Love of life begins with "Rcom"

REM EROODER GUNIT

Ver. 3.3

DIGITAL BROODER&ICU USER'S MANUAL

MX-BS500, MX-BS500(N) / MX-BL500, MX-BL500(N) MX-BS600N / MX-BL600N

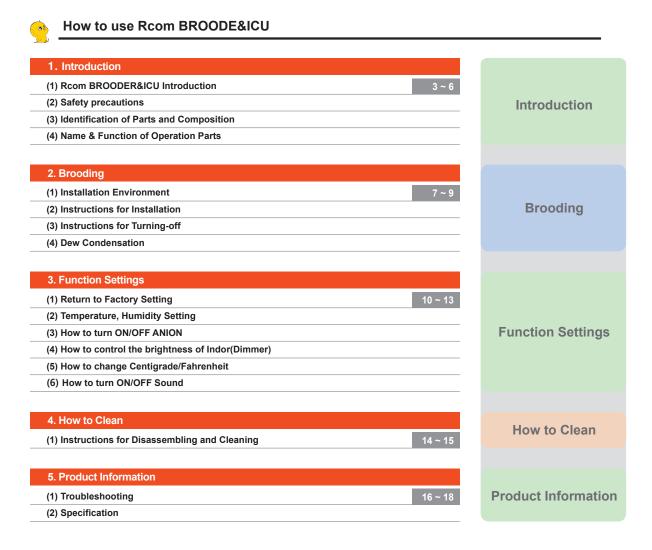




Newborn & frail animals or exotic Birds Rcom ICU User Manual

Contents

BROODER.ICU



The manufacturer, or the vendor does not take responsibility for any loss of animal life or property damage caused by user's carelessness, remodelling/painting, changing purpose of use, outage, and etc. In order to avoid malfunctions, please use after carefully reading the user's manual.



2

1. Introduction

(1) Rcom BROODER&ICU Introduction

Rcom BROODER&ICU

To begin with, we sincerely thank you for purchasing Rcom's product.

Rcom BROODER&ICU was developed with optimal design to create the best environment by the interpretation of air flow channel inside brooder using computer simulation and it applies the latest technology in order to automatically control the brooding environment. Rcom BROODER&ICU is designed to enable optimal setting for all environments required for brooding. For successful brooding and proper use of Rcom BROODER&ICU, please read the instruction manual carefully before using.

Features of Rcom BROODER&ICU

[Main Function]

- * Innovatively improve stability and durability with centralized heating system applying PTC memory element from carbon filmed heating system.
- * Built in Antibiotic Filter/Deodorizing filter for outside air.
- * Built in Anion activation function
- * Water pump included for humidification
- * Reduce up to 40% of electric power consumption compare with the existing products



ANION: The reason why we feel refreshing when we are in woods or mountain is that there are much anion, the atom element with electric charge. If we get anion, it increase the vitality by accelerating metabolism of cell. And, it cleans our blood and helps recovering from fatigue, heavy sleep, and improvement of appetite.

[Easy Function]

- * Automatic Temp/Humidity control and setting.
- * Recessed brooding tray for easy cleaning
- * 10 stage dimmer device for indoor illumination control
- * Rotary Door
- * PTC heated humidification system kills germ.
- * Reduce of fan noise inside of brooders and provide better pleasant environment. (69dB)

[Safety Function]

- * Nebuilizer device and Oxygen tank are available to use for Brooder (500(N) model only)
- * BLDC fan for optimum control of inner conditions
- * Elegant outer design and optimum inner space distribution
- * Alarm function in case of abnormal temperature.
- * It is possible to stack machine which enable to provide space efficiency (Brooder standing- option)

1. Introduction

(2) Safety Precautions

BROODER.ICU

Electrical hazards

ACAUTION Be careful the details below when you use.



Do not use a damaged power cord or loose outlet.

Risk of electric shock or fire.



Do not pull the cord when taking out the power cord, and outlet during the incubation keep wet hands away from connecting plug.

▶ Risk of electric shock or fire



Never pull the plug out of the

Incubation will be interrupted



Do not twist or crush electric cord.

Risk of electric shock or fire.



connecting plugs in an outlet.

Risk of fire or electrical

Setting Cautions

ACAUTION Be careful the details below when you use.



Do not use for man



for a long time with the door closed.

▶ Death hazard



Do not install in dusty or dirty environment.

Risk of damage or fire within the machine



Do not install under the direct sunlight.

Risk of fire or interference with the incubation process



Do not install in moist or humid environment.

▶ Risk of fire or electric shock



Do not install in excessively cold or hot conditions. cigarette smoke, etc.

