RIIFO

RIIFO LARGE-SIZE SYSTEM

RIIFO UK Ltd

Email: sales.uk@riifo.com
Website: www.riifo.co.uk

Date Modified: August 08, 2023

CATALOGUE INDEX

06
RIIFO APPROVALS

06 Company Accreditations
06 Piping Systems

19
SUSTAINABILITY OF PLASTICS IN CONSTRUCTION

19 Light Weight
19 Performance
19 Flexible Installation

27
INSTALLATION

27 Pipe Cutting
28 Press Fitting

03
ABOUT RIIFO

07
PROJECT REFERENCE

20
RIIFO PLUMBING & HEATING SOLUTIONS

29
WARRANTY

05
INNOVATION & SCALE

05 Facility
05 Capacity

13
SYSTEM OVERVIEW

16 Technical Data and Delivery Dimensions
17 Classification of Service Conditions
18 Technical Data and Raw Material

21
RIIFO Large-size B1 PEX-AL-PEX Multilayer Piping System

29
PROFESSIONAL INSTALLATION LIMITED WARRANTY

ABOUT RIIFO

RIIFO is a leading multinational corporation, providing one-stop piping solutions applied in residential, commercial, agricultural, industrial, and infrastructural sectors. Persistently reinventing since 1996, with over 8,000 employees, 70 branches & subsidiaries, and 300,000 distributors, we have served customers in more than 100 countries and regions.

With an integrated value chain, from R&D to manufacturing and retail distribution, we strive to fulfill our mission of offering ideal piping products and services to everyone.

8,000
Employees

300,000
Distributors worldwide

100+
Serving over 100 countries & regions

70
Branches & Subsidiaries

INNOVATION

Believing that innovation is the key to go beyond the ordinary, RIIFO has founded world-class labs recognised and certified by CNAS. Over 600 innovation talents are sparing no effort to challenge industrial boundaries, achieving 923 patents and 20 technology awards.

This passion for innovation shows in our high quality products and our ability to offer ideal piping solutions across all sectors.

SCALE

We adopt highly automated production lines with the most rigorous and comprehensive production control and management systems to facilitate such large scale capacity.

Facility

9
global production bases

5,200+
production staffs

200
hectares area totally

4,000+
automated production lines

Capacity

Production Capacity

- Pipe: **3.2 billion** m/yr
- Fitting: **1.3 billion** pcs/yr

Storage Capacity

- **1,735,000 m3** ≈ 61,950 TEU (20 GP Containers)

RIIFO APPROVALS

RIIFO products are produced under rigorous quality control. To date, we have gained over 50 certificates such as NSF, DVGW, AENOR, WRAS etc. These international standards underline our technical and quality know-how and we provide a 25-year system warranty backed by an international insurance schem.

Company Accreditations

OHSMS45001 · ISO14001 · MANAGEMENT SYSTEM ISO 9001: 2015 · reddot · EPD®

Piping Systems

USA	GERMANY	FRANCE	FRANCE	SPAIN
NETHERLANDS	FINLAND	EU	UK	AUSTRALIA

PROJECT REFERENCE

Baku, Azerbaijan

Project: National Cancer Hospital
Type: Health
Year: 2009
Product: Multilayer Plumbing System

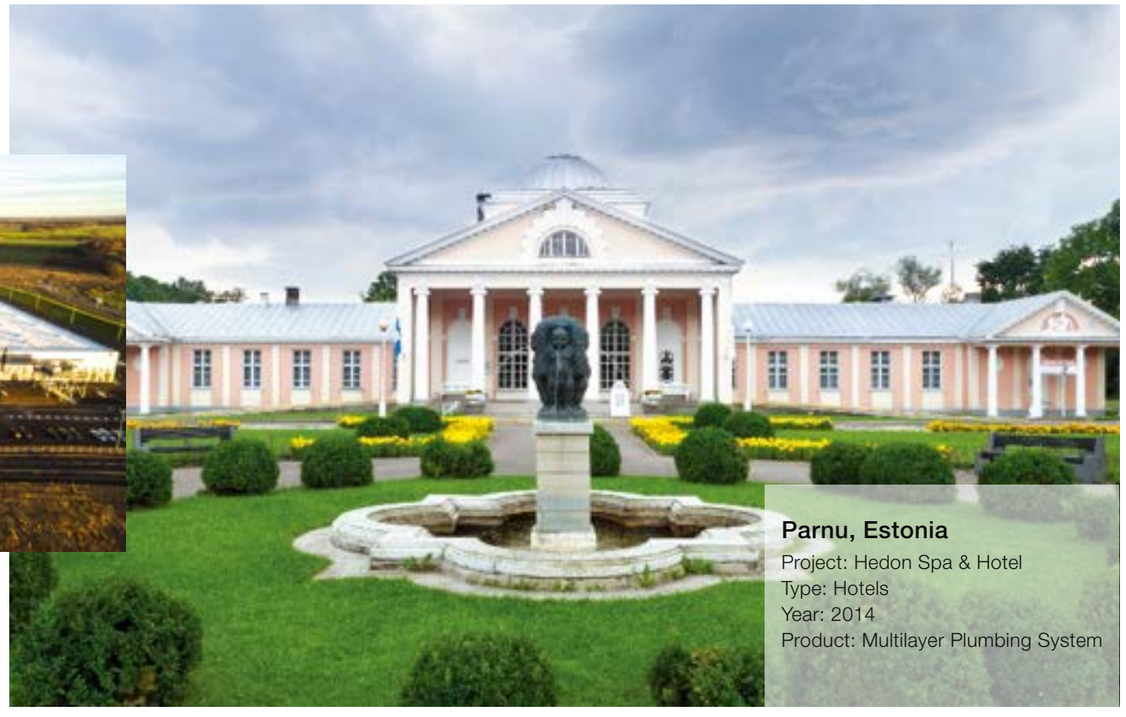
Kazakh region, Azerbaijan

Project: Gazakh Olympic Sports Complex
Type: Sport
Year: 2007
Product: Multilayer Plumbing System

