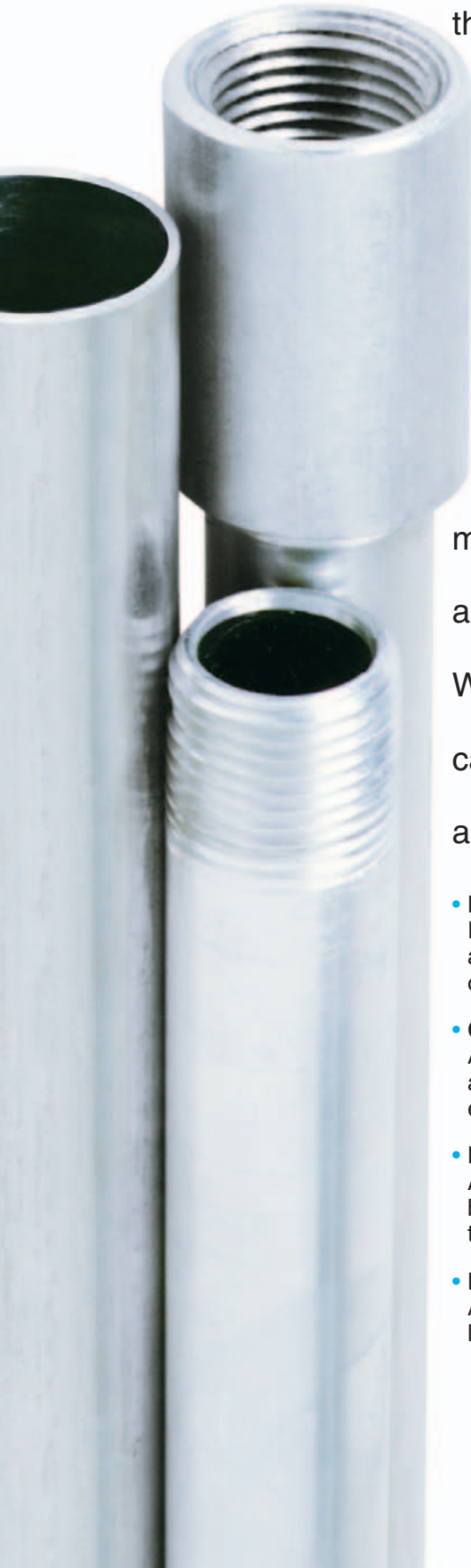
Couplings and Elbows

Allied provides a broad assortment of couplings and elbows for rigid as well as couplings, elbows and set-screw couplings for EMT. Allied rigid aluminum fittings are manufactured of 6063 alloy in temper designation T-1, while EMT is manufactured of 6005 alloy.



 **allied**
TUBE & CONDUIT

Allied **ALUMINUM** PROVIDES COMPLETE LINE OF CONDUIT, TUBING AND FITTINGS



Allied Tube & Conduit,
the leading manufacturer
of steel conduit and
tubing, now offers a
broad line of rigid
aluminum conduit,
elbows and couplings
plus aluminum electrical
metallic tubing, elbows
and set-screw couplings.
When your specifications
call for the properties of
aluminum, Allied delivers.

- **Light Weight**
Rigid aluminum conduit is approximately one-third the weight of steel.
- **Corrosion Resistant**
Aluminum resists most corrosive atmospheres in industrial environments.
- **Easy to Install**
Aluminum conduit can be easily cut, bent and threaded without special tools.
- **Low Maintenance**
Aluminum conduit does not corrode or leave discoloring streaks or stains.

RECOMMENDED INSTALLATION PRACTICES

CUTTING:

A hacksaw is recommended to cut trade sizes 1¹/₄ and smaller. Larger trade sizes can be cut with power cut-off equipment.

BENDING:

Standard EMT benders, one size larger than the size of the conduit, should be used on conduit trade sizes 1 and smaller. For sizes over trade size 1, conventional equipment is recommended.

THREADING:

Sharp dies and conventional cutting oil should be used for aluminum conduit. A general purpose emulsifiable oil can provide excellent results.

FITTINGS:

Aluminum fittings are recommended; however, cadmium plated or galvanized fittings are satisfactory for most installations.