▶ Risk of interference with



Install away from heat sources.

Risk of damage to the interference with operation.



Ensure that the machine is installed on a stable surface away from edges.

▶ Risk of damage to machine and eggs and user from accidental knocks or drops



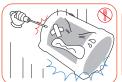
Do not turn the machine upside down.

▶ Water will pour out of the machine, and view window can be dropped or damaged.



Do not install where children or other people can touch with easy.

or accidental interference with the controls.



Do not disassemble or modify the machine in any way.



Please ensure that no small objects get into the holes on the machine.

Risk of electric shock or fire



If the machine sounds strange or emits smoke contact your service center.



Do not use for high-priced animals.



disconnect from the power supply and please contact to your service center.

Cleaning Cautions

Be sure to disconnect the electric cord from the outlet before cleaning.



products interior and exterior



cloth with a neutral detergent.



Brush away dust on the plug with a dry cloth.



benzene, alcohol, thinner, aromatic, or lubricant, etc.



For special cleaning of inner part per year, contact to the service center.

If you don't clean the inside of incubator for a long time, dust can cause some trouble or a fire.

1. Introduction

(3) Identification of Parts and Composition

Identification of Parts

The Serial NO. is specified below the power connection at the back. (ex:RCM0000000) It is the product serial number.



Basic Components





DIGITAL INCUBATOR

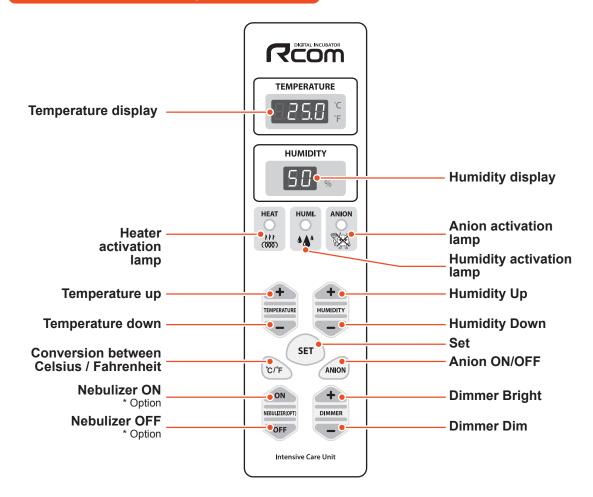
5

1. Introduction

(4) Name & Function of Operation Parts

BROODER.ICU

Name & Function of Operation Parts



Easy Function Operation

Temperature setting	SET HOLD Set temperature to the required figure	How to turn off heater manually	SET HOLD H.OFF (HEATER OFF) Keep pressing Temperature Down button until "H.OFF" comes out.
Humidity setting	HOLD Set humidity to the required figure	How to turn off ventilation fan manually	SET HOLD Keep pressing Temperature Down button until "H.OFF" appears. Then, press once again so that "A.OFF" appears.
Factory setting	POWER SET HOLD POWER N rst	How to turn off humidification device manually	SET U.OFF (HUMIDITY OFF) Keep pressing Humidity Down button until "UOFF" comes out.

6

2. Brooding

(1) Installation Environment (2) Instructions for Installation

Installation Environment

ACAUTION Be careful the details below when you use.

Rcom Brooder is designed and manufactured to provide convenient use to customers through latest digital control technology. However, the following requirements must be followed, otherwise it may have fatal effects on the animal. The inside environment of the Brooder is largely affected by the installation environment and the equipment is recommended to be installed in a place where there are minimal noise and shock. An environment with small temperature difference with the surrounding temperature ranging from 20 to 25°C (68~77°F) and humidity level of 40~60% is recommended. Careful monitoring is required as the temperature can drop rapidly during the night time. The Brooder must not be exposed to direct sunlight.

Instructions for Installation

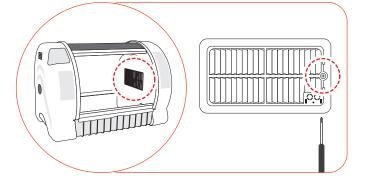


Please operate the equipment sufficiently and check to make sure that the equipment is functioning properly before putting in the animal.

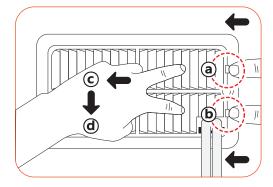
- * The equipment may not be automatically controlled by the environment condition it was set up with if it is not in the outside environment condition of where the product was installed (Temperature: 20~25°C (68~77°F) / Humidity: 40~60%).
- Remove the vinyl cover on the front of the sight class, then take out the tray and slowly remove the vinyl cover on the inside.