PROJECT REFERENCE

Sheki, Azerbaijan

Project: Marxal Resort & Spa
Type: Hotels
Year: 2016
Product: Multilayer Plumbing System

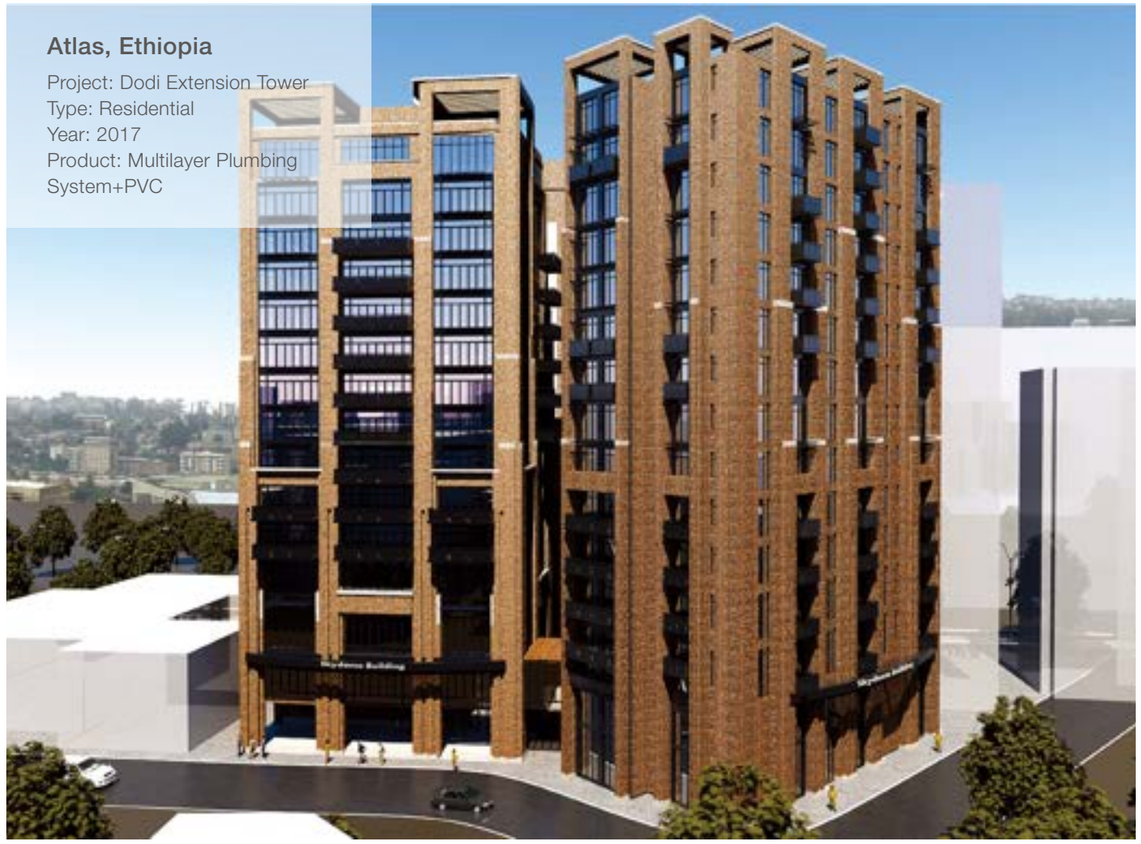


Parnu, Estonia

Project: Hedon Spa & Hotel
Type: Hotels
Year: 2014
Product: Multilayer Plumbing System

Atlas, Ethiopia

Project: Dodi Extension Tower
Type: Residential
Year: 2017
Product: Multilayer Plumbing System+PVC



Tallinn, Estonia

Project: MAXIMA Locistics Centre
Type: Commercial
Year: 2019
Product: Multilayer Plumbing System

Utrecht, Netherlands

Project: Domkerk Domtoren
Type: Public Buildings
Year: 2008
Product: Multilayer Plumbing System

PROJECT REFERENCE

Malmo, Sweden

Project: HSB Turning Torso
Type: Residential
Year: 2005
Product: Multilayer Plumbing System

Lund, Sweden

Project: Max-Lab
Type: Science
Year: 2016
Product: Multilayer Plumbing System

Monterrey, Mexico

Project: Torre Kima
Type: Hotels
Year: 2017
Product: Multilayer Plumbing System

Durban, South Africa

Project: Discovery Building
Type: Commercial
Year: 2017
Product: Multilayer Plumbing System

Durban, South Africa

Project: Park square
Type: Commercial
Year: 2018
Product: Multilayer Plumbing System

SYSTEM OVERVIEW

RIIFO provides multilayer pipe that unites the advantages of a plastic and metal pipe and offers a high degree of flexibility and toughness, coupled with high pressure and temperature resistance. The RIIFO multilayer pipe consists of an inner and outer layer in between which there is a layer of overlap welded or aluminum, and the three layers are made to form a permanent structure by means of special bonding layers. The aluminum layer ensures that the pipe maintains its shape and prevents the oxygen penetration from the atmosphere and gives the pipe sufficient strength and shape retention. This construction has good thermal shock resistance (due to its very low coefficient of linear expansion) and can be adapted to harsh working environments with large temperature variations, comparable to copper tubes.

The RIIFO multilayer pipes satisfy the highest demands. All pipes are food-safe and completely free of physiological risks. To ensure safe in drinking water installations, the pipes are delivered with end caps to protect against contamination during transport, storage or on site. The pipes are 100% impermeable to oxygen, which is particularly important for heating installations. The RIIFO multilayer pipes can be delivered as straight lengths.

