

English



Premium Complete Rework station with Pneumatic Pump

Ref. RMVE-A



Index

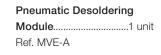
JT Hot Air station	
Features	7
JT Changing nozzles	8
JT-TA Changing the Heater Hose Set	9
JT-TA Replacing the Heating Element	9
T260 Pick & Place	9
Protectors & Extractors	10
Operation & Process Control with JT	11
DDE Control Unit & MVE Module	
Features	14
Adjustable Stands	16
Tip Cleaner	17
T245 Compatible Handles	18
T245 Changing Cartridges	19
DR560 Changing Tips	20
DR560 Changing the Heating Element	21
DR560 Tin Deposit Cleaning	22
DR560 Tip Care	22
MVE Initial Setup	23
MVE Changing the pump filters	24
Desoldering Process DDE & MVE	25
Operation with DDE	26
Process Analysis	28
Soldering Net	29
Working with robots	29
Station Sotware	30
Maintenance	31
Safety	
Specifications	
Exploded View	
•	

Packing list.....3

Packing List

The following items should be included:

JT Control Unit1 unit	DDE Control Unit1
Ref. JT-1B	Ref. DDE-1A (120V)
JT-2B	DDE-2A (230V)
JT-9B	DDE-9A (100V)







Stand1 unit



Stand1	unit
Ref. JT-SB	





Heater hose set1 u
Ref. JT-T1A (100V / 120V)

JT-T2A (230V)





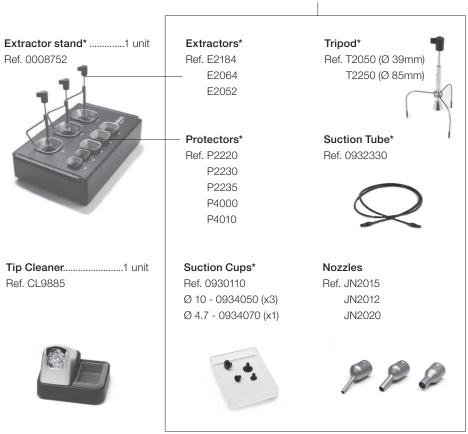












Cartridges.....2 units Ref. C245903 C245906





Ref. S0354



Sponge1 unit

Brush1 unit

Ref. CL6217

DR560 Accessories

Ref. 0010211

Tip cleaning setRef. 0965970	1 unit Long Tip Cleaning set		
Tips 3 units Ref. C560005 C560013 C560004	Tin deposit 1 unit Ref. 0812620	Spanner 1 ur Ref. 0780550	
Filter Box1 unit Ref. 0780840 It contains 10 filters	Internal joint Case2 units Ref. 0812360	Metal tin diposit1 uni Ref. 0812630	



Filter Box1 unit Ref. 0005966

It contains 50 filters



Suction Filter1 unit Ref. 0821830



Mille

^{*} These accessories are not supplied with JT-2QC / JT-1QC / JT-9QC stations.



JT Features

Ref. T260-A



Bent Needles Set.....1 unit Straight Needles Set.....1 unit Ref. 0861660



Ref. 0940163



Ref. 0901546

Cups Set.....1 unit Union Flanges1 unit Ref. 0011356



Stand Cable....





Ref. 0786640



Escape Filter1 unit Ref. 0008446



Ref. 0011283

Power cords

For DDE 1 unit Ref. 0013671 (100/120V) 0010569 (230V)

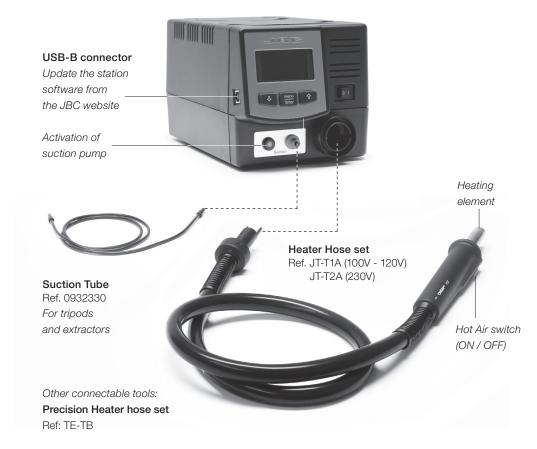


For JT.....1unit Ref. 0009417 (100V/120V) 0009401 (230V)



Manual1 unit Ref. 0014689









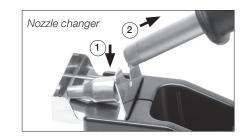
JT-TA Changing nozzles

1. Placing

Place the heating element so that the bottom of the nozzle fits into the changer.

