

BeaverLAB Intelligent Microscope MX

DDL—MX Instruction Manual

Please read this user manual carefully! Better reading experience!

Please keep the manual properly!

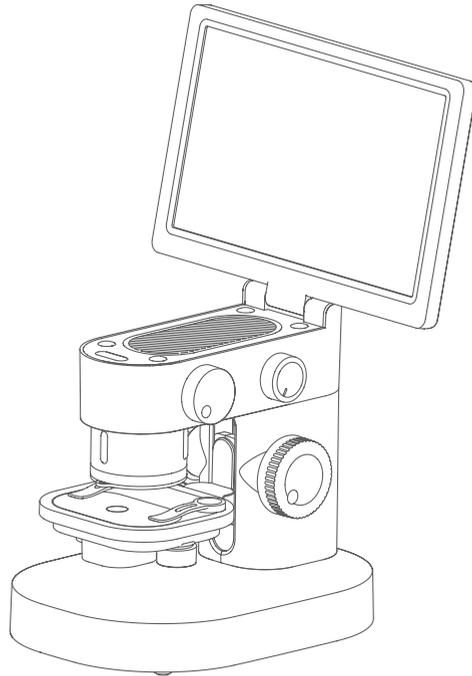


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Overall Parameters Of Microscope	

1 Product Overview

- Thank you for purchasing BeaverLAB intelligent microscope, hereinafter referred to as microscope.
- Please read this manual carefully and keep it properly before use. Do not use the microscope without any instructions.

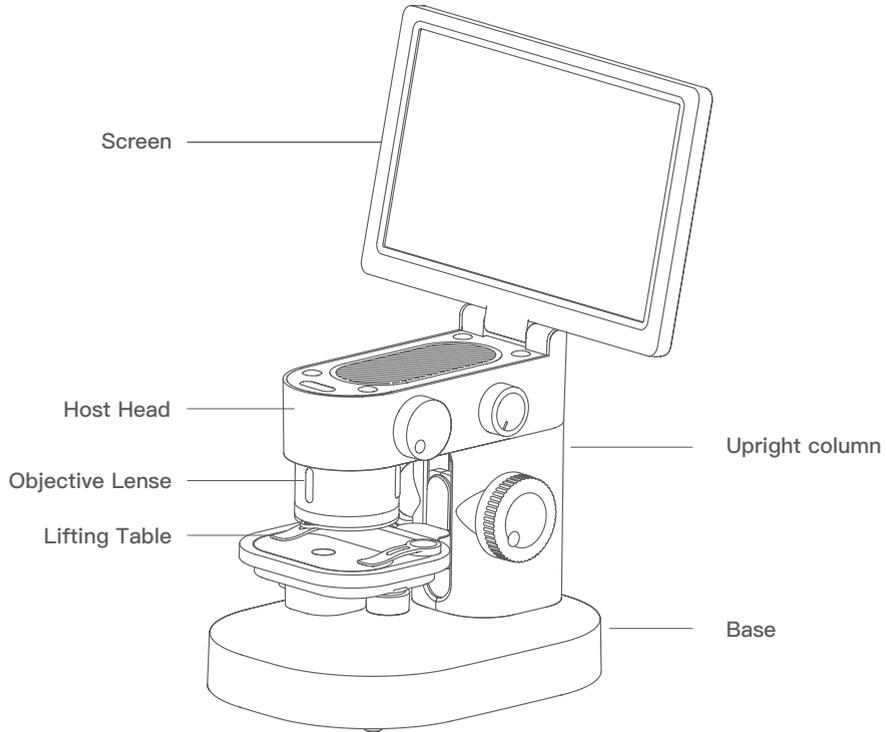


2 Instructions For Use

- Please read this manual carefully and use it correctly.
- Pay attention to protect the lens. Be sure to close the lens cover after using, avoid entering dust or foreign matters.
- Pay attention to protect the display screen. Please close the screen after using, avoid damaging the display screen.
- The observation table of this microscope is a lifting table. Please keep the table clean and do not press it heavily.
- When placing specimens or other observation objects, pay attention to the placement position and place them in the center accurately below the lens as far as possible. Avoid being unable to see objects and bring a bad experience.
- Import of external files is not supported (external files such as videos, pictures, and documents do not support import and reading, which may cause the device to malfunction.)