The RIIFO PEX/AL/PEX pipe consists of a longitudinal welded aluminium pipe, to which an inner and outer layer of crosslinked polyethylene (PEX) is applied.

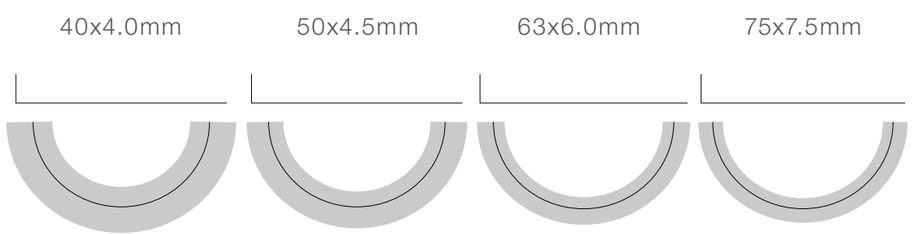
Crosslinked means ‘bound together’ or ‘interconnected’. Polyethylene consists of polymer chains and crosslinking is the process of formings bonds to join these polymer chains together. RIIFO applies the silane crosslinking technology to connect the polymer chains. This results in a superior mechanical performance and an increased temperature and pressure resistance.

Advantages

- Corrosion resistance
- Resistent to temperature and pressure (95°C/10bar)
- Impermeable to oxygen and light
- Very flexible yet dimensionally stable
- Life expectancy of 50 years
- Light in weight, easy to install, time saving
- Low thermal expansion, similar to metals
- Smooth inner pipe ensures low pressure loss
- Hygienic

Technical data and delivery dimensions

Nominal size(D x e)		40×4.0	50×4.5	63×6.0	75×7.5
Outside diameter (mm)		40	50	63	75
Tolerance of Outer diameter (mm)	Min	40	50	53	75
	Max	40.3	50.3	63.4	75.6
Wall thickness (mm)		4	4.5	6	7.5
Tolerance of wall thickness (mm)	Min	4	4.5	6	7.5
	Max	4.6	5.2	6.8	8.5
Roughness(mm)		0.0007			
Density(g/cm3)		0.926~0.959			
Modulus of elasticity(MPa)		7200			
Thermal conductivity(w/mK)		0.45			
Coefficient of thermal expansion(mm/mK)		0.025			



Applications

The RIIFO multilayer pipes can be used for different applications. Key applications include plumbing and heating systems for residential, commercial or industrial building:

Drinking water:
As a pipe for hot and cold water distribution of potable and food-safe water.

Compressed air:
As a compressed air pipe in systems with preceding oil filter (oil-free).

Heating:
As a pipe for radiator-fed high temperature heating systems within the prescribed load values. System separation is required for specific systems such as solar and district heating.

Rain water:
As a rain water piping system inside buildings and seperately installed from the drinking water installation. The pH-value of the water must be higher than 6.

Radiant heating and cooling systems:
As a pipe for low temperature heating and cooling systems.

Other applications:
The pipe can be used for many other applications and with other media.

Classification of Service Conditions

The performance requirements for multilayer piping systems conforming to ISO 21003 are specified for four different application classes.

The selection of the applicable class conforming to the table shall be agreed upon by the parties concerned for any application. Each application class shall be combined with a design pressure, P_D, of 4 bar, 6 bar, 8 bar or 10 bar, as applicable (1 bar = 0,1 MPa).

Application class	Design temperature T_D ℃	Time[b] at T_D	T_{max}	Time at T_{max}	T_{mal}	Time at T_{mal}	Typical field of application
1a	60	49	80	1	95	100	Hot water supply(60℃)
2a	70	49	80	1	95	100	Hot water supply(70℃)
4b	20 plus cumulative	2,5	70	2,5	100	100	Underfloor heating and low-temperature radiators
	40 plus cumulative	20					
	60	25					
5b	20 plus cumulative	14	90	1	100	100	High-temperature radiators
	60 plus cumulative	25					
	80	10					

A. A country may select either class 1 or class 2 in conformity with its national regulations.

B. Where more than one design temperature for time and associated temperature appears for any class, they should be aggregated. ""Plus cumulative"" in the table implies a temperature profile of the mentioned temperature over time (e.g. the design temperature profile for 50 years for class 5 is 20 °C for 14 years followed by 60 °C for 25 years, 80 °C for 10 years, 90 °C for 1 year and 100 °C for 100 h).

NOTE - For values of T_D, T_{max} and T_{mal} in excess of those in the table, this International Standard does not apply.

Technical data and raw material

Material	Test item	Requirement
PEX	Melt flow index	HDPE, MDPE≥0.1 g/10min (190,2.16kg)
	Tensile strength	HDPE≥21MPa; MDPE≥14MPa
	Enlongation	≥400%
	Vicat soft point	Vicat soft point≥105℃
	Cross-linking degree	≥65%
	ESCR	≥165h
Colour masterbatch	Moisture content	≤0.15%
	Appearance	Uniform granual
	Volatile content	≤0.5%
	Density	≥0.93 g/cm3
Catalyst	Melt flow index	≥0.9 g/10min (190℃ , 5.00kg)
	Volatile content	≤0.35%
Adhesive resin	Appearance	Uniform granual
	Density	≥0.926 g/cm3;
	Melt flow index	2.0~6.0 g/10min (190℃, 2.16kg)
	Vicat soft point	Vicat soft point≥105℃
	T peeling strength	≥70N/25mm
Aluminum	Surface quality	Water brush test≥class
	Tensile strength	105MPa ~ 125MPa
	Appearance	Without oil on surface
	Hardness(HV)	28 ~ 33
	T peeling strength	Minimum value≥60N/25mm

SUSTAINABILITY OF PLASTICS IN CONSTRUCTION

Plastic are becoming increasingly popular in construction materials because they have many advantages that traditional construction materials do not have. These properties make plastics an ideal building product and an important component of a sustainable built environment.