2. Pulling

Pull gently to release the nozzle.



In case of misalignment of the nozzle with the JT-TA heater:

1. Bend down the nozzle tab with a screwdriver or flat nosed pliers.

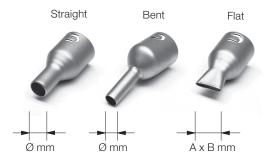


2. Insert the nozzle into the JT-TA Heater again.



Compatible Nozzles

The JT-TA works with JT nozzles. Find the model that best suits your soldering needs in www.jbctools.com



Ref.	Shape	Size
JN2020	Straight	Ø 8mm
JN8417	Straight	Ø 10mm
JN2015	Bent	Ø 4mm
JN2012	Bent	Ø 6mm
JN6633	Bent	Ø 8mm
JN7637	Flat	10 x 2mm
JN7638	Flat	20 x 2mm
JN7639	Flat	30 x 2mm

JT-TA Changing the Heater Hose Set

- 1. Ensure that the tool is turned off.
- 2. Use a wrench to unscrew the connecting nut.
- 3. Pull back the connecting nut.
- **4.** Tube end must be inserted so that the longitudinal rib fits into the groove.
- 5. Follow the same steps conversely.



JT-TA Replacing the Heating Element

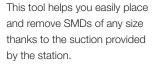
Only perform this operation when the element is cold and the unit is disconnected from the mains.



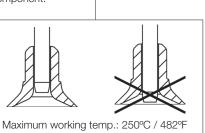
Press the button to

start/stop the suction

T260 Pick & Place



Choose the suction cup that best fits the component.



Insert the needle with the appropriate cup for a correct suction process.

You should avoid the needle to stick out of the lower part.

1. Suction



Once activated the suction button, cover the pen hole with your finger and pick the component.

2. Release

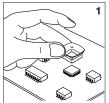


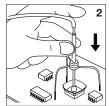
Lift your finger to release the component on the appropriate place.



Protectors & Extractors

For small components (fig. 1 and 2). We recommend using the protector + tripod



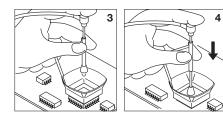


Protectors

*	Ref. A	AxB (mm)	*	Ref. A	AxB (mm)
	P3353	4,3 x 3	48	P2230	15 x 15
	P3786	5,2 x 5,2	60	P4010	17 x 17
	P3352	5,2 x 7,5		P4005	18 x 29
	P3355	5,2 x 9,5		P4030	18,5 x 18,5
	P3356	6,2 x 4,2		P1068	18,5 x 24
	P3785	7,2 x 7,2		P2685	28,5 x 28,5
	P3784	8,2 x 8,2		P4085	31,5 x 31,5
	P4035	9 x 13		P2672	33 x 46
	P4040	9,5 x 19		P4002	50 x 50
	P4080	9,5 x 21		P3357	52,5 x 14
32	P2220	10 x 10			
	P4045	10,5 x 21		3	
	P4090	11 x 16			TRIPOD
24	P2235	12 x 17		6	PROTECTOR
	P1249	12 x 23			-8/
44	P4000	12,5 x 12,5			
	P3354	13,2 x 13,2		T.	***/ <u>'</u>
	P4025	13,5 x 21,5			

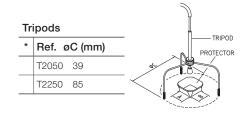
^{*} Reference Desk

For big components (fig. 3 and 4). We recommend using the extractors



Extractors

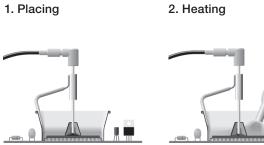
*	* Ref. AxB (mm)		*	Ref. AxB (mm)
52	E2052	20 X 20		E2124 45 X 45
64	E2064	20 X 26		
80	E2184	24 X 24		9
	E2068	27 X 27		
	E4020	28,5 X 28,5		
-	E4015	31,5 X 31,5		
	E2084	33 X 33		4 X 9>
	E2100	38 X 38		× ×



Manual extractor Ref. øD (mm) E2190 7



Operation with JT station



Position the suction cup.