3 Instructions For Microscope

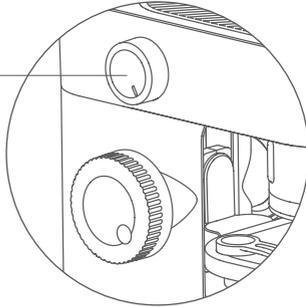
Microscope Composition



Knob Function Description

Objective Lens Lighting Adjusting Knob

Turn it on clockwise & increase the brightness
Turn the brightness down & off counterclockwise



Objective Lens Switching Knob

100x / 600X / 1200X switch by rotation

Platform Move Back And Forth Button

Rotate counterclockwise to move the left platform backward
Rotate the platform clockwise and move it forward

Platform Bottom Light Adjustment Knob

Turn it on clockwise, turn it up, turn it down counterclockwise, turn it off

Focusing Knob (Fine Adjustment)

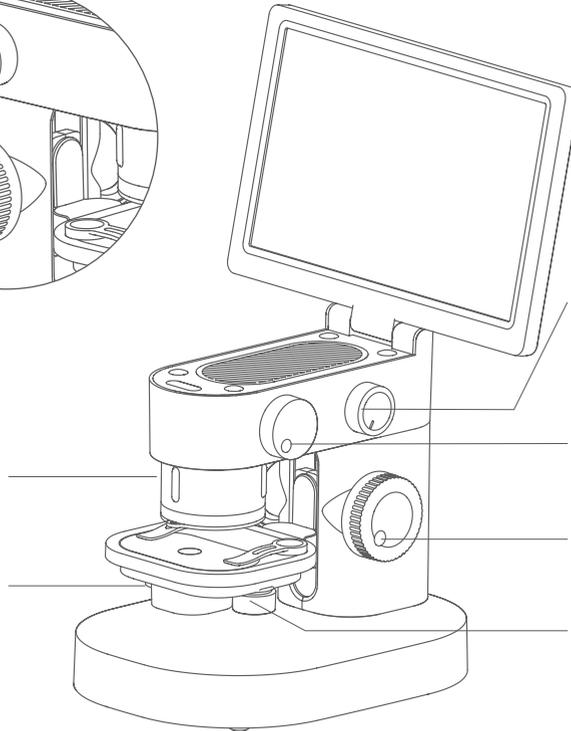
Zoom out clockwise / zoom in counterclockwise

Platform Lifting Adjustment Knob

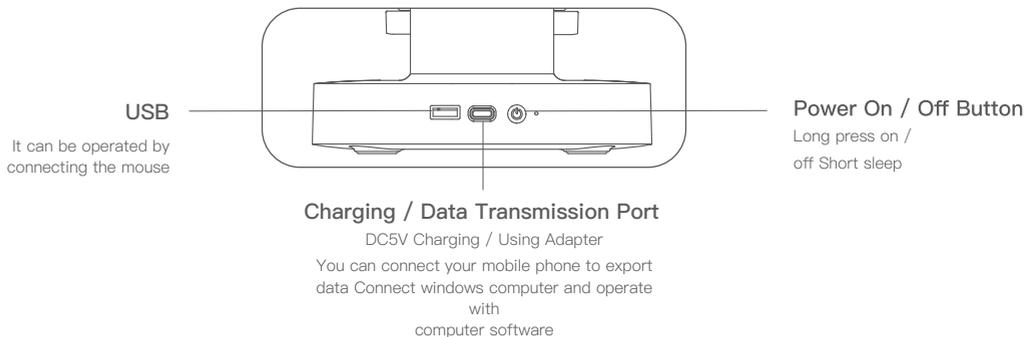
Decrease counterclockwise / increase clockwise