Materials in buildings are often expected to last 30 to 50 years without replacement, with plastic materials lasting even longer. PVC drainage pipes, for example, will still work well after 60 years of use. Longer building life, low maintenance costs and the assurance that the overall structural and thermal properties will remain unchanged over time ensure low energy requirements and therefore lower CO_2 emissions. Plastic building materials are also easy to install and have stable physical properties and high chemical stability, reducing the risk of failure.

Light weight

Lightweight plastic building materials can significantly reduce energy consumption for transport.

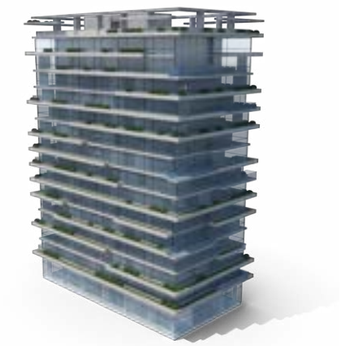
Performance

Plastics are generally highly weather resistant. Modern plastic insulation materials, offer better insulation properties than traditional materials, which can create space and save material when using plastics.
In addition, plastic waterproofing materials are widely used to seal buildings. Plastic is a good material to stop the movement of moisture and water.

Flexible installation Performance

Plastic pipes offer unparalleled ease of installation due to their flexibility; they can also be adapted to a wide range of housing designs.

RIIFO PLUMBING & HEATING SOLUTIONS

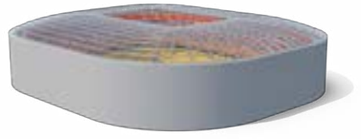


Apartments

Commecial

Healthcare

Industrial



Stadium

Hotel

Residential Buildings

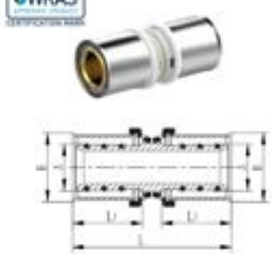
Education

RIIFO Large-size B1 PEX-AL-PEX Multilayer Piping System

B1 PEX/AL/PEX PIPES

SAP Code	Specification	Length	Pack Qty
1100058537	40x4.0mm	5m	25m
1100058536	50x4.5mm	3m	15m
1100058538	63x6.0mm	3m	15m
1100058539	75x7.5mm	3m	15m

Couplers



SAP Code	Specification	Carton Qty	A	B	L1	L
1100058407	40mm	42	31.75	43.5	43.2	96
1100058408	50mm	33	40.75	53.5	43.5	96.7
1100058409	63mm	15	50.7	67.4	66.2	143.4
1100058410	75mm	8	59.6	79.6	66.8	143.9

Reducing Couplers

SAP Code	Specification	Carton Qty	A	B	L1	C	D	L2	L
1100058487	40x20mm	60	31.75	43.5	43.2	15.75	24.2	26.1	78.2
1100058478	40x25mm	42	31.75	43.5	43.2	19.75	29.4	33.3	85.5
1100058399	40x32mm	42	31.75	43.5	43.2	25.75	36.4	33.3	85.5
1100058479	50x25mm	34	40.75	53.5	43.5	19.75	29.4	33.3	86.2
1100058400	50x32mm	38	40.75	53.5	43.5	25.75	36.4	33.3	86.2
1100058401	50x40mm	34	40.75	53.5	43.5	31.75	43.5	43.2	97.7
1100058480	63x32mm	18	50.7	67.4	66.2	25.75	36.4	33.3	109.2
1100058402	63x40mm	18	50.7	67.4	66.2	31.75	43.5	43.2	119.7
1100058403	63x50mm	18	50.7	67.4	66.2	40.75	53.5	43.5	120.4
1100058488	75x40mm	8	59.6	79.6	66.8	31.75	43.5	43.2	119.7
1100058404	75x50mm	8	59.6	79.6	66.8	40.75	53.5	43.5	120.4
1100058405	75x63mm	8	59.6	79.6	66.8	50.7	67.4	66.2	143.2

Male Couplers

SAP Code	Specification	Carton Qty	A	B	C	L1	L	P
1100058495	40mmx1 1/2''	54	31.75	43.5	R1 1/4	43.2	81	19.5
1100058406	40mmx1 1/4''	60	31.75	43.5	R1 1/2	43.2	81	19.5
1100058496	40mmx1''	60	31.75	43.5	R1	43.2	77.5	16
1100058411	50mmx1 1/2''	48	40.75	53.5	R1 1/2	43.5	81.7	19.5
1100058497	50mmx2''	28	40.75	53.5	R2	43.5	86.7	24
1100058498	63mmx1 1/2''	20	50.7	67.4	R1 1/2	66.2	105.2	19.5
1100058412	63mmx2''	20	50.7	67.4	R2	66.2	109.7	24
1100058413	75mmx2 1/2''	14	59.6	79.6	R2	66.8	113.7	19.5

Female Couplers

SAP Code	Specification	Carton Qty	A	B	C	L1	L	P
1100058499	40mmx1 1/2''	48	31.75	43.5	G1 1/2	43.2	70.5	19.5
1100058414	40mmx1 1/4''	52	31.75	43.5	G1 1/4	43.2	72	19.5
1100058415	50mmx1 1/2''	36	40.75	53.5	G1 1/2	43.5	72.2	19.5
1100058416	63mmx2''	20	50.7	67.4	G2	66.2	99.7	23.5
1100058417	75mmx2 1/2''	14	59.6	79.6	G2 1/2	66.8	105.7	27