▶ Please loosen a screw of right side of filter by using a screwdriver.



▶ Separte cover by bending Picture ⓐ, ⓑ to the left at the same time and using your fingers or a screwdriver, then pulling in the direction of Picture © and pulling to the front of direction in Picture @. At this point do NOT completely remove the silicon hose from the cover, but follow Picture which will allow easier assembly (using tools will help).

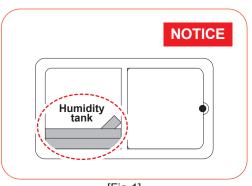


2. Brooding

(2) Instructions for Installation

BROODER.ICU

- Please check end of floate switch [Fig-2] in humidity tank [Fig-1] whether it moves to up and down by using your fingers.
 - When the products are stored long time, the float switch may not work smoothly.
- ▶ After using Brooder, if you don't use Brooder for about one month, please check end of floate switch whether it moves to up and down by using your fingers.

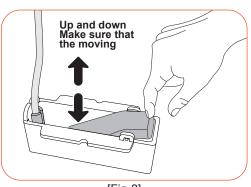






If float switch doesn't work properly, the water may overflow.

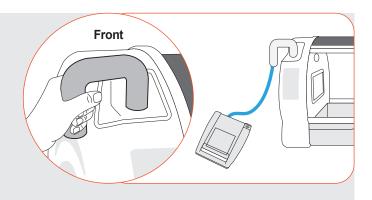
▶ After checking float switch, please assemble a filter like the reverse of disassemble.



[Fig-2]

[Instructions for installing nebulizer]

- Nebulizers are sold separately.
- ▶ Open the water cap in the front left side and connect the silicon pipe.
- Plug the end of the nebulizer hose into the pipe about 100mm deep.
 The function is turned on after connecting the power and pushing the nebulizer ON button.



[Instructions for installing oxygen tank]

- Oxygen tanks are sold separately.
- ▶ Open the water cap in the front left side and connect the silicon pipe.
- Plug the end of the oxygen tank hose into the nebulizer about 100mm deep. After connecting the power, slightly open the oxygen tank valve and push the nebulizer ON button. Even if the oxygen tank hose and the nebulizer hole do not fit, the oxygen will be drawn in if you operate the nebulizer function.



8

2. Brooding

(2) Instructions for Installation

[Instructions for installing build rack]

- Build racks are sold separately. Same models can be stacked on top of each other.
- ▶ It is recommended that you install the product horizontally on a sturdy table with a height of 50cm or higher.
- Remove caps on both sides of the product.
- Plug the build rack into the cap space on both sides.
- Push into the circle indicated on the product until the build rack is properly interlocked and you hear a click sound.

Do not stack more than two levels when installing the build rack as it might collapse. Do NOT install in surroundings where children are present. In case you must, close attention is required.

▶ Stack the product on top of the build rack (2 levels).

Assemble while the product cord is unplugged and do NOT load while the inside is wet.

Open the water cap on the back right side and plug the silicon hose into the nipple as in [Fig-A], then plug the tip into a filled humidifying water container (sold separately). Fill the water case after installing the product in a place you want, since moving the product when it is filled with water may cause product malfunction.

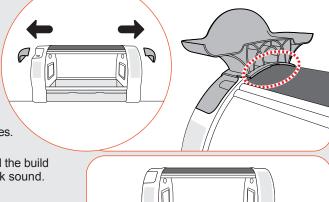
/N Do not place the humidifying water container on top of the Brooder when using.

/i If you use Mineral water or Tap water for humidification, the humidity tank can be broken easily because of water scales. We strongly recommend you to use only "DISTILLED WATER" for your machine, and Autoelex Co.,Ltd & our distributors do not indemnify for warranty service not only if you have any problem with using mineral water, regular water, tab water and the like but also if you had improper management or

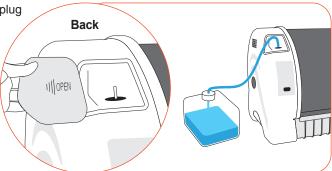
handling for your machine. In this case, Autoelex Co.,Ltd. & our distributors will charge for your after service.

Water can leak onto the floor if the height of the water container is higher than the sticker on the side.

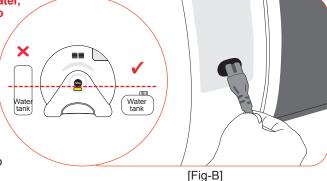
▶ The equipment operates when the power cord is connected to the back of the main body as in [Fig-B] and the power plug is connected to the power outlet.