Platform Left And Right Movement Knob

Rotate counterclockwise and move the platform to the left
Rotate the platform clockwise and move it to the right



Interface Usage



Use Environment



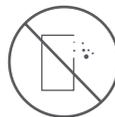
Please use it at -10 °C ~ 45 °C



Please prevent the microscope from getting wet by water, beverages and corrosive lampliquids



Please keep the microscope away from heat source, open fire, flammable and explosive gas (liquid)



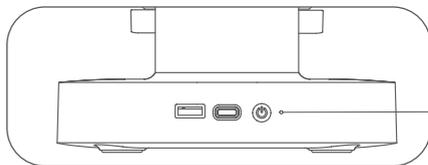
Please avoid dust entering the microscope lens and inside



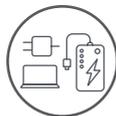
Please avoid the impact and violent vibration of the microscope

- At low temperature, the available capacity of the battery will decay to varying degrees.
- In case of any abnormality, please contact the after-sales department for maintenance. Disassembling the microscope without permission will not enjoy the warranty policy and may lead to irreparable damage.

Charging Instructions



The red light is always on during charging and the green light is always on after charging



Can use daily mobile phone charger, computer The power bank charges the microscope.



Do not charge for more than 12 hours, Avoid affecting the service life of the battery.

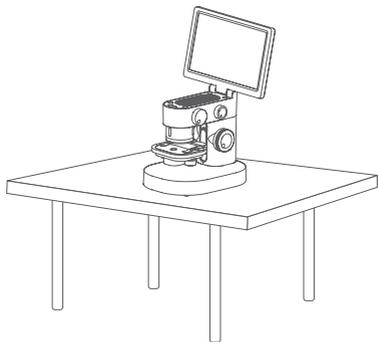
- During charging, if the microscope shell and battery have slight heating, it is normal. Please rest assured to use it

Storage Environment

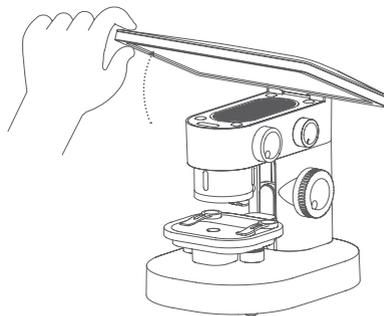
- Store in a cool and dry place for daily use and avoid direct sunlight.
- Avoid storing the microscope in a place where there is a risk of falling, which may cause lens deviation inside the microscope or damage to other components, as well as other irreparable defects damage problem.

4 Instructions for using the microscope

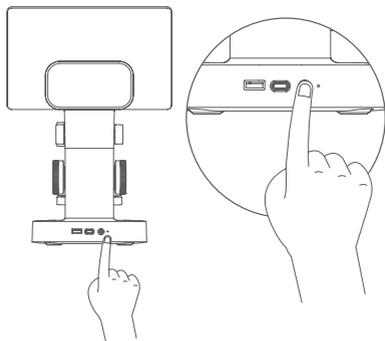
1. Place Stably



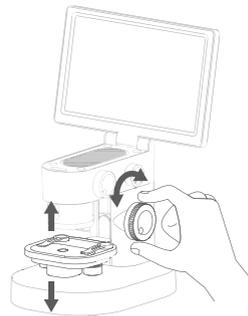
2. Open the screen



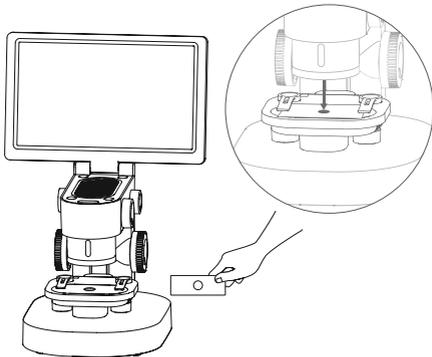
3. Press the on / off button for a long time to start the machine