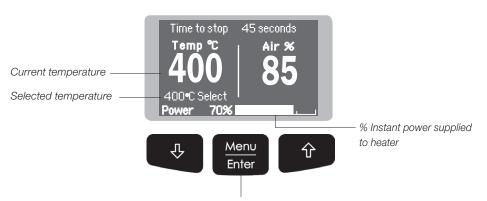
Push the button for hot air heating. The solder melts.

3. Releasing

The component lifts off automatically.

Process Control

Manual Mode

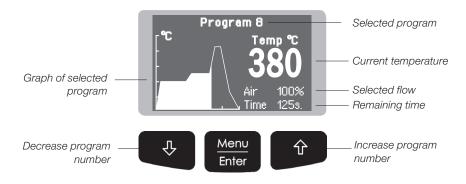


Access Menu (pess key 2 seconds) & Confirm Selection

You can switch between operating modes (Manual Mode / Profile Mode) by pressing the "increase" and "decrease" keys simultaneously for 2 seconds. (Only when mode profiles is ON)



Program Mode



Edit Program

This option allows you to edit or create a program.

First, you must select the program to edit and then modify the points that make up the program. Each program is composed of 9 points, each point consisting of 3 parameters:

- 1. Time (seconds)
- 2. Temperature (°C / °F)
- 3. Flow rate (%)

You can delete the last point of the program by selecting "----" in the time parameter. It should be taken into account that the regulation range permitted by the station is between 150°C and 450°C, whereby it is not possible to create temperature ramps between room temperature (Toff) and 150°C.

The station can store up to 25 temperature programs.

The first three programs are edited as an example.

Copy Program

This option allows you to copy a program.

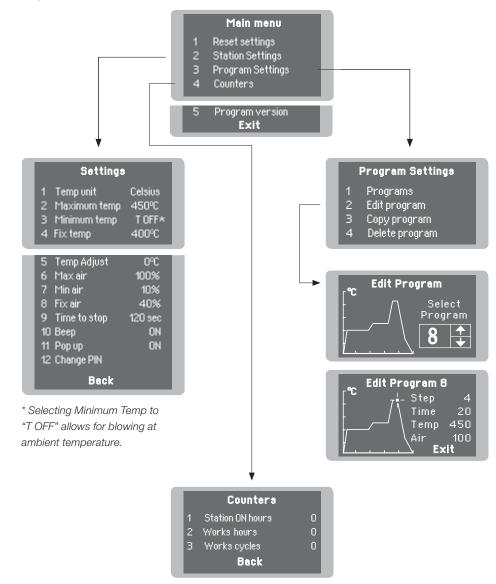
You must select the program source and the program destination (where it will be copied).

Delete Program

This option will allow you to delete a previously selected program.

