

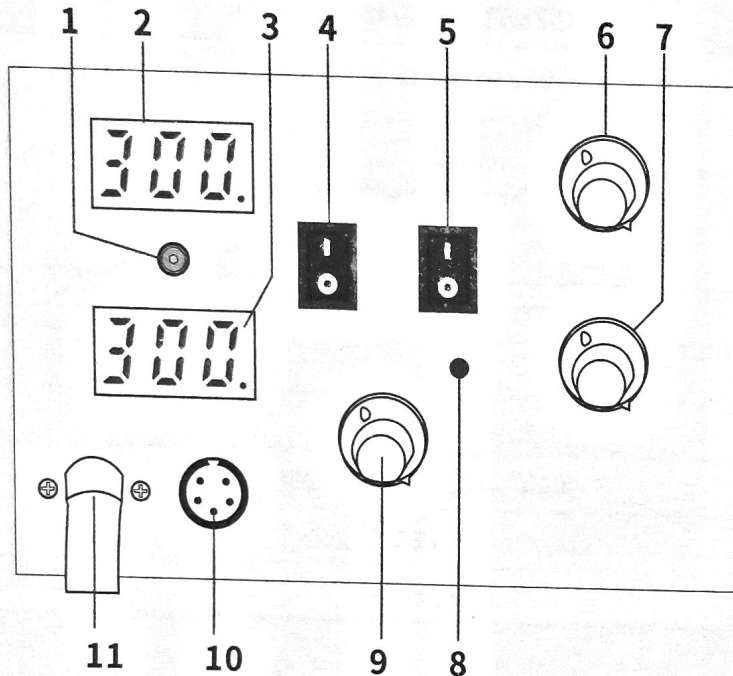
## SPECIFICATION

Dimensions	L158xW186xH124mm ±5mm
Operating ambient temperature	0°C~40°C/32°F~104°F
<b>Hot Air Station</b>	
Airflow type	Brushless fan with soft air
Airflow capacity	≤120L/min
Temperature range	100°C~480°C/212°F~896°F
Display	LED
<b>Soldering Station</b>	
Temperature range	100°C~480°C/212°F~896°F
Display	LED
Soldering tip to ground resistance	<2 ohms

## I. APPLICATIONS

1. This station is great for soldering and rework applications on SOIC, CHIP, QFP, PLCC, BGA, SMD, and many other types of components. This station is also an excellent choice for rework applications on FFC, FPC.
2. The station's applications include heat shrinking, drying, paint removal, adhesive removal, defrosting, pre-heating, soldering wire glues, and more.

## II. CONTROL PANEL



1. Automatic / Manual Mode Switch  
(Hot Air Rework Station)
2. Temperature Display (Soldering Station)
3. Temperature Display  
(Hot Air Rework Station)
4. Power Switch (Soldering Station)
5. Power Switch (Hot Air Rework Station)
6. Temperature Adjustment Knob  
(Soldering Station)
7. Temperature Adjustment Knob  
(Hot Air Rework Station)
8. Air Output Indicator
9. Air Volume Adjustment Knob
10. Power Connector (Soldering Iron)
11. Power Cord (Hot Air Gun)

## III. OPERATION

### Hot Air Station

1. Set the rework station correctly, install the hot air gun holder on the left side of the station, and then place the hot air gun onto the holder.
2. Install the selected nozzle (Use of nozzles in larger diameters are recommended). Connect the station's power cord to an electrical outlet.

1. Set the rework station correctly, install the hot air gun holder on the left side of the station, and then place the hot air gun onto the holder.
2. Install the selected nozzle (Use of nozzles in larger diameters are recommended). Connect the station's power cord to an electrical outlet.
3. Turn ON the master power switch located at the rear of the station, then turn ON the hot air gun's power switch. The hot air temperature display will show "---" to indicate the gun in standby mode. Use the increase or decrease button the temperature adjustment knob to set the desired temperature. Pick up the hot air gun, and it will enter standard operation mode; the hot air station's operation indicator light (the dot located at the bottom-right of the hot air temperature display) will turn ON.

