AIR RING MAIN SYSTEM

PRODUCT INDEX

The range of push-in fittings and pipes provide theideal connection from compressor receiver to air line service components through to complete ring main and take off points.



UK: 0800 38 24 38 ROI: 1800 74 78 35



No need to prepare threaded pipe or solvent, all the connections can be made with a simple push-in action. The system is then immediately ready for use. Complex systems can be assembled much more rapidly than with traditional methods and because fittings are easy to disconnect, systems can be altered or extended with much reduced production down time.

The fittings are produced in either a tough engineering plastics material or in brass in sizes 12mm to 28mm. They are intended for use with nylonpipe but can also be used with copperor aluminium pipe.





1. Cut pipe square



2. Push pipe into fitting



3. Easy to use in confined spaces

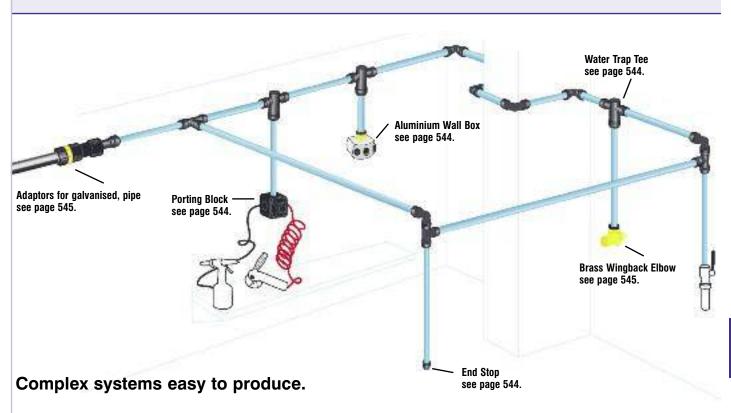


4. Complex systems easy to achieve



5. System complete in 2 days

AIR RING MAIN SYSTEM



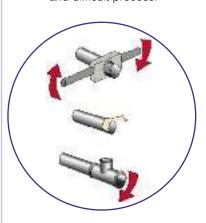
- Installation time reduced by at least 50%
- Safe, secure, leakproof
- Easy to alter or extend a system
- · Lightweight and easy to handle
- No corrosion, reduced maintenance

Nylon, Aluminium & Copper Pipe

Whilst we recommend the use of Rigid Nylon and Aluminium Pipe, Pirtek fittings can also be used with copper pipe if required.

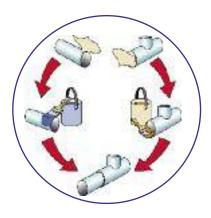


Threaded Steel Tube A time consuming and difficult process.



Solvent Weld

Long installation time,
system needs to be shut down
before drying.



The Way One simple movement provides a secure connection system immediately ready for use.

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Plastic Fittings

Straight Adaptor



Part Number	Pipe	Thread
	0D	BSP (ins)
PM011213E	12	3/8
PM011214E	12	1/2
PM011514E	15	1/2
PM011516E	15	3/4
PM011814E	18	1/2
PM012216E	22	3/4

Equal Elbow



Part Number	Pipe OD
PM0312E	12
PM0315E	15
PM0318E	18
PM0322E	22
PM0328E	28

Straight Connector



Part Number	Pipe OD
PM0412E	12
PM0415E	15
PM0418E	18
PM0422E	22
PM0428E	28

Equal Tee



Part Number	Pipe OD
PM0212E	12
PM0215E	15
PM0218E	18
PM0222E	22
PM0228E	28

Reducing Tee



Tube OD Branch
15
15

Stem Adaptor



Converts push fit end
to male thread

Part Number	Stem OD	Thread BSP (ins)
PM051213E	12	3/8
PM051214E	12	1/2
PM051513E	15	3/8
PM051514E	15	1/2
PM051814E	18	1/2
PM052214E	22	1/2
PM052216E	22	3/4

Reducer



Part Number	Stem OD	Pipe OD
PM0615121	1 5	12
PM061815	E 18	15
PM062215	E 22	15
PM062218	E 22	18
PM062815	E 28	15
PM062822	F 28	22

Stem Elbow



Part Number	Pipe OD	Stem OD
PM221212E	12	12
PM221515E	15	15
PM221818E	18	18
PM22222E	22	22

Designed to simplify pipe connections in restricted spaces, the Swivel Elbow gives an instant swivel fitting so a pipe can be orientated in any direction.





Can be used with an elbow can to make 'U' turn connection.

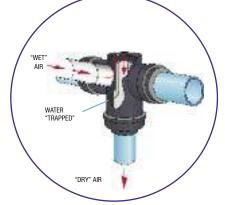
Can be used with a Tee.