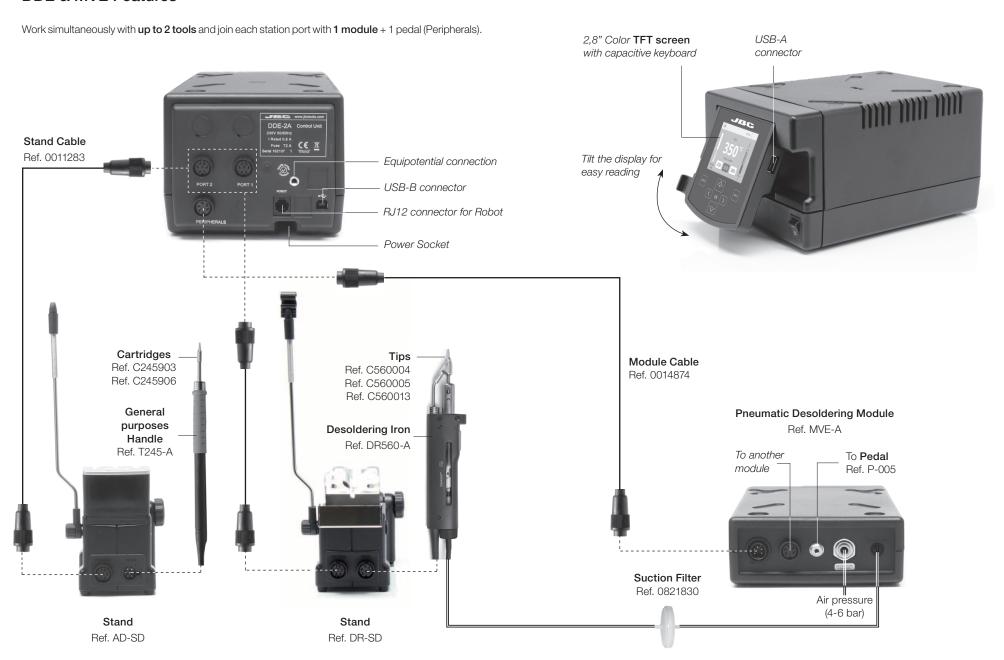
Menu Screen

Original PIN: 0105



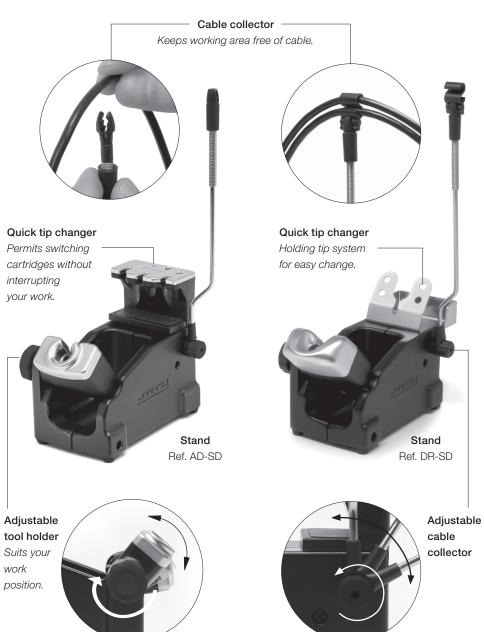


DDE & MVE Features



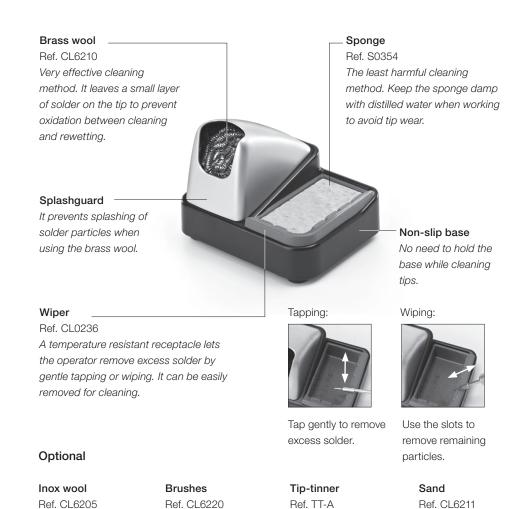


Adjustable Stands



Tip Cleaner

Improve thermal transfer by cleaning the tip after each solder joint.





T245 Compatible Handles

For C245 Cartrdige range

General Purposes

Ref. T245-A





Blue Grip

Ref. T245-PA

It has a blue grip to quickly distinguish it form other handles.





Non-slip Grip

Ref. T245-B





Soft Grip and Thermal Insulation

Ref. T245-C

For intensive jobs requiring high thermal power.



T245 Changing Cartridges

Save time and change cartridges safely without switching the station off.

1. Removing



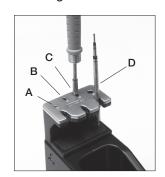
Place the handle in the extractor and pull to remove the cartridge.

2. Inserting



Place the handle on top of the new cartridge and press down slightly.

