PRO-B MOBILE DENTAL UNIT OPERATING INSTRUCTIONS

COMPRESSED AIR SUPPLY

This is normally supplied from the compressor mounted on the base of the Unit but may be separate and remotely located. (See separate Operating Instructions for the compressor). Before attempting to operate the Dental Unit ensure that the compressor is switched on, reservoir is full (the motor will have cut out) and normal line pressure of 65psi has been attained.

OPERATING INSTRUCTIONS

INTRODUCTION

The PRO-B Dental Handpiece Control Unit is designed to deliver air and water supplies to the dental handpieces and a syringe spray.

The PRO-B has two handpiece tubings which are selected manually by use of the Handpiece selection switch. This automatically routes air and water supplies to the selected Handpiece. The flow rates are pre set by the operator to match the handpiece and operators needs. The movement is controlled by the operator using the Foot Control.

The control valves and switches are mounted under the base of the PRO-B control head. Left hand side of the Diagram shows the underside of the tabletop and each control valve is identified by a reference letter.

The PRO-B control unit is mounted on a mobile frame and the castors have brakes to protect against accidental movement. The Unit has a height adjustment facility to ensure a comfortable working position also enables storage beneath work counters etc.
WARNING – Please read this manual prior to using or making any adjustments to connected handpieces.

WARNING – Never exceed the handpiece manufacturer’s recommended pressures.

WARNING – Never run a handpiece without a bur/drill bit or manufacturer’s blank fitted.

A – MASTER ON/OFF SWITCH

The PRO-B is unable to operate without activation of this switch. The switch has a positive ON/OFF action and the toggle is grey.

Put the toggle to the ‘ON’ position and the air and water supply will be opened, allowing air and water to flow into the PRO-B pneumatic circuits.

B – SYRINGE SPRAY

The syringe is always located in the left holder on the holder bar. The syringe has two button valves, which when pressed release air or water. The left button supplies water and has a droplet legend. The right button has a cloud legend and supplies compressed air. The two buttons may be pressed together to provide a fine mist spray. The harder either button is pressed the more air or water will be released.

The syringe is supplied with a removable tip and the base of the tip is a locking chuck assembly that securely retains the tip. Tip can be removed for sterilization for autoclaving/cold solutions.

To remove the tip, press and hold the outer ring at the base of the tip and gently remove the tip then release the ring.

To replace the tip, press and hold the ring in, insert the tip fully and release the ring. ALWAYS check that the tip is locked in place before using the syringe again.

C – HANDPIECE HOLDERS – SELECTOR VALVE

There are two (1 & 2) handpiece holders, with tubings supplied to the requested configuration.

The Selector Switch should be set on operate either ‘1’ for the left hand tubing or ‘2’ for the right hand tubing.

NB Only the right hand tubing has coolant water spray.

D – WATER FLOW CONTROL VALVES

A Water flow valve is located on the front panel serving the right hand Handpiece outlet (C2). Rotate anti-clockwise to reduce or shut off the water flow. Excessive force in this direction will cause damage to the water supply tubing.

Rotate clockwise to increase flow. Excessive rotation in this direction will cause the stem to be removed.
**E – DRIVE AIR CONTROL STEM**

Two drive air control stems are fitted - one for each handpiece outlet. These are sited on the underside of the tabletop.

This stem when rotated anti-clockwise reduces the maximum flow of drive air to the handpiece. WARNING – over tightening the stem into may cause damage to the internal components.

When rotated clockwise the maximum flow available to the outlet is increased. Excessive rotation in this direction will cause the stem to be removed.

**F – WATER COOLANT ON – OFF SWITCH**

This is located on the Front Panel and turns the water to the right hand handpiece outlet (C 2) On/Off.

**G – HANDPIECE PRESSURE GUAGE**

The handpiece pressure gauge displays the pressure of the compressed air supplied from the PRO-B control head to a handpiece that is in use.

Set the drive air supply pressures in accordance with the manufacturer’s recommendation for the handpiece to be used.

**H – FOOT CONTROL**

The foot control is connected directly to the PRO-B control head and controls two functions.

Depressing the disc allows proportional airflow and therefore controls the speed of the selected handpiece. Decreasing pressure on the Disc slows or allows the handpiece to stop.

Also on the foot control is a smaller silver button, which can be utilised to operate a Roots Vet dental optional upgrade of incorporated Dental Scaler. See separate details on the operation of an incorporated scaler unit.

**I – BOTTLE WATER SWITCH**

The bottle water switch is mounted under the tabletop at the left hand side rear corner.. This bottle water switch controls the supply of compressed air to the water bottle on the PRO-B and therefore the flow of water.

Pull the bottle water switch towards the outer edge and the bottle will pressurise. Push the bottle water switch inwards and the bottle will be slowly depressurised and the bottle can safely be removed for refilling.
**J – BOTTLE, HOLDER AND GAUGE**

The PRO-B control unit head is fitted with a bottle holder with gauge and a thick wall bottle, which acts as a reservoir.

The bottle should be filled with drinking quality water and should be sediment free. Fill to within 5cms of the neck top.

Do not let the bottle become empty as it may cause air locking within the water system.

Do not remove the bottle when pressurised, always use the bottle water switch (I) to cut off the air supply.

Before removing the bottle, always check the pressure status at the gauge on the bottle holder. The bottle should always be removed slowly to allow any trapped air out through the vents in its thread. Always ensure the bottle you use is the manufacturer’s original item and change once a year.

During normal use the gauge on the bottle holder should read 30 PSI. Do not under any circumstances alter the air supply regulator within the PRO-B control head.

**HANDPIECE SETTINGS**

Check the handpiece manufacturer’s requirements and run the handpiece with a bur fitted.

Press the foot control disc to maximum.

Set the maximum handpiece drive air by adjusting E and monitoring the supply with G.

It is advantageous if a pressure-testing gauge is fitted between the tubing terminal and the handpiece. More accurate results are achieved due to pressure drop between the control head gauge and the tubing terminal.

Set the Water Flow using D – Set the Coolant Air using F.

Please note – some air motors with external water spray pipes may require the coolant air supply to be completely restricted.

**WARNING** - Always shut the service supplies off when the PRO-B is unattended.

**CLEANING**

Do not use alcohol based disinfectants regularly. When used, ensure only light application and preferably remove without delay. Do not use abrasive cleaning substances on any of the surfaces. Regular use of warm soapy water is the best method of cleaning. The use of personal barrier protection is recommended.