300.

*Indicator for program tracking temp. at high speed and making temp. compensations.*

The operation indicator light will stay ON constantly when station heating up, blink rapidly when the temperature is stabilized, and be turned OFF when station cooling. Adjust the air volume adjustment knob to set the desired air volume, and begin operation once the temperature has stabilized. Once the temperature is stabilized, its status is clearly indicated with the rapidly flashing operation indicator. The precision PID program is tracking and compensating the hot air gun's temperature every millisecond, the hot air gun's temperature is now in a stable and precise thermostatic state.

4. When the operation is complete, set the hot air gun's manual/automatic mode to automatic before placing the hot air gun back to its holder. After this procedure, the hot air gun will cut its power to the heating element automatically and turn OFF the operation indicator light. The hot air gun will not heat up and only put air out to cool the heating element. When the temperature drops below 100°C (212°F), the hot air temperature display will show "---". Turn OFF the hot air station's power switch at this point. If the station is not in use for an extended period, you MUST turn OFF the power switch and DISCONNECT the station's power plug.

## Soldering Station

1. Connect the soldering iron to the station, and place the iron into its holder.
2. Turn ON the station's master power switch located at the rear of the station, and then turn ON the soldering station's power switch. The soldering station's heating element will begin heating, and its operation indicator light (the dot located at the bottom-right corner of the soldering station display) will turn ON.

300.

Indicator for program tracking temp. at high speed and making temp. compensation.

The operation indicator light will stay constantly ON when station heating up, blink rapidly when the temperature is stabilized, and be turned OFF when station cooling. Begin your operation once the soldering station's indicator is blinking rapidly to indicate the temperature's stabilization.

**CAUTION:** Upon the first use of the soldering iron, set the temperature to 250°C/482°F. When the iron is just hot enough to melt solder, coat the soldering iron tip with a layer of solder (the use of rosin core solder is recommended), then set the temperature to your desired value.

3. When the operation is complete, use a damp sponge or metal wool ball to clean the soldering iron tip. Tin the soldering iron tip with a new layer of solder, then put the soldering iron back to the holder and turn OFF the soldering station's power switch. If the station is not in use for an extended period, turn OFF the master power switch and DISCONNECT the power cord.

## Automatic / Manual Hot Air Modes

Select the automatic or manual hot air modes based on the hot air gun's usage frequency. Selecting the appropriate hot air mode can help improve work efficiency and safety significantly.

1. Flip the toggle switch on the control panel to select the hot air mode (automatic/manual)
2. "AUTO" indicates the hot air gun in automatic mode, and the station will cut the power to the heating element when the hot air gun is in the holder. The heating element will be cooled to below 100°C (212°F), and the display will show "---" to indicate the hot air gun in standby mode.
3. "MAN" indicates the hot air gun in manual mode; the hot air gun will continue operating when placed in the holder.

## IV. MAINTENANCE & PRECAUTIONS

### Hot Air Rework Station

1. Keep the air outlet clear and free of blockages at all times.
2. The installation of the hot air nozzles MUST be carried out ONLY when the steel pipe and nozzle have cooled. Install the nozzle correctly, DO NOT install the nozzle with brute force, pull the edge of the nozzle with tweezers, or over-tighten the screws.
3. Select the appropriate nozzle based on your operation requirement (temperature may vary when you using nozzles in different diameters). When using nozzles smaller than the standard machine nozzles, you MUST use the maximum air volume with a relatively lower temperature setting. Complete this operation in the shortest possible duration to avoid damaging the hot air gun.
4. Keep a minimum distance of 2mm between the object and the hot air gun's air outlet.
5. DO NOT allow the hot air to come in direct contact with facial parts, and beware of the danger of burn injuries. Upon the first use, the hot air gun may emit white fumes, and the white fume will dissipate in a short while.