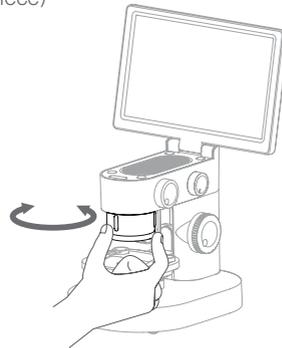
4. Move the platform to a suitable



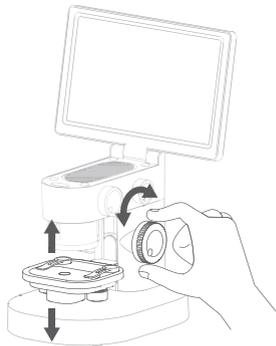
5. Remove the lens cover and put in the observation items (note that the specimen should be facing the eyepiece)



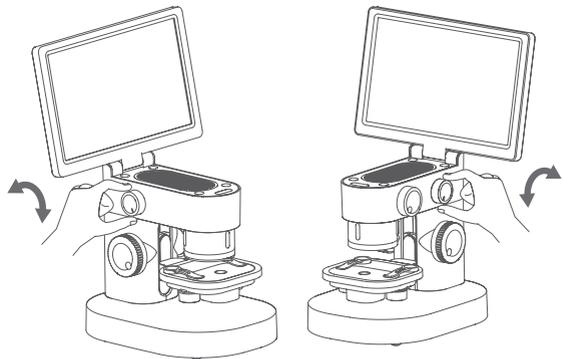
6. Select the multiple to be observed (note that the specimen should be facing the eyepiece)



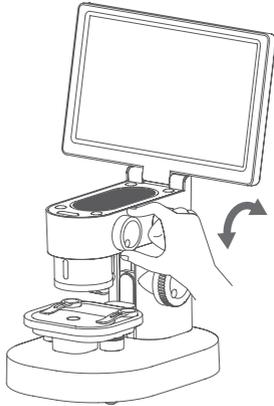
7. Raise the platform to a suitable height



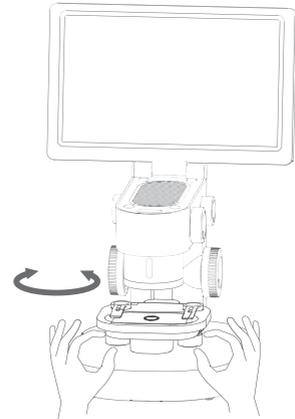
8. Adjust the intensity of bottom lighting and top lighting



9. Focus through the focusing knob and observe the display screen to a clear position

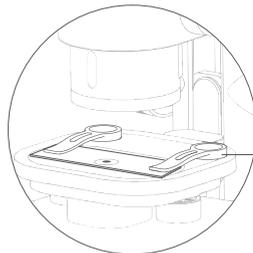


10. The observation position can be moved by adjusting the moving knob under the platform



The Pithy Formula For Microscope Use: large multiples should be close and small multiples should be far away. Coarse adjustment depends on lifting and fine adjustment depends on knob (coarse adjustment can be fine adjusted after seeing the observation object)

Use Of Specimen Holder



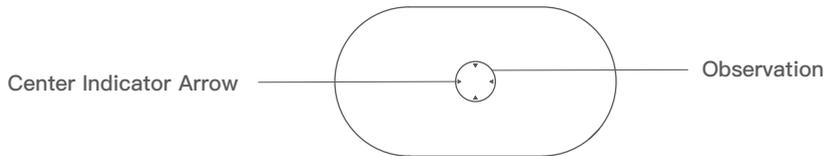
Specimen Fixing Clip

Fixed specimen or observation target

Matters Needing Attention:

- The fixing clip adopts magnetic suction type, which can be absorbed in place as long as it is installed close to the base.
- The adsorption positions at the bottom and base of the specimen fixing clip shall be cleaned regularly to avoid adsorption of other metal substances.

