
TECHNICAL DATA SHEET

Liquid-tight fittings, high temperature - Series 5300-HT

For liquid-tight flexible metallic conduit

T&B Liquidtight Systems®



Steel and malleable iron liquid-tight fittings that meet the demand for indoor or outdoor extreme temperature installations.

Certifications / Standards:


Features & Benefits:

- Meets UL 514B and CSA C22.2, No. 18.3 for liquid-tight fittings
- Full compliance to IEC 61386-1, -23 requirements, CE Certified
- Trade sizes from 3/8" to 4" (12mm to 103mm)
- Insulated throat protect conductor jackets
- Straight, 45° and 90° conduit bodies
- NPT Threads
- Coordinated performance with T&B Liquidtight Systems Flexible Metallic Conduits
- Ingress protection ratings aligned with industrial enclosures
- Safe Edge® ground cones provide superior bonding
- Double Bevel Sealing Ring eases assembly and insures lliquid-tight performance
- Heat curled insulators protect wire sheathing from damage

Applications:

- Typical applications include raceway for industrial installations such as ovens, foundries, refrigeration, solar collectors, lumber kilns, pump skids, etc.
- Used where liquid tight flexible metallic raceway is installed in outdoor or indoor locations, and exposed to continuous or intermittent moisture
- Used to positively bond flexible liquid-tight flexible metallic conduit to boxes or enclosures
- Liquid-tight applications against water, oils, cutting fluids, mild acids
- For use in electrical circuits up to 1,000 V
- Suitable for use in Class 1 Division 2, Class 2 Division 1 & 2 Hazardous Locations per NEC® Section 500

Construction / Material / Finish:

- Trade sizes 3/8" to 1 1/4" Steel with Zinc Chromate finish
- Trade sizes 1-1/2" to 4" malleable iron with Zinc Chromate finish
- Zinc Plated Steel ground cones provide superior bonding
- Wide temperature polymers to meet application requirements
- Halogen Free seal rings, insulators and seal gaskets
- Tempered cast locknuts with teeth for vibration resistance

Environment ratings:
Working Temperature:

- UL: Gen: -20 to +105°C (-4 to +221°F)
- CSA: Gen: -20 to +105°C (-4 to +221°F)
- IEC/CE: Gen: -45 to +150°C (-49 to +302°F) Static
Gen: -25 to +105°C (-13 to +221°F) Dynamic
- General: Dry: -60 to +150°C (-76 to +302°F) Static

Chemical Resistance Guide:

- See Publication TDS000081 (Fittings: Steel, Iron & PA66 Polyamide)
- See Publication TDS000117 (Liquid Tight Flexible Metal Conduits)

Conforms to:

- UL 514B, Fittings for Cable and Conduit
 - File: E23018
- CSA C22.2, No. 18.3, Outlet and Conduit Boxes, Fittings and Accessories
 - File: LR-4484
- IEC/EN 61386-1, -23, Conduit Systems for Cable Management
 - EU DoC: EC-012-7191
- RoHS (Restriction of Hazardous Substance directive)
- NEMA FB-1 (Fittings and Conduit Bodies)
- JIC EGP1 (Electrical standard for GP machine tools)
- JIC EMP1 (Electrical Standard for Mass Production Engineering)
- Federal Specification A-A 50552 (Fittings for flexible conduit)
- Federal Specification H-28 (Threads)

Ingress Protection:

- Provides "Ingress Integrity" between enclosures, fittings, conduits & seals when using Series 52/53 liquid-tight fittings and T&B Liquidtight Systems LFMC
- Covers all trade sizes from 3/8" to 4" (12mm to 103mm)
- Ingress ratings require use of Series 5260 Seal Gaskets

UL, CSA & NEMA system ingress ratings:

- UL Listed type ratings tested to UL 50E requirements with UL Listed LFMC
- UL File No.: E23018
 - Indoor: Type 4, 12, 13
 - Outdoor: Type 3, 3R, 4
- CSA C22.2, No. 94.2: Type 3, 3R, 4, 12, 13
- NEMA 250: Type 3, 3R, 4, 12, 13

IEC system ingress ratings:

- IP Ingress Protection per IEC 60529 requirements
- IEC Ingress Ratings: IP66, IP67

Standards requirements:
Designed to UL 514B and CSA C22.2, No. 18.3 test requirements including:

- Assembly, Pull, Resistance, Oil spray, Polymer durability, Flammability Coating thickness, Current withstand

Meets all IEC/EN 61386-1, -23 standard requirements including:

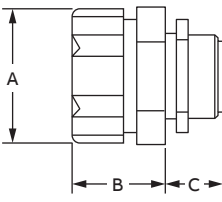
- Impact resistance - Code 3 Medium; 6 Joules
- Tensile strength - Code 3 Medium; 500 N/2 min.
- Lower and upper temperatures
- IP protection against solid and liquids

Product selection

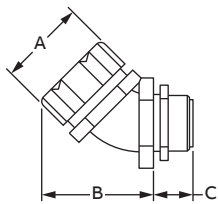
Series 5300-HT High Temperature LT Fittings