**NOTE:**

*The station's hot air gun and soldering iron handles use high-strength stainless steel tubes. The station goes through 4 times or more testing, inspection, and calibration procedures before rolling off the assembly line. The steel tube may exhibit light bronze color as a result of our quality control efforts. It is normal to have a slightly bronzed steel tube when using a brand-new station, rest assured for regular usage.*

### Soldering Station

1. If a layer of oxidization forms on the surface of the soldering iron tip, a misconception can be created that the tip cannot heat up properly to melt the solder and do the tinning. However, the actual temperatures of both the heating element and tip are high. In such an instance, please do not increase the temperature value confusedly but use a metal wool ball to remove the oxidization following the steps below:

- A. Set the temperature to 300°C (572°F).*
  - B. Once the temperature stabilizes, gently rub the soldering iron tip inside the metal wool ball.*
  - C. When the oxidization is partially removed, continue applying solder onto the soldering iron tip while rubbing it until the tip is completely coated with solder. If the tip is too severely oxidized beyond cleaning, replace it with a new one.*
2. DO NOT use metal files to remove the oxidization on the soldering iron tip. If the soldering iron tip deforms or rusts, replace the soldering iron tip with a new tip.
  3. DO NOT apply excessive force on the soldering iron tip when soldering. Doing this will NOT IMPROVE the heat transfer but damage the soldering iron tip instead.
  4. When placing the soldering iron back in the holder to idle after a high-temperature operation, adjust the temperature to 250°C (482°F) or below for idling. Failure to do so, and leaving the soldering iron tip to idle in a high-temperature setting will cause the accelerated aging of the heating element and shorten the lifespan of the heating element and soldering iron tip.
  5. After every operation, clean the soldering iron tip, then tin the tip with a new layer of solder to prevent oxidization.

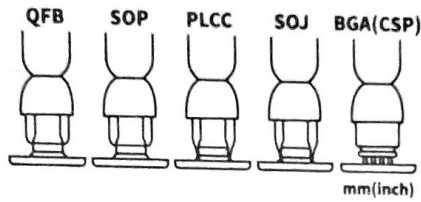
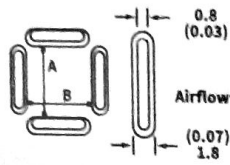
## V. TROUBLESHOOTING

1. "S-E" – This is an indication that the station's sensor module is faulty. You need to replace the heating element (the heating element and the sensor modules) Or, the soldering iron is not connected (Turn OFF the station, connect the soldering iron and turn ON the station)
2. When replacing the heating element, take note of the original connecting order and colors of the wires which MUST NOT be connected incorrectly.

## For reference: compatible parts

### Nozzle style (specifications and sizes)

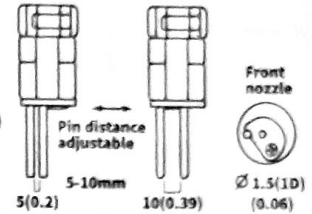
The nozzle sizes match with their corresponding IC sizes.



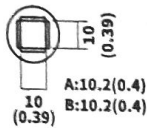
A1325

Single-tube  
φ 1.5x5.10

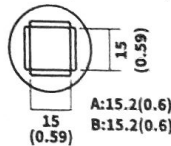
(0.06x0.02-0.39)  
Pin distance  
adjustable



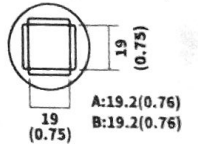
A1125 QFP 10x10  
(0.39x0.39)



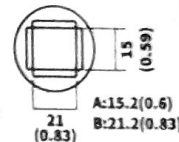
A1126 QFP 14x14  
(0.55x0.55)



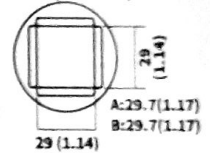
A1127 QFP 17.5x17.5  
(0.68x0.68)