Use Of Observation Panel



Matters Needing Attention:

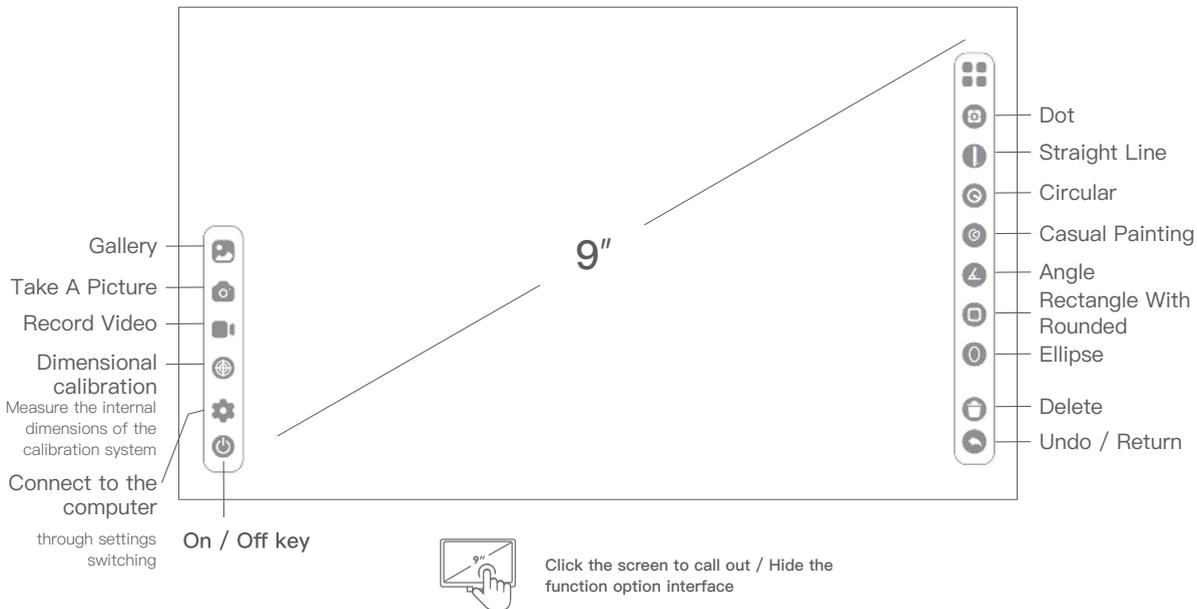
The observation panel shall be wiped regularly to avoid oil stain or other stains affecting the observation experience.

Description of light adjustment function of observation window

If the light becomes stronger and weaker, the outline and details of the specimen will have different effects. Please pay attention to the adjustment and use.

5. Interface User Guide

Software interface function introduction:



Gallery

Observe, browse and edit the photographed Pictures and videos.



Take A Picture

Take pictures of the currently observed objects.



Record Video

Take a video of the currently observed object



Dimensional calibration

Measure the internal dimensions of the calibration system



Set Up

Language: Chinese / English
Time :time/ date Sleep: never / 3 min / 5 min / 10 min / 15 min
Timed Shutdown: never / 5 min/ 10 min / 30 min / 1 hour
Memory Card Switching: in / out
Camera Switching: in / out
Color Selection: blue, green, red, yellow, purple



Shut Down

Turn off the device



Grid

locate the center point of the image



Straight Line

Measure the length of the observation object



Circular

Measure the S (area) of the selected range C (perimeter),D (diameter)



Casual Painting

Tagging



Angle

Measure the angle of the observation object



Rectangle with rounded corners

Measure s (area) c (perimeter) of the selected range



Ellipse

Measure s (area) and d(diameter) of the selected range



Delete

Delete all dimensions on the interface



Undo / Return

Undo the previous action

6 Function Description Of External Equipment

一、Connect To Mobile Phone

Purpose:

Read the pictures in the microscope memory with the mobile phone or copy them to the mobile phone.

