

# **80W SOLDERING STATION**

## MODEL NO: SD005

# Thank you for purchasing a Sealey product. Manufactured to a high standard, this product will, if used according to these instructions, and properly maintained, give you years of trouble free performance.

**IMPORTANT:** PLEASE READ THESE INSTRUCTIONS CAREFULLY. NOTE THE SAFE OPERATIONAL REQUIREMENTS, WARNINGS & CAUTIONS. USE THE PRODUCT CORRECTLY AND WITH CARE FOR THE PURPOSE FOR WHICH IT IS INTENDED. FAILURE TO DO SO MAY CAUSE DAMAGE AND/OR PERSONAL INJURY AND WILL INVALIDATE THE WARRANTY. KEEP THESE INSTRUCTIONS SAFE FOR FUTURE USE.



#### 1. SAFETY

#### 1.1. ELECTRICAL SAFETY

**WARNING!** It is the user's responsibility to check the following:

Check all electrical equipment and appliances to ensure that they are safe before using. Inspect power supply leads, plugs and all electrical connections for wear and damage. Sealey recommend that an RCD (Residual Current Device) is used with all electrical products. You may obtain an RCD by contacting your local Sealey stockist.

If the product is used in the course of business duties, it must be maintained in a safe condition and routinely PAT (Portable Appliance Test) tested.

#### Electrical safety information, it is important that the following information is read and understood.

- 1.1.1. Ensure that the insulation on all cables and on the appliance is safe before connecting it to the power supply.
- 1.1.2. Regularly inspect power supply cables and plugs for wear or damage and check all connections to ensure that they are secure.
- 1.1.3. **IMPORTANT**: Ensure that the voltage rating on the appliance suits the power supply to be used and that the plug is fitted with the correct fuse see fuse rating in these instructions.
- **× DO NOT** pull or carry the appliance by the power cable.
- **DO NOT** pull the plug from the socket by the cable.
- DO NOT use worn or damaged cables, plugs or connectors. Ensure that any faulty item is repaired or is replaced immediately by a qualified electrician.
- 1.1.4. This product is fitted with a BS1363/A 13 Amp 3 pin plug.

If the cable or plug is damaged during use, switch the electricity supply and remove from use. Ensure that repairs are carried out by a qualified electrician.

Replace a damaged plug with a BS1363/A 13 Amp 3 pin plug. If in doubt contact a qualified electrician.

a) Connect the GREEN/YELLOW earth wire to the earth terminal 'E'.

- b) Connect the BROWN live wire to the live terminal 'L'.
- c) Connect the BLUE neutral wire to the neutral terminal 'N'.

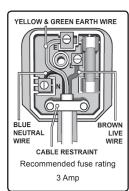
Ensure that the cable outer sheath extends inside the cable restraint and that the restraint is tight.

Sealey recommend that repairs are carried out by a qualified electrician.

#### 1.2 GENERAL SAFETY

- **WARNING!** Ensure Health & Safety, local authority, and general workshop practice regulations are adhered to when using this equipment.
- ✓ Familiarise yourself with the application, limitations and potential hazards of the soldering station.
- Replace or repair damaged parts. Use genuine parts only. Unauthorised parts may be dangerous and will invalidate the warranty.
- Locate soldering station in a suitable working area, keep area clean and tidy and free from unrelated materials.
- $\checkmark$  Keep the work area clean, uncluttered and ensure there is adequate lighting.
- Keep the soldering iron clean for best and safest performance.
- Ensure there are no flammable or combustible materials near the work area.
- ✓ Wear approved safety eye protection (standard spectacles are not adequate).
- Wear appropriate protective clothing.
- $\checkmark$  Ensure the workpiece is adequately held before operating the soldering iron.
- Always replace the soldering iron in its holder when not in use.
- Remove excess solder from the soldering iron by wiping the tip on a damp, natural sponge; not by abrupt force.
- DO NOT attempt to remove excess solder from the soldering iron by shaking it. Hot solder may become airborne and land on skin causing burns and blisters.
- \* **DO NOT** allow children or pets into the area where the soldering is taking place.
- **x DO NOT** attempt to cool the gun with water.