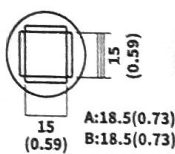
A1128 QFP 14x20  
(0.55x0.78)



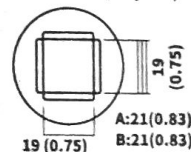
A1129 QFP 28x28  
(1.1x1.1)



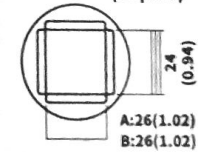
A1135 PLCC 17.5x17.5  
(0.68x0.68)  
(44pins)



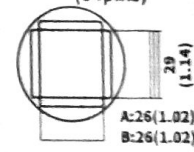
A1136 PLCC 20x20  
(0.78x0.78)  
(52pins)



A1137 PLCC 25x25  
(0.98x0.98)  
(68pins)



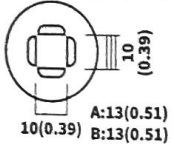
A1138 PLCC 30x30  
(1.18x1.18)  
(84pins)



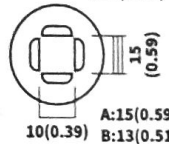
A1139 PLCC 12.5x7.3  
(0.49x0.49)  
(18pins)



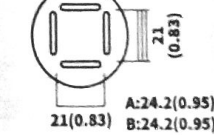
A1140 PLCC 11.5x11.5  
(0.45x0.45)  
(28pins)



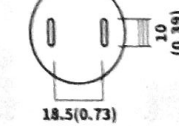
A1141 PLCC 11.5x14  
(0.45x0.55)  
(28pins)



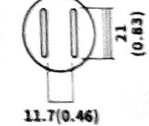
A1182 BOFP 24x24  
(0.94x0.94)



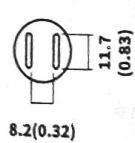
A1187 TSOL 18.5x8  
(0.73x0.31)



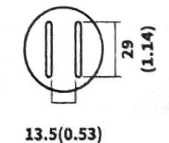
A1257 SOP 11x21  
(0.43x0.83)



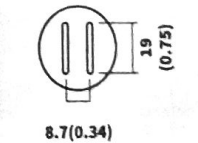
A1258



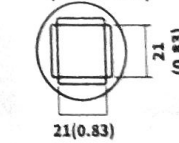
A1259 SOP 13x28  
(0.51x1.1)



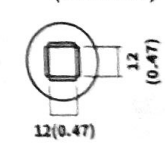
A1260 SOP 8.6x18  
(0.34x0.71)



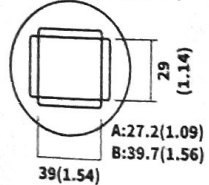
A1261 OFP 20x20  
(0.78x0.78)



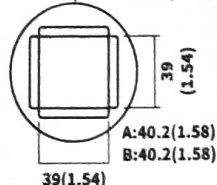
A1262 OFP 12x12  
(0.47x0.47)



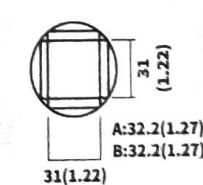
A1263 QFP 28x40  
(1.1x1.57)



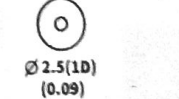
A1264 QFP 40x40  
(1.57x1.57)



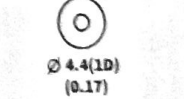
A1265 QFP 32x32  
(1.26x1.26)



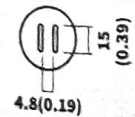
A1124 Single-tube  
φ 2.5  
(1.1x1.57)



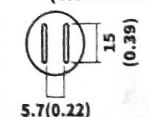
A1130 Single-tube  
φ 4.4  
(0.17)



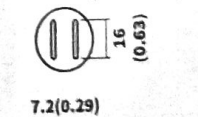
A1131 SOP 4.4x10  
(0.17x0.39)



