

# PT Range Operators Handbook PT models

## **Covering Models:-**

PT5 / PT8 / PT15 / PT24 / PT50D

## **BAMBI AIR COMPRESSORS LTD**

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## **Operating Manual**

## Your Bambi Air Compressor is a precision engineered product. By following these simple steps you will ensure years of trouble free use.

Parts & Service are available from your Bambi dealer.

It is important to quote Model, Type & Serial Number in all communications.

The substitution of parts not manufactured nor approved by Bambi can impair performance, service life and create potential mechanical or personnel hazards and will invalidate your warranty.

Bambi reserves the right to modify the contents of this operating booklet without notice and the information is in no way binding on the company.

## **Technical Specification**

PT Pump Specification	220v	110v
Motor kW / Hp	0.55 / 0.75	0.67 / 1
Voltage	220/240	110
Frequency Hz	50	60
RPM	1450	1700
Displacement I/min	110	125

## **Preventative Maintenance**

Operation	Daily	Weekly	Annually	2 Years
Drain Air Receiver	•			
Replace Air Intake Filter			•	
Check Pressure Relief Activation			•	
Clean Ventilation Grilles			•	
Check Piston Ring				•

Above are to be considered minimum frequency

## Warranty

Provided the operating instructions have been followed, and the compressor has been properly maintained, Bambi PT compressors are guaranteed against faulty workmanship for a period of 1 year. The air receiver is guaranteed for 5 years.

The guarantee does not cover damage by misuse, incorrect parts or service. Contact Bambi Air Compressors or your retailer for further information.

## 1) Safety Precautions

#### What you **must** do:

- Read these instructions before using your air compressor.
- Ensure the compressor has been installed, electrically connected and piped in by a properly qualified person.
- Ensure the compressor is kept upright at all times.

#### What you must not do:

- Do not attempt any maintenance on the compressor until it has been isolated from the power supply.
- Do not attempt any work on the compressor until the air receiver and pipe work systems are depressurised.
- Compressed air is dangerous if misused and can prove fatal. Avoid any bodily contact with compressed air.
- During operation the motor will become quite hot to the touch. Avoid contact to prevent burns.
- Never tamper with the pressure relief valve.
- Never lubricate the oil free motor or pump assembly; this will cause severe damage.
- Never obstruct cooling fans or outlet vents.

## 2) Siting The Compressor

#### What you **must** do:

- Provide adequate protection from the weather.
- Site the compressor level in both planes.
- Allow access for maintenance all around the compressor.
- Site in a dry area, avoiding damp or humid conditions. The site must be dust free, well ventilated and have a cool ambient temperature. 0 to 40°C should be regarded as the minimum and maximum allowable ambient.

#### What you **must not** do:

- Enclose the compressor or allow hot air generated by the motor to recirculate around the compressor.
   Ensure there is 30cm clearance around the compressor
- Restrict air flow around the end cover ventilation grilles.

#### Important!

These compressors generate heat. Never restrict any of the ventilation grilles otherwise serious damage may occur.

## **Electrical Connections**

Where applicable, compressors are supplied with a moulded plug in accordance with national standards.

Never remove the moulded plug.

The use of extension cables is not recommended as this may cause voltage drops

which can result in damage to the motor

220v/50Hz models wired in accordance with European Standard –

Blue = neutral

Brown = live,

Yellow & Green Stripe = earth

110v/60Hz models wired in accordance with US Standard –

White = neutral

Black = live,

Yellow = earth

## **Operation**

## **Starting & Stopping**

Plug the compressor into an outlet socket of nominal voltage.

#### All models:

Switch the compressor on by turning the red control on top of the pressure switch to the "Auto" position.

The compressor will run until the pressure in the receiver is at 8 bar. It will then cut out.



As air is used the pressure drops and the motor will restart at the preset pressure. There is approximately a 2 Bar differential.

#### Note!

Each time the compressor switches off, you will hear a short hiss of air. You are hearing the unloader valve discharging the residual delivery pipe pressure. This is normal.

#### **Adjusting Outlet Pressure**

Use the pressure regulator to adjust the outlet pressure.

To increase line pressure, rotate the knob in a clockwise direction; to decrease turn anti clockwise. It is possible to lock the setting by pushing the knob down until it "clicks" home.