**NOTE:** This appliance can be used by children aged from 8 years and above and persons with reduced physical, sensory or mental capabilities or lack of experience and knowledge if they have been given supervision or instruction concerning use of the appliance in a safe way and understand the hazards involved. Children shall not play with the appliance. Cleaning and user maintenance shall not be made by children without supervision.



### 2. INTRODUCTION

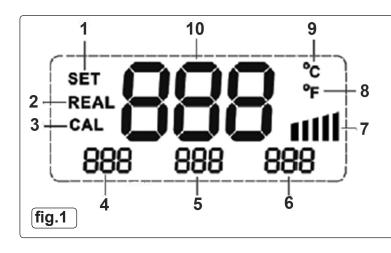
**Model No. SD005** - 80W Soldering Station with rapid heat up. MCU Controlled temperature calibration. LCD Display screen showing current temperature and settings. User-friendly menu. Maintains temperatures between 150-480°C. Capable of pre-setting three frequently used temperatures. Supplied with soldering sponge and soldering iron stand.

#### 3. SPECIFICATION

Model No:	SD005
Frequency:	50Hz
Heating Element Voltage:	
Power:	80W
Supply:	230V
Temperature Accuracy:	±10°C
Temperature Range:	150-480°C(302-896°F))
Temperature Stability:	±2°C (in still air, no load)
Tip-to-Ground Resistance:	
Tip-to-Ground Voltage:	< 2mV
Replacement tip	SD003ST
Replacement heating element	
Replacement iron and cable	SD005IC
Optional extra:	
Tip thermometer	SD003TT



### 4. OPERATION



1.										Set Temper	rature Mode
2.										Real-Time Temper	rature Mode
3.										Calib	ration Mode
4.										emperature Store	d: Channel1
5.										emperature Store	d: Channel2
6.										emperature Store	d: Channel3
7.										Analogue Cur	rent Display
8.										Fahrei	nheit Values
9.										Ce	Isius Values
10										Real-Time Tip 1	Temperature



NOTE: Dampen the sponge wiper before using the soldering station.

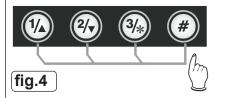
#### 4.1. CONNECTION

- 4.1.1. Push the DIN plug attached to the iron lead into the socket on the front panel of the control unit.
- 4.1.2. Plug the power cable into the mains power supply after ensuring that it is to the correct standard.

### 4.2. SWITCHING ON (fig.1)

- 4.2.1. Switch the on/off switch to the ' ' setting. Switch is located on the side of the unit.
- 4.2.2. The current set temperature will be displayed for 3 seconds.
- 4.2.3. After a further 3 seconds, the display will show the real-time temperature of the tip and charging activity if heating is required.
- NOTE: The number of bars shown by the analogue current display (fig.1.7) represent the current being applied to the tip.
- 4.3. TEMPERATURE SETTING (fig.2, fig.3, fig.4)



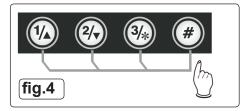


- 4.3.1. The factory set default temperatures stored by buttons: 1, 2 and 3 are 200,300 and 400°C respectively.
- 4.3.2. Select button 1, 2 or 3 to initiate required stored temperature.
- 4.3.3. With the normal settings applied, the temperature can be adjusted by means of the ▲ and ▼ buttons (fig.3).
- 4.3.4. The display will go to 'SET' and the required temperature will either increase or decrease. Holding the button down will allow rapid adjustment.

- 4.3.5. When the button is released, the display will revert to 'REAL' to illustrate the current temperature.
- 4.3.6. To store a required temperature, set as in 3.3.3., then hold one of the preset buttons down for 3 seconds whilst pressing the # button simultaneously. The new temperature will then become the stored value assigned to that button (fig.4).

### 4.4. LOCKING THE KEYPAD (fig.4, fig.5)

- 4.4.1. The keypad may be locked by pressing the # button for 3 seconds.
- 4.4.2. The display will show 'Loc' (fig.5) and none of the buttons will function.
- 4.4.3. To unlock the keypad, press the # button again for 3 seconds or longer and the display and button functions will revert to normal.