FISHING AND WIRE PULLING:

Small Conduit: In trade sizes up to 1¹/₂ and on shorter runs (up to 100 feet), polyethylene fish tapes can be used effectively. Also recommended are round, flexible, speedometer-type steel cables. Use of flat steel tapes should be avoided since they tend to jam in the bends, or if not used carefully, scrape and cut conduit walls.

Large Conduit: For pulling large conductors through larger conduit or longer runs, polypropylene rope is recommended. Steel pulling cables, especially when old or frayed, can damage steel or aluminum conduit.

IN SOIL OR CONCRETE:

Underwriters' Laboratories *Electrical Construction Equipment Directory* (UL Green Book) states that aluminum conduit used in concrete or in contact with soil requires supplementary corrosion protection. Examples of supplementary protection are paints approved for the purpose (bitumastic paint, for example), tape wraps approved for the purpose, or PVC coated conduit.

Allied ALUMINUM Rigid Specifications



SPECIFICATION DATA

ALLOY: Allied Rigid Aluminum Conduit is manufactured of 6063 alloy in temper designation T-1. The fittings are of the same alloy.

STANDARDS: Allied Rigid Aluminum Conduit is listed by Underwriters' Laboratories to U.L. 6A, "Standard for Electrical Rigid Metal Conduit — Aluminum, Red Brass and Stainless Steel" and is manufactured to ANSI C80.5. (Replaces Federal specification WWC-540C).

THREAD PROTECTORS: Color-Coded end caps keep threads clean and sharp and help provide trade size recognition. Even sizes are blue; 1/2 trade sizes are black; and 1/4 trade sizes are red.

Weights and Dimensions for Rigid Aluminum Conduit

Trade Size Designator		Approx. Wt. Per 100 Ft. (30.5M)		Nominal Outside Diameter		Nominal Wall Thickness		Quantity In Master Bundle	
U.S.	Metric	lb.	kg	in.	mm	in.	mm	ft.	m
1/2	16	28.1	12.7	0.840	21.3	0.104	2.64	2500	762.5
3/4	21	37.4	17.0	1.050	26.7	0.107	2.72	2500	762.5
1	27	54.5	24.7	1.315	33.4	0.126	3.20	2000	610.0
1-1/4	35	71.6	32.5	1.660	42.2	0.133	3.38	1000	304.8
1-1/2	41	88.7	40.2	1.900	48.3	0.138	3.51	1000	304.8
2	53	118.5	53.8	2.375	60.3	0.146	3.71	450	137.2
2-1/2	63	187.5	85.0	2.875	73.0	0.193	4.90	300	91.5
3	78	246.3	111.7	3.500	88.9	0.205	5.21	200	61.0
3-1/2	91	295.6	134.1	4.000	101.6	0.215	5.46	200	61.0
4	103	350.2	155.8	4.500	114.3	0.225	5.72	200	61.0
5	129	478.9	217.2	5.563	141.3	0.245	6.22	80	23.4
6	155	630.4	285.9	6.625	168.3	0.266	6.76	60	18.3

NOTE:

- Dimensions and weights are nominal unless otherwise noted.
- Each length of conduit with coupling attached will be nominally 10 feet.

Couplings

Trade Size Designator		Approx. Wt. Per 100 Ft. (30.5M)		Nominal Outside Diameter		Length		Standard Package
U.S.	Metric	lb.	kg	in.	mm	in.	mm	Pieces
1/2	16	6.1	2.8	1.08	27.4	1.56	39.6	100
3/4	21	9.1	4.1	1.33	33.8	1.62	41.1	50
1	27	12.5	5.7	1.56	39.6	2.00	50.8	30
1-1/4	35	18.9	8.6	1.95	49.5	2.06	52.3	25
1-1/2	41	23.3	10.6	2.22	56.4	2.06	52.3	25
2	53	34.6	15.7	2.75	69.8	2.12	53.8	15
2-1/2	63	68.3	31.0	3.28	83.3	3.12	79.2	20
3	78	91.4	41.5	3.94	100.8	3.25	82.6	15
3-1/2	91	108.0	49.0	4.44	112.8	3.37	85.6	12
4	103	142.0	64.4	5.00	127.0	3.50	88.9	12
5	129	241.9	109.7	6.30	160.0	3.75	95.3	8
6	155	321.0	145.6	7.39	187.7	4.00	101.6	6