3. Fixing



Use the holes for fixing the cartridge* as follows:

- A. For straight C210.
- B. For curved C210.
- C. For curved C245.
- D. For straight C245.

*Important

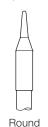
It is essential to insert the cartridges as far as the mark for a proper connection.



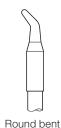
Compatible cartridges

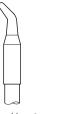
The T245 handle works with C245 cartridges. Find the model that best suits your soldering needs

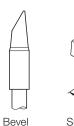
in www.jbctools.com

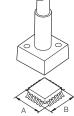












Special models



DR560 Changing Tips

This operation should be done while the tip is hot, not below 250°C, so that any tin left inside is in molten state.

1. Removing

Unscrew the tip using the spanner supplied.

2. Inserting

Fit the new tip and tighten with the spanner to make sure it is air tight.



Compatible Tips

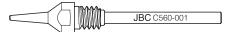
The DR560 works with C560 tips.

Find the model that best suits your soldering needs in www.jbctools.com

Here are some C560 tips in real size (in mm):



C560-001 ØA=1,4 ØB=0,6 Ømax. pin=0,4



C560-014 ØA=2,5 ØB=0,8 Ømax. pin=0,6



C560-004 ØA=3,2 ØB=1,3 Ømax. pin=1,1



C560-002 ØA=1,8 ØB=0,8 Ømax. pin=0,6



C560-003 ØA=2,7 ØB=1 Ømax. pin=0,8



C560-009 ØA=5 ØB=1,3 Ømax. pin=1,1



DR560 Changing the Heating Element

To perform this operation, turn off the station or disconnect the tool.

1. Loosening

The deposit lid needs to be loosened.

2. Removing

Loosen the screw as shown and remove the Heating Element.



3. Placing

Place the new Heating Element and follow the steps conversely.



Important

For a proper connection it is essential to insert the cartridge by lining it up to the mark > .





DR560 Tin Deposit Cleaning

1. Removing the lid



The lid must be removed with the DR560 in vertical position.

2. Cleaning



Remove the coil to clean the inside of the deposit with the stick supplied.



The filter and internal joint must be checked and replaced if dirty or damaged.

3. Inserting the deposit

The deposit must be inserted with coil filter in place, positioned between the 2 lines marked on the tin deposit. Then the whole unit must be closed by screwing the lid.



DR560 Tip Care

The intake tube should be periodically cleaned by the largest rod.





Important

DO NOT press the vacuum pump button while tinning the desoldering tip, as the fumes given off by the flux would quickly block the ducts and the air filter.

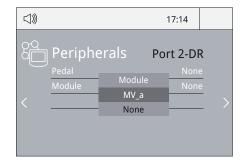
MVE Initial Setup



After connecting the module, enter the **Peripherals** Menu and select the station port which you want to join with it.

Peripherals

- **1.** Select the module from the list of peripheral connections. Remember your first connection is denoted as "a", the second being "b", etc. (e.g. MV_a, MV_b,...)
- 2. Press Menu or Back to save changes.
 Once set up, you can change the module settings by entering the **Peripherals**Menu.



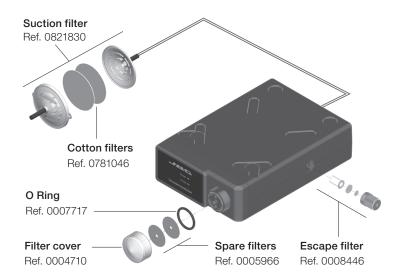


MVE Changing the pump filters

- Keep the casing clean by using a damp cloth. Periodically check all cable and tube connections.
- Keep filters clean to ensure proper solder suction and replace them when necessary.

Important

Do not use sharp pointed objects to open the suction filter.



Desoldering process with DR560 & MVE

Use a tip with a larger diameter than the pad to achieve maximum aspiration and thermal efficiency.

1. Placing



Place the tip on the component terminal.

2. Rotating



When the solder liquefies, gently rotate the tip so that the component can be lifted off.

3. Aspirating



Press the vacuum pump button long enough to remove the solder.

After pressing the desoldering key there is a slight delay until the self-contained vacuum pump stops. This makes sure that the vacuum circuit is completely empty.