Female Couplers (Swivel)

SAP Code	Specification	Carton Qty	A	B	L1	C	L
1100058473	40mmx1 1/2''	48	31.75	43.5	43.2	G1 1/2	84.2
1100058474	40mmx1 1/4''	56	31.75	43.5	43.2	G1 1/4	80.2
1100058475	50mmx1 1/2''	36	40.75	53.5	43.5	G1 1/2	86.5
1100058507	50mmx2''	30	40.75	53.5	43.5	G2	90.2
1100058476	63mmx2''	20	50.7	67.4	66.2	G2	112.2
1100058477	75mmx2 1/2''	14	59.6	79.6	66.8	G2 1/2	113.7

90° Elbows

SAP Code	Specification	Carton Qty	A	B	L1	L
1100058439	40mm	30	31.75	43.5	43.2	72
1100058419	50mm	24	40.75	53.5	43.5	78.3
1100058421	63mm	10	50.7	67.4	66.2	107.7
1100058423	75mm	5	59.6	79.6	66.8	110.7

45° Elbows

SAP Code	Specification	Carton Qty	A	B	L1	L
1100058418	40mm (45°)	30	31.75	43.5	43.2	67
1100058420	50mm (45°)	15	40.75	53.5	43.5	70.7
1100058422	63mm (45°)	10	50.7	67.4	66.2	96.7
1100058424	75mm (45°)	6	59.6	79.6	66.8	96.7

Tees

SAP Code	Specification	Carton Qty	A	B	L1	L	H
1100058434	40mm	18	31.75	43.5	43.2	144	72
1100058435	50mm	12	42.8	53.5	43.5	156.4	78.2
1100058436	63mm	6	50.7	67.4	66.2	215.4	107.7
1100058437	75mm	3	59.6	79.6	66.8	221.4	110.7

Reducing Tees

SAP Code	Specification	Carton Qty	A	B	L1	C	D	L2	E	F	L3	H	L
1100058489	40x16x40mm	27	31.75	43.5	43.2	11.75	20.2	26.1	31.75	43.5	43.2	52.2	120
1100058438	40x20x40mm	24	31.75	43.5	43.2	15.75	24.2	26.1	31.75	43.5	43.2	52.2	124
1100058481	40x25x32mm	21	31.75	43.5	43.2	19.75	30.4	33.3	25.75	36.4	33.3	61.5	116.5
1100058490	40x25x40mm	21	31.75	43.5	43.2	19.75	30.4	33.3	31.75	43.5	43.2	61.5	127
1100058440	40x32x32mm	24	31.75	43.5	43.2	25.75	36.4	33.3	25.75	36.4	33.3	61.5	123.5
1100058441	40x32x40mm	21	31.75	43.5	43.2	25.75	36.4	33.3	31.75	43.5	43.2	61.5	134
1100058491	40x50x40mm	16	31.75	43.5	43.2	43.8	53.5	43.5	31.75	43.5	43.2	70.2	155
1100058492	50x20x50mm	20	40.75	53.5	43.5	15.75	24.2	26.1	43.8	53.5	43.5	58.2	129.4
1100058482	50x25x40mm	16	40.75	53.5	43.5	19.75	29.4	33.3	31.75	43.5	43.2	65.5	128.7
1100058493	50x25x50mm	15	40.75	53.5	43.5	19.75	30.4	33.3	43.8	53.5	43.5	65.5	129.4
1100058442	50x32x50mm	15	40.75	53.5	43.5	25.75	36.4	36.4	43.8	53.5	43.5	65.5	138.4
1100058443	50x40x50mm	14	40.75	53.5	43.5	31.75	43.5	43.5	43.8	53.5	43.5	77.5	145.4
1100058484	63x25x63mm	6	50.7	67.4	66.2	19.75	29.4	33.3	50.7	67.4	66.2	73.5	178.4
1100058444	63x32x63mm	8	50.7	67.4	66.2	25.75	36.4	33.3	50.7	67.4	66.2	73.5	181.4
1100058445	63x40x63mm	8	50.7	67.4	66.2	31.75	43.5	43.2	50.7	67.4	66.2	84	191.4
1100058446	63x50x63mm	6	50.7	67.4	66.2	43.8	53.5	43.5	50.7	67.4	66.2	84.7	201.4
1100058485	75x32x75mm	4	59.6	79.6	66.8	25.75	36.4	33.3	59.6	79.6	66.8		
1100058447	75x40x75mm	3	59.6	79.6	66.8	31.75	43.5	43.2	59.6	79.6	66.8	88	194.4
1100058448	75x50x75mm	3	59.6	79.6	66.8	43.8	53.5	43.5	59.6	79.6	66.8	88.7	199.4
1100058494	75x63x75mm	4	59.6	79.6	66.8	50.7	67.4	66.2	59.6	79.6	66.8	110.7	211.4

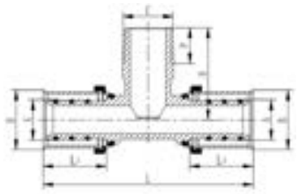
Male Elbows

SAP Code	Specification	Carton Qty	A	B	C	L1	L	P	H
1100058425	40mmx1 1/4''	36	31.75	43.5	R1 1/4	43.2	73	19.5	44.5
1100058486	40mmx1 1/2''	36	31.75	43.5	R1 1/2	43.2	77	19.5	44.5
1100058426	50mmx1 1/2''	24	40.75	53.5	R1 1/2	43.5	78.2	19.5	50
1100058427	63mmx2''	10	50.7	67.4	R2	66.2	107.2	24	60
1100058428	75mmx2 1/2''	8	59.6	79.6	R2 1/2	66.8	120.7	27	72