Elbows

Trade Size Designator		Approx. Wt. Per 100 Ft. (30.5M)		Nominal Dimensions					
U.S.	Metric	lb.	kg.	A		B		C	
				in.	mm	in.	mm	in.	mm
1/2	16	29	13.2	4.0	101.6	6.50	165.1	2.50	63.5
3/4	21	43	14.5	4.5	114.3	7.25	184.2	2.75	69.9
1	27	71	32.2	5.75	146.1	8.375	212.7	2.875	73.0
1-1/4	35	110	49.9	7.25	184.2	10.25	260.6	3.00	76.2
1-1/2	41	153	69.4	8.25	209.6	11.875	301.6	3.625	92.1
2	53	249	112.9	9.50	241.3	14.0	355.6	4.50	114.3
2-1/2	63	437	198.2	10.50	266.7	15.75	400.1	5.25	133.4
3	78	767	347.9	13.00	330.2	18.75	476.3	5.75	146.1
3-1/2	91	1036	469.9	15.00	381.0	21.75	552.5	6.75	171.5
4	103	1228	557.0	16.00	406.4	23.00	584.2	7.00	177.8
5	129	2490	1129.5	24.00	609.6	36.00	914.4	11.00	279.4
6	155	3850	1746.3	30.00	762.0	42.50	1079.5	12.50	317.5

Allied **ALUMINUM**

EMT Specifications



Weights and Dimensions for Aluminum EMT

Trade Size Designator		Approx. Wt. Per 100 Ft. (30.5M)		Nominal Outside Diameter		Nominal Inside Diameter		Quantity In Master Bundle	
U.S.	Metric	lb.	kg	in.	mm	in.	mm	ft.	m
2	53	57.3	26.0	2.197	55.8	2.051	52.09	on request	
2-1/2	63	84.6	38.4	2.875	73.0	2.711	68.85	1360	414.5
3	78	106.0	48.1	3.500	88.9	3.332	84.63	1060	323.1
3-1/2	91	137.1	62.2	4.000	101.6	3.810	96.77	960	292.6
4	103	159.4	72.3	4.500	114.3	4.304	109.32	680	207.3

SPECIFICATION DATA

ALLOY: Allied Aluminum Electrical Metallic Tubing (EMT) is manufactured of 6005 alloy; 98.5% purity aluminum.

STANDARDS: Allied aluminum EMT and elbows are listed by Underwriters' Laboratories to U.L. 797A "Standard for Electrical Metallic Tubing - Aluminum". (Replaces Federal specification WW-C-563A). Aluminum set-screw couplings are listed by U.L. to U.L. 514B "Standard for Fittings for Cable and Conduit".

EMT Set-Screw Couplings

Trade Size Designator		Standard Pack	Nominal Weight per 100	
U.S.	Metric		lb.	kg
2	53	12	28	12.7
2-1/2	63	12	44	19.9
3	78	12	62	28.1
3-1/2	91	12	79	35.8
4	103	12	89	40.4

For more information, contact Allied at (800) 882-5543, or visit our website at www.atcelectrical.com

EMT Elbows

Trade Size Designator		Standard 90° Dimensions						Standard Pack	Nominal Weight per 100			
		A		B		C			45°		90°	
U.S.	Metric	in.	mm	in.	mm	in.	mm		lb.	kg	lb.	kg
2	53	9.5	241.3	12.250	311.2	2.75	69.85	5	45	20.4	65	29.5
2-1/2	63	10.5	266.7	13.500	342.9	3.00	76.20	5	98	44.5	140	63.5
3	78	13.0	330.2	16.125	409.6	3.125	79.36	5	142	64.4	203	92.1
3-1/2	91	15.0	381.0	18.250	463.6	3.25	82.55	5	211	95.7	301	136.5
4	103	16.0	406.4	19.375	492.1	3.375	85.73	5	252	114.3	360	163.3

tyco

Electrical &
Metal Products

AFC Cable Systems® • Allied Tube & Conduit • Cope® Cable Tray • Power-Strut® Metal & Fiberglass Framing