There are two pressure gauges on each model.



The larger gauge indicates the air receiver pressure, the smaller gauge indicates the air outlet pressure.

#### NOTE!

NEVER unplug the compressor when running. Always switch off using the red control on the pressure switch to ensure the compressor discharges.

Failure to do so will cause damage and will invalidate your warranty.

## **Routine Maintenance**

Refer to preventative maintenance section for frequency. [Page 4]

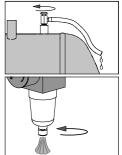
## **Draining the Air Receiver**

Drain water condensate from air receiver at a pressure of no more than 2 Bar.

Slowly open the drain tap provided to allow water to flow out. Close drain tap when all water has drained off.

## **Draining the Filter/Regulator Unit**

Slowly open the drain screw provided to allow water to flow out. Close drain screw when all water has drained off.

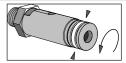


#### Note!

Waste water condensate must be handled in accordance with national environmental rules.

#### **Check Pressure Relief Valve**

Ensure the air receiver is not pressurised.



Unscrew the knurled end of the pressure relief valve until an audible "click" is heard. Retighten without using excessive force.

## **Technical**

We recommend the compressor has a maximum 65% duty cycle to prolong pump life.

#### Note!

The motor must never be allowed to run continuously otherwise it will overheat and may become damaged. The duty cycle is calculated over 10 minutes, meaning that if the motor runs continuously for 6.5 minutes it must then rest for 3.5 minutes.

Do not ignore air leaks. All air connections must be leak free to prevent the compressor from over heating.

The compressor is fitted with a thermal overload. In the event of excessive temperature, the motor will switch off. After about 50 minutes when the motor has cooled it will automatically reset.

You **must** find the cause of the overload and rectify this before continuing to use the compressor.

#### Check for -

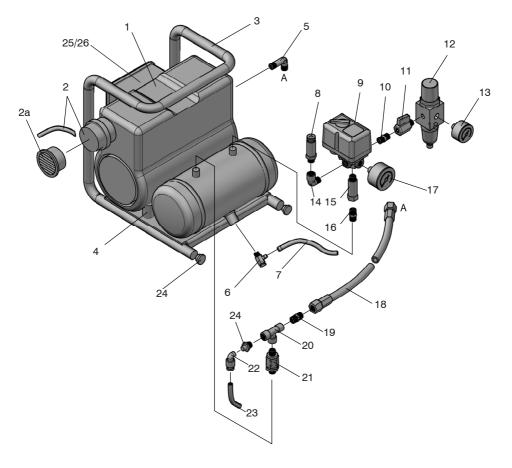
- Drain tap not closed properly
- Air leaks on the pneumatic fittings
- Compressor not the correct size for the work load
- Cooling fan cover vent restricted

If problems persist contact your dealer.

## PT5

	1	1
Ref No.	Description	Part no.
1	Pump motor	BPB1238
2	Pump motor filter	BPB1259
2a	Pump motor filter element	BPB1263
3	Frame	BPB1262
4	Motor support	BPB1261
5	Elbow	BPB1257
6	Drain tap	BPB0066
7	Drain pipe	BPB0414
8	Pressure relief valve	BPB1084
9	Pressure switch	BPB1074
10	Adapter	BPB1078
11	On/off tap	BPB1079
12	Regulator	BPB1080

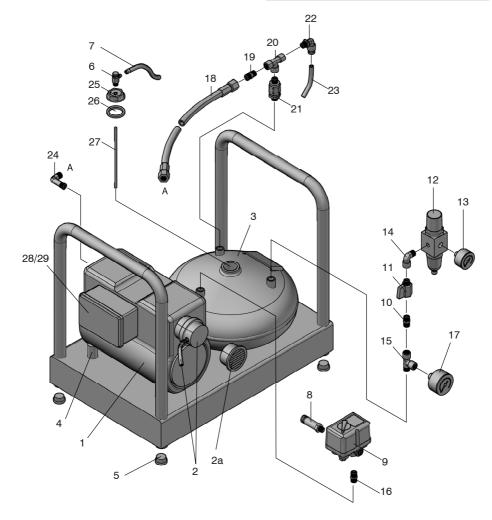
13	40mm line pressure gauge	BPB1077
14	Elbow M/F	BPB1139
15	Extension	BPB0150
16	Connector	BPB0810
17	50mm tank pressure gauge	BPB1081
18	Delivery pipe	BPB1258
19	Connector	BPB1242
20	Tee piece MMM	BPB1239
21	Non-return valve	BPB1086
22	Elbow for air pipe	BPB0043
23	Air pipe	BPB0203
24	Inserts	BPB0078
25	Capacitor box	BPB1236
26	Capacitor	BPB1260