If any solder remains are left on a terminal after desoldering it, resolder it with fresh solder and repeat the desoldering operation.



Operation with DDE Control Unit

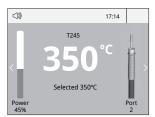
The JBC Exclusive Heating System

Our revolutionary technology is able to recover tip temperature extremely quickly. It means the user can work at a lower temperature and improve the quality of soldering. The tip temperature is further reduced thanks to the Sleep and Hibernation modes which increase the tip life by 5.

1. Work



When the tool is lifted from the stand the tip will heat up to the selected temperature.



Tools Menu:

- · Set temperature limits
- · Select temperature levels

2. Sleep



When the tool is in the stand, the temperature falls to 180°C / 360°F (preset sleep temperature).



Tools Menu:

- · Set Sleep temperature
- · Set Sleep delay (from 0 to 9 min or no Sleep)

3. Hibernation



After longer periods of inactivity (pre-set to 30 min.), the power is cut off and the tool cools down to room temperature.

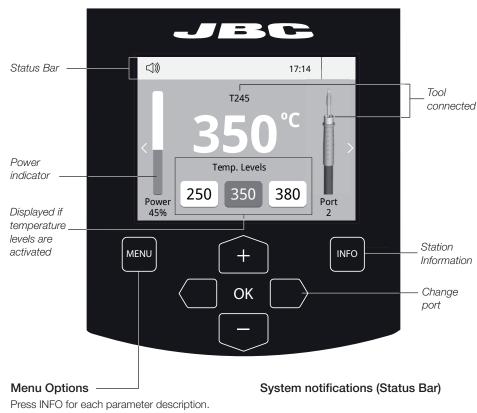


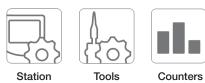
Tools Menu:

· Set Hibernation delay (from 0 to 60 min or no hibernation)

Work Screen

The DDE-A offers an **intuitive user interface** which provides **quick access** to station parameters.





Reset

Peripherals Graphics

USB flash drive is connected.

Station is controlled by a PC.

Station is controlled by a robot.

Station software update.
Press INFO to start the process.

Warning.
Press INFO for failure description.

Error. Press INFO for failure description, the type of error and how to proceed.

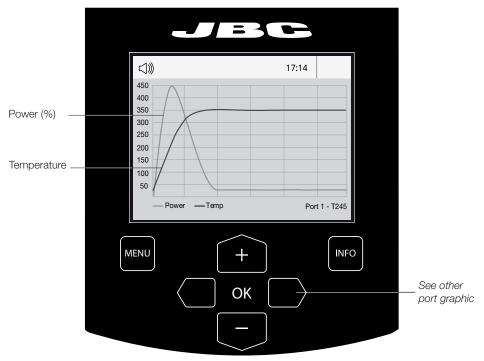


Process analysis



By pressing **Graphics** in the main MENU, temperature and power figures in real time are displayed for each port. This helps you decide which tip to use to obtain the best quality solder joints.

Graphics



Export graphics

Insert a USB flash drive into the USB-A connector to start saving your soldering process in csv format.



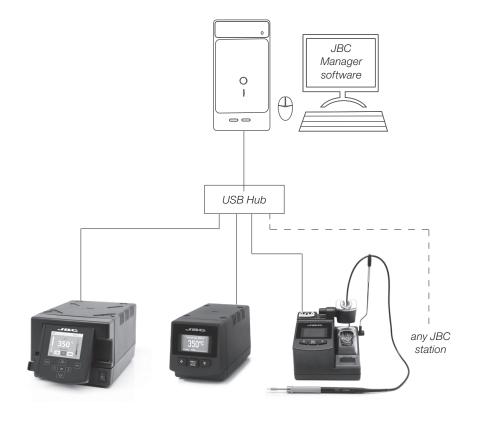
Soldering Net

Remotely manage and monitor as many stations as your Windows PC can handle.

- 1. Download the JBC Manager software and the user manual from www.jbctools.com/manager.html
- 2. Connect the stations via USB-B connector and the PC will automatically detect them.
- **3.** The notification will be displayed on the station.