Please note a collet cover cannot be used on a Speedfit end assembled with the stem of a 22 mm Stem Elbow.

Water Trap Tee



Part Number	Pipe OD Ends	
PMTT22E	22	



The new Water Trap Tee from Pirtek solves the on-going problem of moisture in a compressed air system and provides the easy alternative to the need to install "Swan Necks".

The ingenious inside arrangement of the fitting allows air to flow, with minimum head loss, from the main to take-off point without allowing water to follow. The moisture is retained in the line to be drawn off at some suitable location.

Installation

It is of vital importance for the correct function of the Water Trap Tee that the air distribution system be nearly horizontal and that the outlet port be facing downwards.



Pirtek Adaptability Standard Super Speedfit* products can be coupled together to form integral new fittings.

Porting Block



Part Number Size (ins)
JG-L-WSK ½ Connections



Aluminium Wall Box



Part Number	Size (ins)
JGWALLBOX 1/2	1/2
JGWALLBOX 3/4	3/4

 $\frac{1}{2}$ or $\frac{3}{4}$ female thread on the top. Both products have $3 \times \frac{1}{2}$ female threads on the side.

End Stop



Part Number	Pipe OD	
PM4615E	15	
PM4622E	22	

The End Stop can be used to provide a permanent connection but because it is easy to disconnect from the pipe it serves a useful purpose as a means of providing a temporary shut off which can be removed at a later date to allow a system to be extended or modified.

U-bend



Part Number Tube 0D **PMUB15E** 15



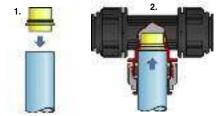
fittings make complex systems easy to achieve.

Brass Fittings

Plug

Water Trap Tee Convertor





The Water Trap Tee Convertor is a simple convenient way of converting a standard 28mm Tee to a Water Trap Tee.

This will stop condensing water entering the vertical take off spur.

The air supply needs to be installed with the correct fall and water drain points regularly vented.

To Assemble

Use either 28mm Nylon Pipe or 28mm Aluminium Pipe. The pipe to be cut square and be free of burrs.

Press the shorter spigot into the pipe. The fit on the pipe will be loose, this will not affect the function.

Push the pipe and convertor up to the pipe stop of the centre leg of the tee.

Turn the screw cap approx 1/4 turn to lock the pipe in position.

Brass Wingback Elbow

Part Number	Pipe OD Thread
PM15WB	15 ½ BSP
PM22WB	22 ¾ BSP



Brass Straight Adaptor

Part Number P	ipe O	D Thread
MM011504N	15	½ BSPT
MM012206N	22	3/4 BSPT
MM012808N	28	1 BSPT



Male Brass Stem Adaptor

Part Number St	em C	D Thread
MM051504N	15	½ BSPT
MM052206N	22	3/4 BSPT
MM052818N	28	1 BSP
MM052226N	22	3/4 NPT
MM052228N	22	1 NPT
MM052828N	28	1 NPT



Converts push fit end to male thread.

Female Brass Stem Adaptor

Part Number Stem OD Thread MM501514N 15 1/2 BSP MM502216N 22 3/4 BSP

Converts push fit end to female thread.



Easy to extend a galvanised system

fittings and pipe can form a standalone system or be used to modify or extend an existing galvanised system.



Accessories

Release Aid

Part Number Pipe OD		
15RA	15	
22RA	22	





The action of pressure in a system could increase the grip of the collet. The Release Aid allows a firmer grip on the collet while removing the pipe.

Collet Covers

Part Number P	Pipe O	D Colours	
PM1912E	12	BLACK	
PM1915E	15	BLACK	
PM1918E	18	BLACK	
PM1922E	22	BLACK	



Collet Covers prevent accidental removal or tampering with piping. The pipe can be inserted with the Collet Cover already attached to the fitting or the cover can slide into position afterwards.

We recommend covers be fitted when pipework is hidden inside walls, ceilings etc.

Collet Covers can be removed to allow the pipe to be disconnected as and when required.

Part NumberStem OD Colour			
PM0812R	12	RED	
PM0815E 15 BLACK			
PM0818E	18	BLACK	
PM0822E	22	BLACK	
PM0828E 28 BLACK			



Pipe Cutter

Part Number **JGTS**



For up to and including 22mm pipe

Heavy Duty Pipe Cutter 4.

Part Number
HDC
HDC BLADE ONLY



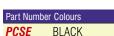
For up to and including 28mm pipe

Pipe Clips

Part Number	Pipe OD Colours
PC15E	15 BLACK
PC22E	22 BLACK
PC28E	28 BLACK



Pipe Spacers







The System is light and easy to handle.