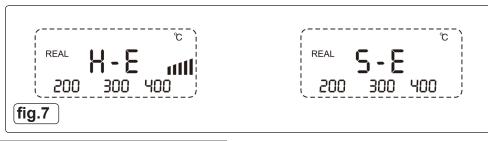
#### 4.5. CALIBRATION (fig.6)

- 4.5.1. Ensure that the tip of the soldering iron is well tinned with solder to disperse the heat.
- 4.5.2. Set tip temperature to 350°C. When tip is indicated to be at temperature, measure the tip actual temperature using a suitable, reliable and accurate device.
- 4.5.3. If actual temperature exceeds the set temperature press ▲ until the difference is displayed. If set temperature exceeds measured temperature, press ▼ until the difference is displayed e.g. if measured temperature is 350°, and display shows 370°, the display will need reducing by 20°. Scroll will the ▼ button until -20° is reached.
- 4.5.4. To access the calibration process press button '\* ' for 3 seconds. 'CAL' will be displayed.
- 4.5.5. After making any required adjustments press ' \* ' to save the setting.



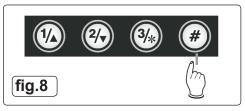
### 5. ERROR MESSAGES

**5.1.** If either of the two screens below are displayed, turn the unit off and replace the heating element (section 7.2). H-E indicates heating element failure, S-E indicates Sensor element failure.



#### 6. TEMPERATURE UNITS

- 6.1. To change the units used in the measurement of temperature hold down the # button whilst turning the unit on.
- 6.2. The temperature units to be used and indicated on the digital display will then be stored automatically for use.

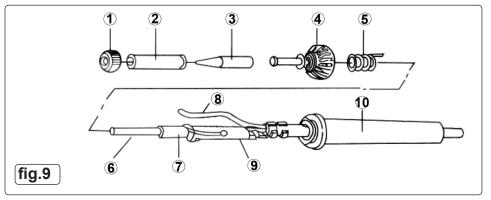


#### 7. MAINTENANCE

- DO NOT open the casing; there are no user-servicable parts inside. In case of malfunction, return to your Sealey stockist or Service Agent.
- 7.1. CLEANING
- **DO NOT** shock or tap the iron tip to remove excess solder; use the dampened sponge wiper.
- 7.1.1. Clean the casing with a moist, soapy cloth, having ensured that the unit is isolated from the electrical supply.

#### 7.2. ELEMENT REPLACEMENT (fig.9)

- 7.2.1. Power off and unplug the unit. Wait for the heating to cool down.
- 7.2.2. Loosen knurled nut (9.1), remove tip retainer (9.2) and soldering tip (9.3).
- 7.2.3. Unscrew plastic nut (9.4) and withdraw heating element.
- 7.2.4. Remove the spring and reattach to new heating element.
- 7.2.5. Reassemble unit and undertake calibration of the new element (Section 4.5).



Parts support is available for this product. Please log on to www.sealey.co.uk, email sales@sealey.co.uk or telephone 01284 757500

#### ENVIRONMENT PROTECTION

Recycle unwanted materials instead of disposing of them as waste. All tools, accessories and packaging should be sorted, taken to a recycling centre and disposed of in a manner which is compatible with the environment. When the product becomes completely unserviceable and requires disposal, drain any fluids (if applicable) into approved containers and dispose of the product and fluids according to local regulations.

#### WEEE REGULATIONS

Dispose of this product at the end of its working life in compliance with the EU Directive on Waste Electrical and Electronic Equipment (WEEE). When the product is no longer required, it must be disposed of in an environmentally protective way. Contact your local solid waste authority for recycling information.

Note: It is our policy to continually improve products and as such we reserve the right to alter data, specifications and component parts without prior notice. Important: No Liability is accepted for incorrect use of this product.

Warranty: Guarantee is 12 months from purchase date, proof of which is required for any claim.

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