Operation method:

- ① Plug the data cable into the DC5V charging port of MX microscope, plug the adapter into the mobile phone end, and connect the data cable with the adapter.
- ② Open the MX microscope and click: Setting → Memory card switching → Cut out in sequence. At this time, the screen will darken.



③ Open the mobile phone → File manager. At this time, you can see a USB storage device. After opening, you can see all the pictures in the memory of MX microscope.

二、Computer Device Connection

Visit www.dangdangli.com Download and install the software installation package

Purpose:

Directly connect to the computer, use the computer software to observe and operate, and the screen is larger.

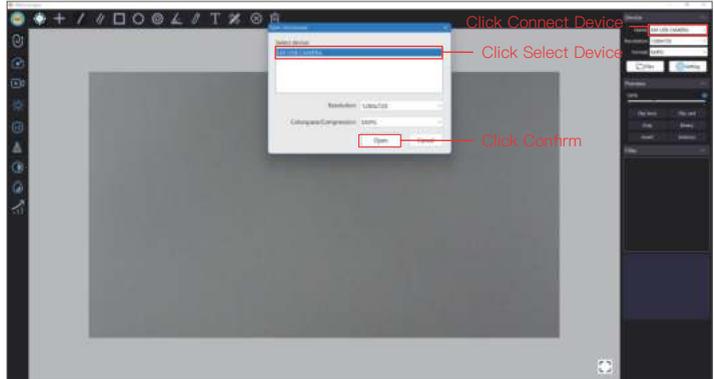
Operation Method:

- ① Plug the data cable into the DC5V charging port of MX microscope, and connect one end to the USB interface of computer.
- ② Open BeaverLAB computer software (only windows computers are supported).
- ③ Open the MX microscope and click:

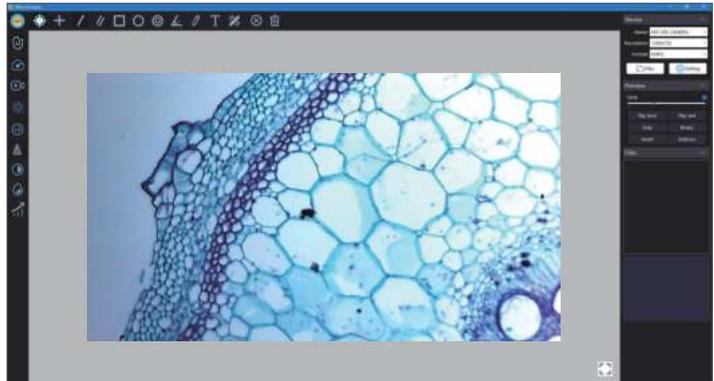
Setting → Camera Switching → Cut Out, and the screen darkens at this time.



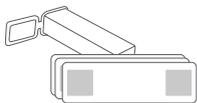
④ In the computer software, click: connect device button
→ select device (select the recognized camera device)
→ open



⑤ At this time, the software on the computer side is directly connected to the camera, so you can use the computer to observe directly.



7 Accessories And Tools



Prepared Slides x10



Adapter



Data Line



Magnetic specimen holder x2

8 Troubleshooting Of Microscope

Problem Phenomenon	Reason	Processing Method
Lifting is not smooth / Unable to lift	During charging, the current is large and the calorific value of the battery is high, which is a normal phenomenon	Normal state
Lifting is not smooth / Unable to lift	Internal lifting gear damaged	Send for repair
The light cannot be adjusted	Dimmer circuit board damaged / Lamp board damaged / Connecting wire open circuit	Send for repair
The device cannot be charged	① The charging interface is not firmly plugged in ② No power connection ③ Equipment failure	①Unplug the interface ②Connect the power ③For repair