## РТ8

Ref No.	Description	Part no.
1	Pump motor	BPB1238
2	Pump motor filter	BPB1259
2a	Pump motor filter element	BPB1263
3	Frame	BPB1249
4	Motor support	BPB1261
5	Insert	BPB0078
6	Drain tap	BPB0066
7	Drain pipe	BPB0414
8	Pressure relief valve	BPB1084
9	Pressure switch	BPB1074
10	Adapter	BPB1078
11	On/off tap	BPB1079
12	Regulator	BPB1080
13	40mm line pressure gauge	BPB1077

14	Elbow M/F	BPB1139
15	Tee piece MFF	BPB1109
16	Connector	BPB0810
17	50mm tank pressure gauge	BPB1081
18	Delivery pipe	BPB1258
19	Connector	BPB1242
20	Tee piece MMM	BPB1239
21	Non-return valve	BPB1086
22	Elbow for air pipe	BPB0043
23	Air pipe	BPB0203
24	Elbow	BPB1257
25	Inspection plug	BPB0255
26	Inspection plug seal	BPB0502
27	Siphon tube	BPB0028
28	Capacitor box	BPB1236
29	Capacitor	BPB1260

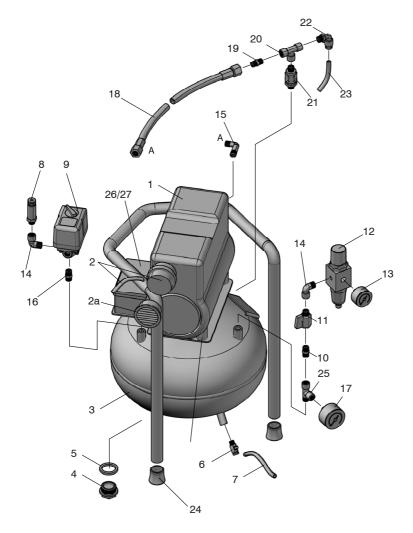


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## PT 15 / 24

Ref No.	Description	Part no.
1	Pump motor	BPB1238
2	Pump motor filter	BPB1259
2a	Pump motor filter element	BPB1263
3	Tank [PT15]	BPB0470
3a	Tank [PT24]	BPB0472
4	Inspection plug	BPB0243
5	Inspection plug seal	BPB0502
6	Drain tap	BPB0066
7	Drain pipe	BPB0414
8	Pressure relief valve	BPB1084
9	Pressure switch	BPB1074
10	Adapter	BPB1078
11	On/off tap	BPB1079
12	Regulator	BPB1080

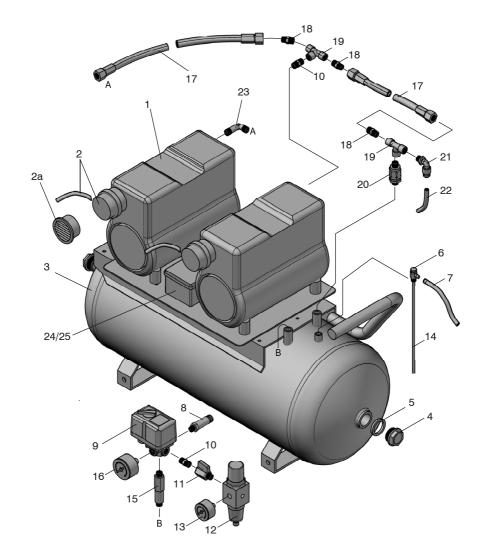
13	40mm line pressure gauge	BPB1077
14	Elbow M/F	BPB1139
15	Elbow	BPB1257
16	Connector	BPB0810
17	50mm tank pressure gauge	BPB1081
18	Delivery pipe	BPB1258
19	Connector	BPB1242
20	Tee piece MMM	BPB1239
21	Non-return valve	BPB1086
22	Elbow for air pipe	BPB0043
23	Air pipe	BPB0203
24	Foot	BPB0247
25	Tee piece	BPB1109
26	Capacitor box	BPB1236
27	Capacitor	BPB1260