Female Elbows

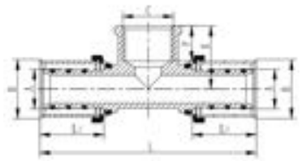
SAP Code	Specification	Carton Qty	A	B	C	L1	L	P	H
1100058429	40mmx1 1/4''	36	31.75	43.5	G1 1/4	43.2	74.5	19.5	38
1100058430	40mmx1 1/2''	30	31.75	43.5	G1 1/2	43.2	77	19.5	38
1100058431	50mmx1 1/2''	30	40.75	53.5	G1 1/2	43.5	79.2	19.5	42
1100058432	63mmx2''	12	50.7	67.4	G2	66.2	107.7	24	48.5
1100058433	75mmx2 1/2''	8	59.6	79.6	G2 1/2	66.8	119.2	27	60

Male Tees



SAP Code	Specification	Carton Qty	A	B	L1	L	L2	C	H
1100058460	40x1/2''x40mm	27	31.75	43.5	43.2	127	14	R1/2	41
1100058462	40x1''x40mm	27	31.75	43.5	43.2	137	16	R1	43.5
1100058461	40x3/4''x40mm	27	31.75	43.5	43.2	132	15	R3/4	41
1100058463	40x1 1/4''x40mm	21	31.75	43.5	43.2	146	19.5	R1 1/4	45.5
1100058467	50x1 1/2''x50mm	15	40.75	53.5	43.5	155.4	19.5	R1 1/2	50
1100058464	50x1/2''x50mm	18	40.75	53.5	43.5	128.4	14	R1/2	46
1100058465	50x3/4''x50mm	18	40.75	53.5	43.5	131.4	15	R3/4	47
1100058466	50x1''x50mm	18	40.75	53.5	43.5	138.4	16	R1	48
1100058468	63x1/2''x63mm	10	50.7	67.4	66.2	174.4	14	R1/2	52.5
1100058470	63x1''x63mm	10	50.7	67.4	66.2	184.4	15	R1	54
1100058471	63x2''x63mm	6	50.7	67.4	66.2	215.4	24	R2	61
1100058469	63x3/4''x63mm	10	50.7	67.4	66.2	177.4	15	R3/4	53.5

Female Tees



SAP Code	Specification	Carton Qty	A	B	L1	L	P	C	H
1100058449	40x1/2''x40mm	36	31.75	43.5	43.2	126	14	G1/2	31
1100058472	40x3/4''x40mm	36	31.75	43.5	43.2	131	15	G3/4	31
1100058450	40x1''x40mm	24	31.75	43.5	43.2	138	16	G1	36
1100058451	40x1 1/4''x40mm	24	31.75	43.5	43.2	138	19.5	G1 1/4	48
1100058452	50x1/2''x50mm	18	40.75	53.5	43.5	128.4	14	G1/2	36
1100058453	50x3/4''x50mm	18	40.75	53.5	43.5	133.4	15	G3/4	36
1100058454	50x1''x50mm	16	40.75	53.5	43.5	139.4	16	G1	40
1100058455	50x1 1/2''x50mm	16	40.75	53.5	43.5	155.4	19.5	G1 1/2	42
1100058456	63x1/2''x63mm	10	50.7	67.4	66.2	174.4	14	G1/2	42
1100058457	63x3/4''x63mm	10	50.7	67.4	66.2	178.4	15	G3/4	43
1100058458	63x1''x63mm	9	50.7	67.4	66.2	185.4	16	G1	45
1100058459	63x2''x63mm	9	50.7	67.4	66.2	214.4	24	G2	51
1100058500	75x1''x75mm	7	59.6	79.6	66.8	187.4	16	G1	48
1100058483	75x1 1/2''x75mm	5	59.6	79.6	66.8	205.4	19.5	G1 1/2	50
1100058501	75x2''x75mm	5	59.6	79.6	66.8	215.4	24	G2	56
1100058502	75x2 1/2''x75mm	3	59.6	79.6	66.8	234.4	27	G2 1/2	60

Pipe Cutter

SAP Code	Specification	Carton Qty
1100018264	QGQ-75	12

Reamer (used with electrical drill or handle)

SAP Code	Specification	Carton Qty
1100018264	40mm	12
1100018265	50mm	12
1100018266	63mm	12
1100018267	75mm	12

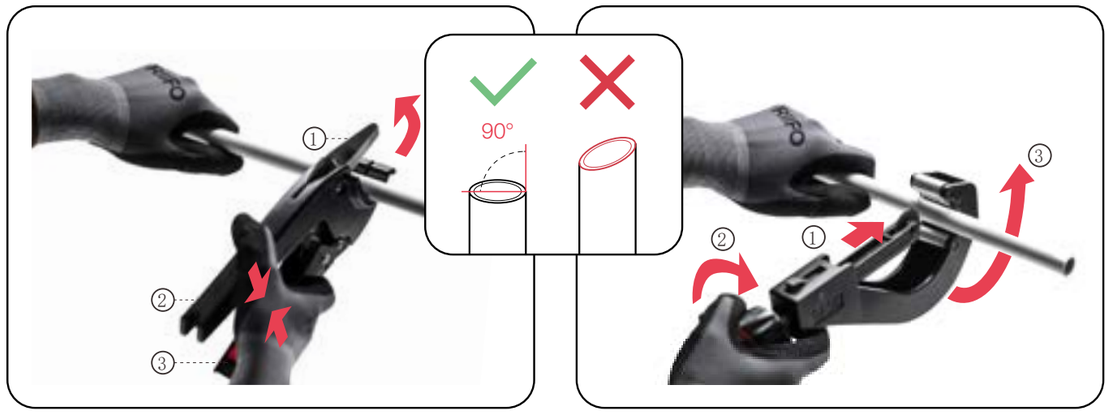
Handle for Reamers

SAP Code	Specification	Carton Qty
1100018254	40-75	50

INSTALLATION

Pipe Cutting

NOTICE!