Functions:

- Set all the station parameters from your PC.
- Organize groups of stations and set all their parameters at the same time.
- Store specific configurations for later uses.
- Analyze the soldering graphics of the stations on your PC and export them.

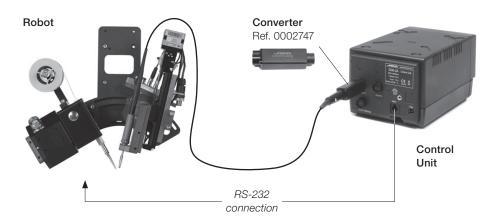




Working with Robots

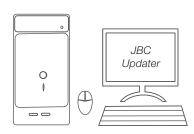
Manage and monitor the station using a Robotic system.

- 1. Connect the tool to the station port by means of the Converter.
- Connect your Robot system to the Robot connector (RJ12) of the station. DB9-RJ12 Adapater available only if necessary (Ref: 0013772).
- 3. Enable the Robot option in the station settings and the notification will be displayed: Ω
- Set your Robot's commands according to the Robot Communication Protocol, available on the website www.jbctools.com/jbcsoftware-menu-115.html.



Update the station software

1. Download the JBC Updater software from www.jbctools.com/software.html and save it on a USB flash drive. Preferably one with no other files.



2. Insert the USB flash drive.

The icon is diplayed while updating.



Maintenance

Before carrying out maintenance or storage, always allow the equipment to cool.

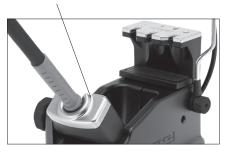
- Clean the station screen with a glass cleaner or a damp cloth.
- Use a damp cloth to clean the casing and the tool. Alcohol can only be used to clean the metal parts.
- Periodically check that the metal parts of the tool and stand are clean so that the station can detect the tool status.
- Maintain tip surface clean and tinned prior to storage in order to avoid tip oxidation.
 Rusty and dirty surfaces reduce heat transfer to the solder joint.
- Periodically check all cables and tubes.
- Replace a blown fuse as follows:



1. Pull off the fuse holder and remove the fuse. If necessary use a tool to lever it off.



Clean periodically





- **2.** Press the new fuse into the fuse holder and replace it in the station.
- Replace any defective or damaged pieces. Use original JBC spare parts only.
- Repairs should only be performed by a JBC authorized technical service.



Safety



It is imperative to follow safety guidelines to prevent electric shock, injury, fire or explosion.

- Do not use the units for any purpose other than soldering or rework. Incorrect use may cause fire.
- The power cord must be plugged into approved bases. Be sure that it is properly grounded before use. When unplugging it, hold the plug, not the wire.
- Do not work on electrically live parts.
- The tool should be placed in the stand when not in use in order to activate the sleep mode. The soldering tip, the metal part of the tool and the stand may still be hot even when the station is turned off. Handle with care, including when adjusting the stand position.
- Do not leave the appliance unattended when it is on.
- Do not cover the ventilation grills. Heat can cause inflamable products to ignite.
- Use a "non residue" classified flux and avoid contact with skin or eyes to prevent irritation.
- Be careful with the fumes produced when soldering.
- Keep your workplace clean and tidy. Wear appropriate protective glasses and gloves when working to avoid personal harm.
- Utmost care must be taken with liquid tin waste which can cause burns.
- This appliance can be used by children over the age of eight and also persons with reduced physical, sensory or mental capabilities or lack of experience provided that they have been given adequate supervision or instruction concerning use of the appliance and understand the hazards involved. Children must not play with the appliance.
- Maintenance must not be carried out by children unless supervised.

Specifications

Complete Rework station with Pneumatic Pump

RMVE-1A / RMVE-2A / RMVE-9A

- Total weight: 16.6 kg (36.6 lb)

- Ambient Operating Temperature: 10 to 40°C (50 to 104°F)

JT-1B 120V 50/60Hz. Input fuse 8A **JT-2B** 230V 50/60Hz. Input fuse 4A **JT-9B** 100V 50/60Hz. Input fuse 8A

Weight: 5.7 kg (12.6 lb)Dimensions: 148 x 184 x 140Output Peak Power: 1000W

- Temperature range: Room temperature / 150°C to 450°C (300°F to 840°F) Cool mode: T Off. Used to blow air at room temperature.