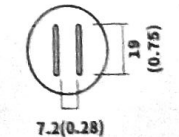
A1132 SOP 5.6x13  
(0.22x0.51)



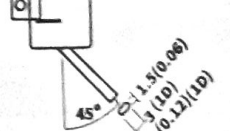
A1133 SOP 7.5x15  
(0.3x0.59)



A1134 SOP 7.5x18  
(0.3x0.7)



A1142 Curved single tube  
1.5x3  
(0.06x0.12)



# Tip style (specifications and sizes)

900M Series Tip Out Diam  $\phi$  6.5mm

<p><b>900M-T-0.8D</b></p> <p><math>\phi</math> 0.8mm 17mm</p> <p>0°C</p>	<p><b>900M-T-LB</b></p> <p><math>\phi</math> 0.5mm 25mm .2r</p> <p>-10°C/-18°F</p>	<p><b>900M-T-K</b></p> <p>5.0mm 15mm</p> <p>30°C/54°F</p>
<p><b>900M-T-1.2D</b></p> <p><math>\phi</math> 1.2mm 17mm</p> <p>0°C</p>	<p><b>900M-T-0.5C</b></p> <p><math>\phi</math> 0.5mm 15mm 45°</p> <p>0°C</p>	<p><b>900M-T-R</b></p> <p>5.0mm 3.2mm 17mm</p> <p>0°C</p>
<p><b>900M-T-1.6D</b></p> <p><math>\phi</math> 1.6mm 17mm</p> <p>0°C</p>	<p><b>900M-T-0.8C</b></p> <p><math>\phi</math> 0.8mm 17mm 45°</p> <p>0°C</p>	<p><b>900M-T-RT</b></p> <p>4.2mm 2.0mm 17mm</p> <p>0°C</p>
<p><b>900M-T-2.4D</b></p> <p><math>\phi</math> 2.4mm 17mm</p> <p>0°C</p>	<p><b>900M-T-1C</b></p> <p><math>\phi</math> 1.0mm 15mm 45°</p> <p>0°C</p>	<p><b>900M-T-SI</b></p> <p><math>\phi</math> 1.0mm 13mm .2r</p> <p>0°C</p>
<p><b>900M-T-3.2D</b></p> <p><math>\phi</math> 3.2mm 17mm</p> <p>0°C</p>	<p><b>900M-T-1.5CF</b></p> <p><math>\phi</math> 1.5mm 15mm 60°</p> <p>0°C</p>	<p><b>900M-T-I</b></p> <p><math>\phi</math> 1.0mm 17mm .2r</p> <p>-10°C/-18°F</p>
<p><b>900M-T-1.2LD</b></p> <p><math>\phi</math> 1.2mm 25mm</p> <p>-10°C/-18°F</p>	<p><b>900M-T-2C</b></p> <p><math>\phi</math> 2.0mm 17mm 45°</p> <p>0°C</p>	<p><b>900M-T-H</b></p> <p>3.5mm 7.5mm 25° 19mm</p> <p>-20°C/-36°F</p>
<p><b>900M-T-SB</b></p> <p><math>\phi</math> 2mm 14mm .2r</p> <p>0°C</p>	<p><b>900M-T-3C</b></p> <p><math>\phi</math> 3.0mm 17mm 45°</p> <p>0°C</p>	<p><b>900M-T-1.8H</b></p> <p>1.8mm 7.5mm 25° 14mm</p> <p>-10°C/-18°F</p>
<p><b>900M-T-B</b></p> <p><math>\phi</math> 1.0mm 17mm .5r</p> <p>0°C</p>	<p><b>900M-T-4C</b></p> <p><math>\phi</math> 4.0mm 17mm 45°</p> <p>0°C</p>	<p><b>900M-T-S4</b></p> <p><math>\phi</math> 2.0mm 15mm .25r</p> <p>0°C</p>