WARNING!

Risk of injury might occour in the end stop area of the shears if operated incorrectly.

Only use the tool as described in the operating instructions.

NOTE!

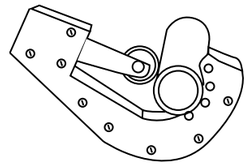
Incorrect cutting causes leakage in connection
- The end of the pipe shall be cut vertically.
- The end of the pipe shall not be damaged or distorted.

INSTALLATION

Press Fitting

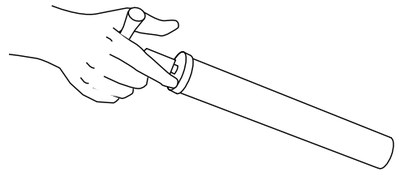
Step1:

Cut the pipe vertically by RIIFO pipe cutter. Make sure to cut it quickly and precisely.



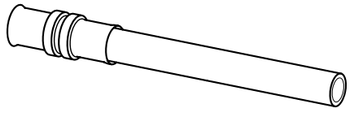
Step2:

Use a electric or handled reamer to round and bevel the end holes of the pipe.



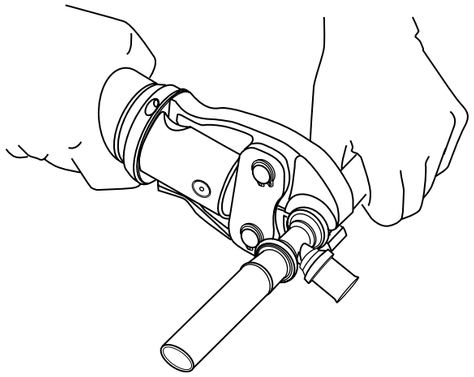
Step3:

Choose the right size sleeved-fitting for the pipe and aim the pipe end at the ring-shape hole of the fitting integrated with stainless steel sleeve. Push the pipe into the fitting up to the shoulder.



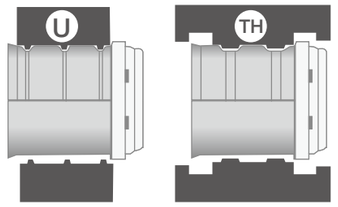
Step4:

Open the electric pressing tool and position the tool directly onto the stainless steel sleeve.



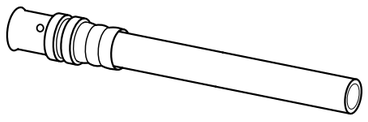
Step5:

The margin of the block must be placed against/ cover the press section.



Step6:

Press the activation button on the machine and wait until the pressing cycle is completed.
Open the jaw and remove the tool. The connection has been made.



WARRANTY

To fulfill the manufacturer duty on supplying high quality and reliable solutions, RIIFO multilayer pipes and fittings are warranted against defects from manufacturing side for a period starting at the manufacturing date printed on product. For detailed documentations of product warranty, kindly contact our company.

PROFESSIONAL INSTALLATION LIMITED WARRANTY

Subject to the conditions and limitations of this Limited Warranty, RIIFO UK Ltd ("RIIFO"), warrants to the property owner ("Owner") that the components in its RIIFO Piping Systems as described below (the "Products"), when properly installed by licensed plumbers in potable water and radiant heating systems and subject to normal conditions of use, shall be free from failure caused by manufacturing defects for the respective periods set forth below, each of which periods shall commence on the date of original purchase of the Product (whether or not by Owner).

In the event that a RIIFO Product fails during the applicable warranty period due to a manufacturing defect as determined by RIIFO and all conditions for coverage under his Limited Warranty are met, the Owner shall be entitled to the following as his or her exclusive remedy: (i) at RIIFO's sole election, either (a) the replacement of the same type, size and like quantity of non-defective Product at the original point of delivery, at no cost to Owner or (b) credits, offsets, refunds or a combination thereof, for the purchase price of the defective Product; and (ii) if the Product in question is covered by either the 10-year or 25-year limited warranty and the failure occurred during the first ten (10) years of such warranty period and was the direct cause of a leak at the Owner's property, RIIFO will reimburse the Owner for all reasonable and necessary costs of repair or replacement for physical damage to the property, including drywall, flooring and painting costs, as well as damages to personal property, resulting from the failure or leak.

Installation: This Limited Warranty applies only if the applicable Product is configured and installed by a licensed professional plumbing contractor in accordance with RIIFO's instructions, good plumbing practices, and applicable code requirements and industry standards.

FAILURE TO INSTALL THE PRODUCTS IN COMPLIANCE WITH THESE REQUIREMENTS WILL VOID THIS WARRANTY AND MAY RESULT IN SEVERE WATER DAMAGE. RIIFO DOES NOT GUARANTEE OR IN ANY WAY WARRANT THE INSTALLATION OF ITS PRODUCTS.

Exclusions From Coverage: This Limited Warranty excludes defects or failures caused after shipment of the Product by:
(i) components not manufactured or sold by RIIFO;
(ii) improper installation (as set forth above);
(iii) use in improper applications or conditions or in conjunction with improper materials (including, without limitation, improper lubricants, pastes, solvents or sealants);
(iv) exposure to damaging physical or chemical conditions, including, but not limited to, chemically corrosive or aggressive water conditions, abnormal operating conditions, accident, abuse, and misuse;
(v) freezing or overheating of liquids within the Product, or unusual pressure surges or pulsation; (vi) vibration;
(vii) exposure to temperatures and/or pressures exceeding the ranges for the Product as specified in RIIFO's design manuals and installation guides;
(viii) exposure to ultraviolet lights or other high-energy radiation;
(ix) failure to adhere to RIIFO instructions and/or specifications concerning the proper handling, installation, testing and use of the Product;
(x) failure to adhere to applicable standards set forth by local laws, codes, or regulations and the applicable industry standards;
(xi) abuse, misuse, alteration, accidental damage, Acts of God (such as flood, hurricanes, tornadoes or fire) or any other improper activities(including but not limited to repairing or attempt by anyone other than RIIFO authorized service agent) not listed above or damage caused by the fault or negligence of anyone other than RIIFO.