- Air flow regulation: 6-45 SLPM - Vacuum: 30% / 228 mmHg / 9 inHg

Vacuum: 30% / 228 mmHg / 9 INHg
 USB interface station-PC

- P-005 Pedal connection

- P-005 Pedal connection

DDE-1A 120V 50/60Hz. Input fuse: 4A. Output: 23.5V DDE-2A 230V 50/60Hz. Input fuse: 2A. Output: 23.5V DDE-9A 100V 50/60Hz. Input fuse: 5A. Output: 23.5V

- Weight: 4.3 Kg (9.3 lb)

- Dimensions: 148 x 120 x 232 mm

- Output Peak Power: 150W per tool

- Temperature Range: 90-450°C (190-840 °F)

- Idle Temp. Stability (still air) ± 1.5 °C (± 3 °F)

- Tip to ground resistance: <2 ohms

- Tip to ground voltage: <2mV RMS

- USB-A / USB-B / Peripherals connectors

- RJ12 connector for Robot

MVE-A

- Weight: 0.9 Kg (1.9 lb)

- Dimensions: 145 x 55 x 225 mm

- Air Pressure supply range: 4-6 Bar

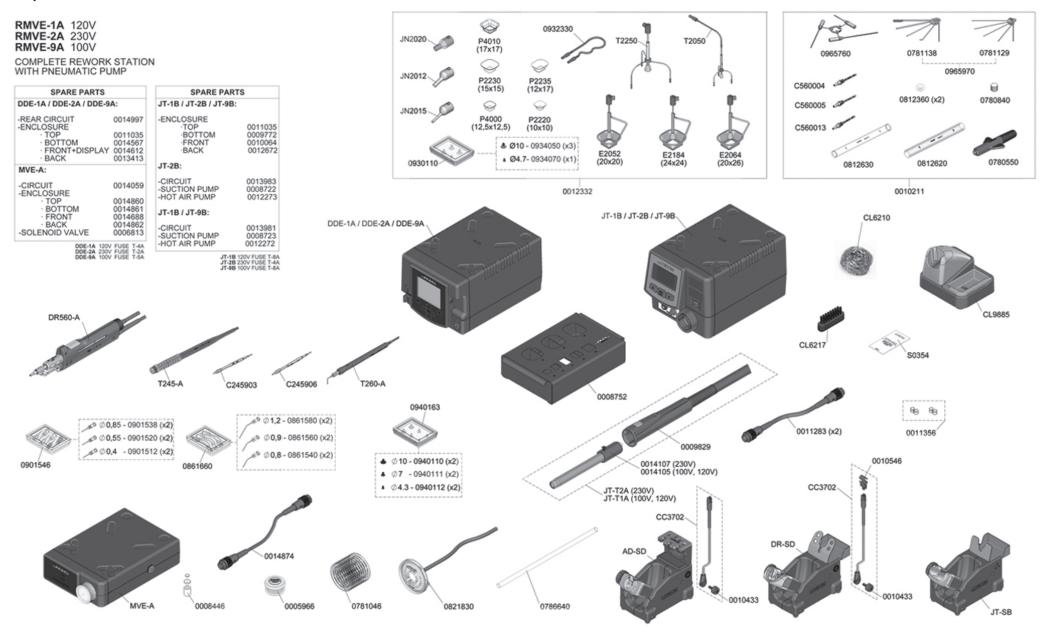
- Vacuum at 6 Bar: 90% / 680 mmHg / 26.8 inHg

- Flow rate: 15 SLPM

Complies with CE standards
ESD protected housing "skin effect"



Exploded View





Warranty

JBC's 2 year warranty covers this equipment against all manufacturing defects, including the replacement of defective parts and labour. Warranty does not cover product wear due to use or mis-use.

In order for the warranty to be valid, equipment must be returned, postage paid, to the dealer where it was purchased.



This product should not be thrown in the garbage.

In accordance with the European directive 2002/96/EC, electronic equipment at the end of their life must be collected and returned to an authorized recycling facility.