Trade size						Thread Type		Insulated			Seal Gaskets
Inches	Metric	ISO BS EN	Standard	Size	Straight Part no.	45° Part no.	90° Part no.	Part no.			
3/8"	12mm	16mm	NPT	1/2"	5331-HT	5341-HT	5351-HT	5262-HT			
1/2"	16mm	20mm	NPT	1/2"	5332-HT	5342-HT	5352-HT	5262-HT			
3/4"	21mm	25mm	NPT	3/4"	5333-HT	5343-HT	5353-HT	5263-HT			
1"	27mm	32mm	NPT	1"	5334-HT	5344-HT	5354-HT	5264-HT			
1 1/4"	35mm	40mm	NPT	1 1/4"	5335-HT	5345-HT	5355-HT	5265-HT			
1 1/2"	41mm	50mm	NPT	1 1/2"	5336-HT	5346-HT	5356-HT	5266-HT			
2"	53mm	63mm	NPT	2"	5337-HT	5347-HT	5357-HT	5267-HT			
2 1/2"	63mm	70mm	NPT	2 1/2"	5338-HT	—	—	5268-HT			
3"	78mm	80mm	NPT	3"	5339-HT	—	—	5269-HT			
4"	103mm	100mm	NPT	4"	5340-HT	—	—	5270-HT			

Dimensions (approximate)

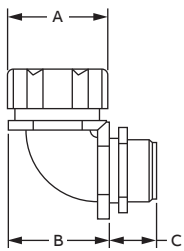
Drawing	Trade size			Inches			Millimeters			Weight	
	Inches	Metric	ISO BS EN	A	B	C	A	B	C	lbs.	kg
	3/8"	12mm	16mm	1 5/32"	1 5/16"	9/16"	29.4	23.8	14.3	0.13	0.06
	1/2"	16mm	20mm	1 3/8"	1"	9/16"	34.9	25.4	14.3	0.22	0.10
	3/4"	21mm	25mm	1 2 1/32"	1 1/16"	9/16"	42.1	27.0	14.3	0.25	0.11
	1"	27mm	32mm	1 7/8"	1 5/16"	3/4"	47.6	33.3	19.1	0.38	0.17
	1 1/4"	35mm	40mm	2 3/32"	1 11/16"	13/16"	53.2	42.9	20.6	0.50	0.23
	1 1/2"	41mm	50mm	2 2 3/32"	1 7/8"	13/16"	69.1	47.6	20.6	0.93	0.42
	2"	53mm	63mm	3 1/4"	2 3/16"	7/8"	82.6	55.6	22.2	1.38	0.62
	2 1/2"	63mm	70mm	3 3/4"	3 3/8"	1"	95.3	79.4	25.4	3.25	1.47
	3"	78mm	80mm	4 1/2"	3 3/4"	1"	114.3	82.6	25.4	4.38	1.98
4"	103mm	100mm	5 2 3/32"	3 3/8"	1 1/32"	150.0	85.7	38.6	7.52	3.41	

Series 5300-HT 45° LT Fittings



3/8"	12mm	16mm	1 5/32"	1 9/16"	9/16"	29.4	39.7	14.3	0.18	0.08
1/2"	16mm	20mm	1 3/8"	1 7/8"	9/16"	34.9	43.0	14.3	0.33	0.15
3/4"	21mm	25mm	1 2 1/32"	2 1/8"	9/16"	42.1	54.0	14.3	0.38	0.17
1"	27mm	32mm	1 7/8"	2 1/4"	3/4"	47.6	57.2	19.1	0.54	0.24
1 1/4"	35mm	40mm	2 3/32"	2 3/4"	13/16"	53.2	69.9	20.6	0.98	0.44
1 1/2"	41mm	50mm	2 2 3/32"	3 3/8"	13/16"	69.1	85.7	20.6	1.21	0.55
2"	53mm	63mm	3 1/4"	3 7/8"	7/8"	82.6	98.4	22.2	2.19	0.99
2 1/2"	63mm	70mm	—	—	—	—	—	—	—	—
3"	78mm	80mm	—	—	—	—	—	—	—	—
4"	103mm	100mm	—	—	—	—	—	—	—	—

Series 5300-HT 90° LT Fittings



3/8"	12mm	16mm	1 5/32"	1 3/8"	9/16"	29.4	34.9	14.3	0.21	0.10
1/2"	16mm	20mm	1 3/8"	1 9/16"	9/16"	34.9	39.7	14.3	0.29	0.13
3/4"	21mm	25mm	1 2 1/32"	1 3/4"	9/16"	42.1	44.5	14.3	0.37	0.17
1"	27mm	32mm	1 7/8"	2 3/16"	3/4"	47.6	55.6	19.1	0.66	0.30
1 1/4"	35mm	40mm	2 3/32"	2 3/4"	13/16"	53.2	69.9	20.6	1.19	0.54
1 1/2"	41mm	50mm	2 2 3/32"	2 15/16"	13/16"	69.1	74.6	20.6	1.55	0.70
2"	53mm	63mm	3 1/4"	3 7/16"	7/8"	82.6	87.3	22.2	2.77	1.26
2 1/2"	63mm	70mm	—	—	—	—	—	—	—	—
3"	78mm	80mm	—	—	—	—	—	—	—	—
4"	103mm	100mm	—	—	—	—	—	—	—	—

Note:

- Dimensions for reference only.
- Product must be installed in accordance with applicable national and local electrical codes.

tnb.abb.com
tnb.ca.abb.com
abb.com

We reserve the right to make technical changes or modify the contents of this document without prior notice. With regard to purchase orders, the agreed particulars shall prevail. ABB does not accept any responsibility whatsoever for potential errors or possible lack of information in this document.

We reserve all rights in this document and in the subject matter and illustrations contained therein. Any reproduction – in whole or in part – is forbidden without prior written consent of ABB.
Copyright© 2019 ABB. All rights reserved.