DISCLAIMER OF OTHER WARRANTIES: THIS LIMITED WARRANTY IS THE ONLY WARRANTY APPLICABLE TO THE PRODUCTS, WHICH ARE OTHERWISE SOLD "AS IS." THERE ARE NO OTHER WARRANTIES OF ANY KIND, EXPRESS OR IMPLIED, STATUTORY OR OTHERWISE, INCLUDING, WITHOUT LIMITATION, ANY IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. ALL SUCH WARRANTIES ARE SPECIFICALLY DISCLAIMED. NO STATEMENT, CONDUCT OR DESCRIPTION BY RIIFO OR ITS REPRESENTATIVES, IN ADDITION TO OR BEYOND THIS LIMITED WARRANTY, SHALL CONSTITUTE A WARRANTY.

SOLE REMEDY/LIMITATION OF LIABILITY: THE SOLE AND EXCLUSIVE REMEDY FOR BREACH OF THIS LIMITED WARRANTY AND THE SOLE AND EXCLUSIVE OBLIGATION OF RIIFO WITH RESPECT TO ANY CLAIMS FOR BREACH OF THIS LIMITED WARRANTY, SHALL BE AS SET FORTH ABOVE. IN NO EVENT SHALL RIIFO BE LIABLE FOR ANY SPECIAL, CONSEQUENTIAL, INCIDENTAL, PUNITIVE, OR INDIRECT DAMAGES, LOST PROFITS, LOSS OF GOODWILL, LOSS OF BUSINESS OPPORTUNITIES, OR DAMAGE TO REPUTATION.

Warranty Claim Process: Any warranty claim by Owner regarding an alleged defective Product shall be made in writing to RIIFO, postmarked within the applicable warranty period and no later than ten (10) days after the date the defect is discovered, or in the exercise of ordinary care should have been discovered. Such notification should be sent to the RIIFO address indicated in www.riifo.co.uk , and must include a description of the Product (with model number, if available), date of purchase and/or date of installation (with proof of purchase, if available), and a description of alleged defect. If the Owner cannot determine the date of purchase, RIIFO will deem the production date to be the date of purchase for purposes of this Limited Warranty. Owner shall keep all Products alleged to be defective and, at RIIFO's request and expense, ship the Product(s) to RIIFO for inspection. In the event Owner is seeking the reimbursement of property damages as set forth above, Owner must detailed documentation of the claimed damages, including photographs, estimates, and invoices. RIIFO shall also have the right, but not the obligation, to inspect the site of installation/damage. Upon receipt of a complete warranty claim, RIIFO will diligently perform an investigation to determine if a manufacturing defect is present.

If RIIFO determines warranty coverage applies, it will promptly notify Owner and provide the remedy set forth in this Limited Warranty. No action by RIIFO under this warranty shall be construed as an admission of liability.
Transferability: This Limited Warranty shall apply for the full applicable warranty period with respect to the original Owner of the real property at which the Product is installed and to any subsequent owner(s) of such property, provided such ownership transfer(s) occur within 10 years of the Product purchase date. Any change in ownership of the property after such 10-year period will void any remaining warranty coverage.

Transferability: This Limited Warranty shall apply for the full applicable warranty period with respect to the original Owner of the real property at which the Product is installed and to any subsequent owner(s) of such property, provided such ownership transfer(s) occur within 10 years of the Product purchase date. Any change in ownership of the property after such 10-year period will void any remaining warranty coverage.

Product Warranty Periods

PRODCUT NAME/TYPE	WARRANTY PERIOD (FROM DATE OF PURCHASE)	CONDITIONS
PEXa/PEX-b pipe	25 years (if connected and used with RIIFO pipe/fittings) or 10 years if otherwise (subject to written technical approval by RIIFO UK Ltd)	Must comply with ISO 15875
PEX-AL-PEX pipe	25 years (if connected and used with RIIFO pipe/fittings) or 10 years if otherwise (subject to written technical approval by RIIFO UK Ltd)	Must comply with ISO 21003
PE-AL-PE pipe	25 years (if connected and used with RIIFO pipe/fittings) or 10 years if otherwise (subject to written technical approval by RIIFO UK Ltd)	Must comply with ISO 21003
PERT-AL-PERT pipe	25 years (if connected and used with RIIFO pipe/fittings) or 10 years if otherwise (subject to written technical approval by RIIFO UK Ltd)	Must comply with ISO 21003
PPR pipe	25 years (if connected and used with RIIFO pipe/fittings) or 10 years if otherwise (subject to written technical approval by RIIFO UK Ltd)	Must comply with ISO 15874
PF5/PF15 fitting	10 years (if connected and used with RIIFO pipe/fittings) or 5 years if otherwise (subject to written technical approval by RIIFO UK Ltd)	Must comply with ISO 15875
F5 / F8/ F9 /F18 /F6 fitting	10 years (if connected and used with RIIFO pipe/fittings) or 5 years if otherwise (subject to written technical approval by RIIFO UK Ltd)	Must comply with ISO 21003
F1 fitting	2 years	Must comply with ISO 21003
PPR fitting	5 years (if used together with RIIFO pipe)	Must comply with ISO 15874
VALVE	3 years	Must be installed per installation instructions
Water Manifold	3 years	Must be installed per installation instructions
Heating Manifold	3 years	Must be installed per installation instructions