Connecting and Installation



Rigid Nylon Pipe

Pirtek's new rigid unplasticised nylon 12 pipe is especially suitable for compressed air situations. It is offered in BLUE in packs of 20 x 3 metre lengths (28mm in packs of 10 lengths).

It can easily be cut to length using Pirtek pipe cutters and is capable of withstanding temperatures and pressures well in excess of normal working conditions.

Relevant sizes are to DIN 73378

Part Number	Size OD - ID (mm)	Pack Quantity
PA-RM1209-3M-20B	12 x 9	20
PA-RM1512-3M-20B	15 x 12	20
PA-RM1814-3M-20B	18 x 14	20
PA-RM2218-3M-20B	22 x 18	20
PA-RM2823-3M-10B	28 x 23	10

Pipe Stop Distances

Stops are located at the following distances from the end of the fitting.

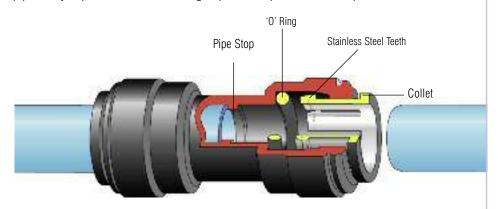


A line is moulded onto the fitting to show the position of the pipe stop.



Size Stop	Distances
12mm	26mm
15mm	30mm
22mm	35mm
28mm	44mm

The Pirtek Push-in Fitting has a collet (gripper) with stainless steel teeth which hold the pipe firmly in position and an 'O' ring to provide a permanent leak proof seal.



Three easy steps

Fittings and pipe should be kept clean and undamaged before use.



Cut the pipe square.

We recommend the use of the Pirtek Pipe Cutter.





DO NOT use a hacksaw. To avoid damage to the 'O' ring remove burrs and sharp edges.



Push up to pipe stop.

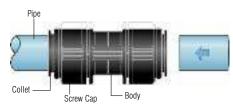


Pull to check secure. Test the system before use.



To disconnect, ensure the system is depressurised. Push the collet towards the fitting and remove the pipe. The fitting can be reused.

28mm Fittings



28mm fittings also have a collet with stainless steel teeth and an '0' ring.



After inserting the pipe, the screw cap is turned approx 1/4 turn. This locks the collet in place and reduces lateral and sideways movement of the pipe.



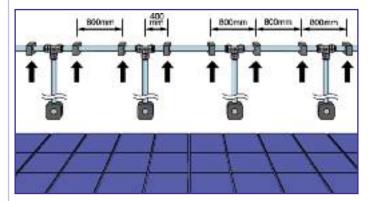
To disconnect, turn the screw cap 1/4 turn, push in the collet and remove the pipe. The fitting and pipe can be reused

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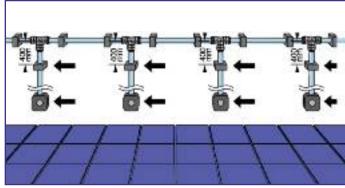
Connecting and Installation

Installing a system

When installing a compressed air system, it is advisable to first attach only the horizontal pipe clips and only attach the clips to the vertical pipes after a small amount of pressure has been applied to the system. This will ensure that the vertical pipes have positioned themselves correctly before they are clipped.

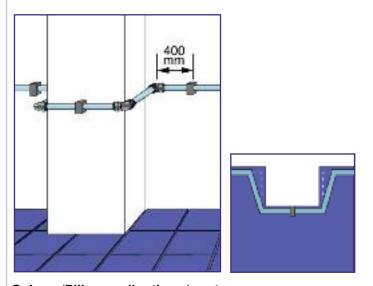


Phase 1: System without pressure

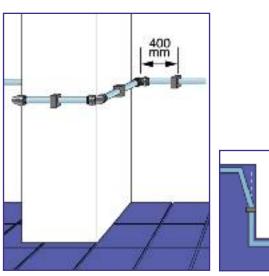


Phase 2: System with pressure

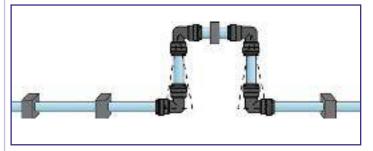
When installing around a column or pillar, maintain a distance of approximately 10cm between the wall and the pipe. Always maintain a distance of 400mm between the fittings and the pipe clip.



Column/Pillar smaller than 1 metre



Column/Pillar larger than 1 metre



On long pipe runs, it is advisable to install an expansion bend, as shown in the diagram.

Note: All compressed air systems should be equipped with an air line water trap, we recommend our PMTT22E Water Trap Tee for this purpose (as shown on page 544 of this catalogue).