## PT50D

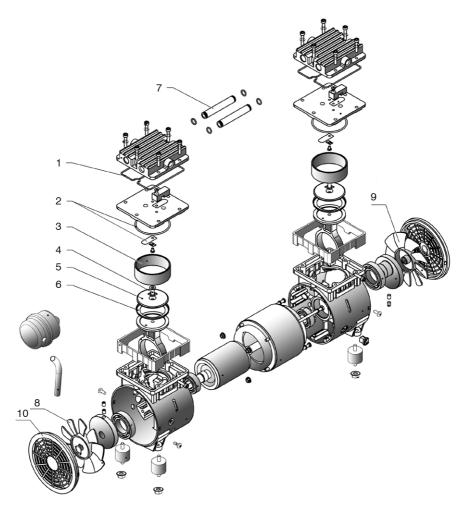
Ref No.	Description	Part no.
1	Pump motor	BPB1238
2	Pump motor filter	BPB1259
2a	Pump motor filter element	BPB1263
3	Tank	BPB0474
4	Inspection plug	BPB0243
5	Inspection plug seal	BPB0502
6	Drain tap	BPB0066
7	Drain pipe	BPB0414
8	Pressure relief valve	BPB1084
9	Pressure switch	BPB1074
10	Adapter	BPB1078
11	On/off tap	BPB1079

12	Regulator	BPB1080
13	40mm line pressure gauge	BPB1077
14	Siphon tube	BPB0028
15	Connector	BPB0152
16	50mm tank pressure gauge	BPB1081
17	Delivery pipe	BPB1258
18	Connector	BPB1242
19	Tee piece MMM	BPB1239
20	Non-return valve	BPB1086
21	Elbow for air pipe	BPB0043
22	Air pipe	BPB0203
23	Elbow	BPB1257
24	Capacitor box	BPB1236
25	Capacitor	BPB1260



## PT Pump spares

Ref No.	Description	Part no.
1	Cylinder head seal	BPB1250
2	Valve plate assembly	BPB1251
3	Cylinder	BPB1253
4	Connecting rod	BPB1254
5	Top washer	BPB1254
6	Piston ring	BPB1254
7	Airway tube, inc. O ring seal	BPB1252
8	Motor fan LH	BPB1255
9	Motor fan RH	BPB1264
10	Fan cover	BPB1256



## **SERVICE RECORD**

Date	installed			

Date	Maintenance work	Signature / Company

## **SERVICE KITS**

BPPT 1 Service Kit covers all models.

PT50D requires two kits.

BPB0655 required to change the Coalescing Filter Element



## EC Declaration of Conformity - Declaration de Conformite CE – EG Konformitatserklarung

## Declaracion de Conformidad CE - EG Verklaring van Overeenstemming

Bambi Air Compressors declares that this product conforms to the European Directives listed below.

Bambi Air Compressors declare que ce produit est conforme aux directives europeennes enumerees ci-dessous.

Bambi Air Compressors declara que este producto cumple con la DirectivaEuropea listada abajo.

Bambi Air Compressors verklaart dat dit product voldoet aan de onderstaande Europese Richtlijnen

Bambi Air Compressors erklart hiermit, dass dieses Produkt mit den Bestimmungen der Nachstehenden EU-Richtlinien ubereinstimmt.

Machinery Safety Standard 89/392 EC, Low Voltage Directive 2006/95 EC Machinery Directive 2006/42 EC, Electromagnetic Compatibility 2004/108 EC

Simple Pressure Vessels 2009/105/EC

EN60034, EN60204-1:2007, EN ISO12100-1-2:2005, EN ISO13857:2010

CE Marking applied for the first time in 1997

IF NO SERIAL NUMBER HERE THEN HANDBOOK ISSUED AS REPLACEMENT OR WITH SERVICE KIT

L. Clutterbuck

Issue 1: 12/15