The device cannot be used normally	Internal damage of equipment due to water spray, collision and other reasons	Send for repair *Man made damage is not covered by warranty
The device cannot be connected to the computer software	The interface is not plugged tightly, the data line is damaged, and the connecting line with data transmission function is not used	Reseat the interface, replace the data cable, replace the data cable with data transmission function, and then connect it for use
Lens display image blur	The ambient temperature changes sharply, causing the lens to fog	Wait for the temperature to be constant and use it after the fog disappears for a period of time
There are foreign bodies in the specimen and the observation is not clear	The surface of the specimen is dirty, and the panel is dirty	Wipe the surface of the specimen and the surface of the observation panel
The shell is broken and cracked due to falling and impact	Damage caused by external use	Man made damage is not covered by the warranty
The product cannot be turned off or the key fails	Crash	Please reset and restart

9 Trademark And Legal Declaration

“”、“**BeaverLAB**” is a trademark applied for or registered in Chinese Mainland by Beaver Technology Co., Ltd. and is used on this product use. Without the permission of the trademark owner, no person or institution may use the above trademark logo on unapproved goods without authorization. This manual is made and copyrighted by Beaver culture and innovation technology (Shenzhen) Co., Ltd. no organization or individual may copy or distribute all or any part of this manual without permission. Due to the continuous improvement of product functions, design changes and other reasons, this manual may be inconsistent with the products you purchased. Please take the actual products as the standard. Product executive standard: GB 4943.1-2011 GB / T 9254-2008

10 Product Warranty Description

1.Warranty Period

- ① Within 7 days from the day after you sign for it, if the product has any performance failure listed in the performance failure table of BeaverLAB intelligent microscope products, you can enjoy the return or replacement service free of charge after being tested and determined by BeaverLAB after-sales service center;
- ② Within 8–15 days from the next day after you sign for it, if this product has any performance failure listed in the performance failure table of BeaverLAB intelligent microscope products, it can enjoy the replacement or maintenance service free of charge after being tested and determined by BeaverLAB after-sales service center;
- ③ Within 6 months from the day after you sign for it, this product has the performance faults listed in the performance fault table of BeaverLAB intelligent microscope products. After being tested and determined by BeaverLAB after-sales service center, you can enjoy the maintenance service free of charge.

Friendly Tip: because the packing box needs to be used during transportation to ensure the safety of product transportation, it is recommended that you keep the packing box for at least 30 days from the date of signing.

2.Warranty Content

The host is guaranteed for 6 months.

3.Non Warranty Regulations

- ① Unauthorized maintenance, misuse, collision, negligence, abuse, liquid inlet, accident, modification and other incorrect use methods, or tearing, altering labels and anti-counterfeiting marks;

- ② The warranty period has expired;
- ③ Damage caused by force majeure;
- ④ It does not comply with the performance faults listed in the performance fault table of BeaverLAB intelligent microscope products;
- ⑤ Due to human factors, this product and its accessories have the performance faults listed in the performance fault table of BeaverLAB intelligent microscope products.

Overall Parameters Of Microscope

Product Brand:	BeaverLAB
Product Name: Beav	BeaverLAB Smart Microscope MX
Product Model:	DDL-MX
Product Color:	Gray/ White/ Yellow
Battery Capacity:	3500mAh
Texture Of Material:	ABS+PC

Intelligent Microscope MX

Product Name: Intelligent microscope MX

Product Model: DDL-MX

Product Size: 214x224x324mm

Input Voltage: DC5V \pm 1A

Battery Capacity: 3500mAh

Display Size: 9 inches

Brand Name: BeaverLAB

Executive Standard: CE FCC

Brand Company: Beaver Technology (Shenzhen) Co., Ltd.

Service Mailbox: support@beaverlabtech.com

Please refer to BeaverLAB official website for more information of this product: www.beaverlabtech.com / www.dangdangli.com