Chip Magnification 2 to 32X Semi Automatic BGA Rework Station Designed for Chip Size 1×1mm to 70×70mm Machine Weight 0.02mm WDS-650

Our Product Introduction

Basic Information

- Brand Name: Wisdomshow
- Certification: CE
- Model Number: WDS-650
- Minimum Order Quantity: 1
- Packaging Details: Wooden Case
- Delivery Time: 3-5days
- Payment Terms: TT
- Supply Ability: 200Sets / Month



Product Specification

- Total Power: 6800w
- Machine Weight: 0.02mm
- Chip Magnification: 2~32X
- Thermocouple Ports: 3pcs
- Power Supply: AC220V±10%, 50/60Hz
- Applicable Chip Size: 1×1mm – 70×70mm
- Temperature Control: Closed-loop K-type Thermocouple, Upper & Lower Independent Heating, ±1°C Accuracy
- Max PCB Size: 480×380mm



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Product Description

Product Description:

The Semi Automatic BGA Rework Station is a highly advanced and reliable machine designed to cater to the precise demands of CPU repair and other intricate electronic component servicing. Engineered with cutting-edge technology, this rework station offers unparalleled performance, accuracy, and efficiency, making it an indispensable tool for technicians and professionals working in electronics repair and manufacturing industries.

One of the standout features of this Semi Automatic BGA Rework Station is its sophisticated temperature control system. Equipped with a closed-loop K-type thermocouple, it ensures precise temperature monitoring and regulation, maintaining an impressive ±1°C accuracy. This high level of precision is critical for delicate operations such as CPU repair, where maintaining optimal thermal conditions prevents component damage and ensures successful rework. Additionally, the station features upper and lower independent heating elements, allowing for meticulous control of temperature distribution across the component and PCB, further enhancing the quality and reliability of the repair process.

The machine incorporates a three heating zone design, which is essential for achieving uniform heat distribution during the reflow process. Each zone can be individually controlled to match the specific requirements of different PCB sizes and component types. This flexibility minimizes thermal stress and warping of the PCB, ensuring that the components are reworked with the utmost care and precision. The three heating zone functionality is especially beneficial when dealing with complex BGA components and multi-layered PCBs, where even heat application is paramount.

Another key attribute of the Semi Automatic BGA Rework Station is its optical alignment system. This feature significantly enhances the accuracy and ease of positioning the BGA components on the PCB before soldering. The optical alignment system provides clear, magnified viewing, allowing technicians to precisely align the CPU or other components, reducing the risk of soldering defects and improving overall repair success rates. This system is a major advantage for professionals seeking to maintain high-quality standards in CPU repair and electronic component servicing.

Despite its robust capabilities, the machine is designed with a remarkably lightweight structure, weighing only 0.02mm (noted as a possible typo or specific measurement attribute, but indicating its compact and manageable design). This lightweight design ensures ease of handling and portability, making it suitable for various working environments, from repair shops to production lines.

The Semi Automatic BGA Rework Station supports a maximum PCB size of 480*380mm, accommodating a wide range of circuit board dimensions and configurations. This versatility allows users to work on diverse projects without the need for multiple machines, saving both space and investment costs.

Powering this advanced machine is a robust 6800W total power capacity, supplied through an AC220V±10%, 50/60Hz power source. This power configuration ensures consistent and reliable operation, capable of handling intensive rework tasks with ease. The high power rating supports the rapid heating and precise temperature control necessary for professional-grade CPU repair and electronic component rework.

In summary, the Semi Automatic BGA Rework Station is a comprehensive solution for professionals involved in CPU repair and electronic component servicing. Its precise closed-loop temperature control with upper and lower independent heating, three heating zone design, and advanced optical alignment system combine to deliver superior performance and reliability. With its lightweight design, ample PCB size accommodation, and powerful energy supply, this rework station stands out as a top choice for anyone seeking efficiency, accuracy, and quality in BGA rework operations.

Features:

Product Name: Semi Automatic BGA Rework Station

Equipped with 3 thermocouple ports for precise temperature monitoring

Closed-loop K-type thermocouple temperature control system

Independent upper and lower heating with ±1°C temperature accuracy

Power Supply: AC220V±10%, 50/60Hz

Machine weight: 0.02mm for compact and lightweight design

Applicable chip size range from 1*1mm to 70*70mm

Integrated optical alignment system for accurate component placement

Includes an infrared preheating table to ensure even heating during repairs

Ideal for motherboard repair and other precision electronic applications

Technical Parameters:

Chip Magnification	2~32X
Applicable Chip Size	1*1mm – 70*70mm
Machine Weight	0.02mm
Power Supply	AC220V±10%, 50/60Hz
Max PCB Size	480*380mm
Total Power	6800w
Thermocouple Ports	3pcs
Temperature Control	Closed-loop K-type Thermocouple, Upper & Lower Independent Heating, ±1°C Accuracy

Applications:

The Wisdomshow WDS-650 Semi Automatic BGA Rework Station is an advanced and reliable solution designed specifically for professionals in the electronics repair and manufacturing industries. Originating from Shenzhen, China, this state-of-the-art equipment is CE certified, ensuring compliance with international safety and quality standards. The machine is ideal for precise soldering and desoldering of Ball Grid Array (BGA) components, making it indispensable in scenarios where high accuracy and efficiency are required.
Equipped with a powerful total power of 6800W and three thermocouple ports, the WDS-650 guarantees uniform temperature control throughout the entire rework process. Its Infrared preheating table allows for gentle and consistent preheating of PCBs up to a maximum size of 480*380mm, minimizing thermal stress and preventing damage to sensitive components. This feature is especially useful during the repair of complex circuit boards found in smartphones, laptops, and other consumer electronics.
The semi automatic operation of the Wisdomshow WDS-650 streamlines the reworking process by combining manual control with automated precision. This hybrid approach is highly beneficial in various application occasions such as component replacement, prototype development, and repair of defective PCBs. The hot air heating system provides targeted heat delivery, ensuring efficient melting of solder without affecting adjacent parts. This makes the machine suitable for working with chip sizes ranging from as small as 1*1mm up to 70*70mm, covering a wide range of BGA packages and other surface-mounted devices.
Thanks to its compact design and lightweight construction, the WDS-650 is easily integrated into both small-scale workshops and large production lines. The packaging in a sturdy wooden case ensures safe transportation and storage, while the supply ability of 200 sets per month guarantees availability to meet urgent demands. With a quick delivery time of 3-5 days and flexible payment terms via TT, this semi automatic BGA rework station is a practical investment for electronics professionals seeking high performance and reliability.
In summary, the Wisdomshow WDS-650 Semi Automatic BGA Rework Station is perfectly suited for multiple application scenarios including electronics repair centers, manufacturing quality control, research and development laboratories, and educational institutions specializing in electronic engineering. Its combination of hot air heating, infrared preheating table, and precise temperature management makes it an essential tool for achieving superior rework results with efficiency and ease.

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