[Fig-A]



9

USA & Canada Official Sales & Service https://www.R-Com-Hatcher.com

2. Brooding /3. Function Settings

(3) Instructions for Turning-off (4) Dew Condensation
(1) Return to Factory Setting

BROODER.ICU

Instructions for Turning-off

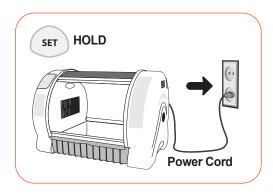
- ▶ There is no separate power switch on this product. The equipment turns off when the power cord is unplugged.
- ▶ To start using again, simply re-connect the power.
- ▶ You can operate the equipment on minimal consumption power if you turn off the temperature function and humidity function.

Dew Condensation

- ▶ In case of large temperature difference between equipment interior and installation environment, water can leak onto the window, tray or the floor. This is a natural phenomenon and may happen more severly under more humid conditions. To minimize condensation effects, the equipment must be installed in a place where the temperature difference between equipment interior and installation environment is small.
- ▶ How to reduce the internal condensation :
 - 1. Please clean up interior floor frequently.
 - 2. Please don't keep the equipment in cold place. [Recommended temperature of installation place: 28C (82.4F)]
 - 3. In case of Bird Brooder & ICU, Please use sawdust or the shredded newspaper as a interior floor material.
 - 4. In case of Pet Brooder & ICU, please open the window about 1~2cm.
- ▶ If the equipment is turned off in the middle of operation, humidity remaining inside the equipment may cause water drops (dew) to stick on to the surface. To prevent this, the equipment should be turned off after the internal humidity is eliminated by emptying the humidifying water container and running the equipment for about one hour before turning it off.
- ▶ If not using the equipment for a long period of time, open the window on equipment and dry the interior of the equipment for about a day in a well-ventilated place.
- * The electronic areas of the equipment are treated with special coatings against humidity.

Return to Factory Setting

- Used to initialize equipment to a setting when it was first released from the factory in case where the input value is changed due to mal-operation of equipment.
- ▶ If you unplug the power cord and re-plug while the SET button is pushed, "rSt" will appear on the display unit and the equipment will be initialized to a setting when it was first released from the factory.



TEMPERATURE

10

3. Function Settings

(2) Temperature, Humidity Setting

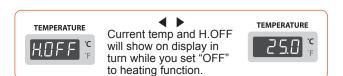
Temperature Setting

▶ Set the temperature using the TEMP+/TEMP- button while the SET button is pushed. The selected value is automatically entered when the button is released.

[Instructions for setting heating function ON/OFF]

ON: Set the temperature to 20°C or higher by pushing the TEMP+ button while the SET button is pushed. [Default: ON]

OFF: After setting the temperature to 20°C or higher by pushing the TEMP+ button while the SET button is pushed, pushing the TEMP- button once will stop the heating function and H.OFF will appear on the display unit.

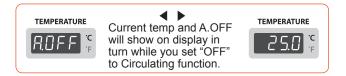




[Instructions for setting ventilation function ON/OFF]

ON: Set the temperature to 20°C or higher by pushing the TEMP+ button while the SET button is pushed.

OFF: Pushing the TEMP- button when the heating function is OFF will stop the ventilation function and A.OFF will appear on the display unit.



** The display unit shows current temperature even when the heating and ventilation functions are stopped. When the ventilation fan is stopped, there might be slight deviation between the displayed temperature and the actual temperature as air is poorly circulated.

3. Function Settings

(2) Temperature, Humidity Setting

BROODER.ICU

Humidity Setting

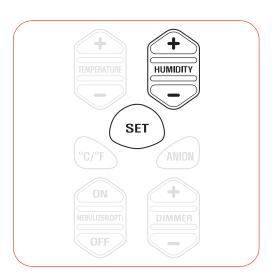
Set humidity using the HUMI+/HUMI- button while the SET button is pushed. The selected value is automatically entered when the button is released.

[Instructions for setting humidifying function ON/OFF]

ON: Set the humidity to 40% or higher by pushing the HUMI+ button while the SET button is pushed. [Default: ON]

OFF: After setting the humidity to 40% or higher by pushing the HUMI+ button while the SET button is pushed, pushing the HUMI- button once will stop the humidifying function and U.OFF will appear on the display unit.







Please be sure to re-fill the water when "Et" alarming on the display



please set "off" to heating in case you do not want to activate the heating, Heating unit lifespan will be more longer.

* The display unit shows current humidity level even when the humidifying function is stopped. When the ventilation fan is stopped, there might be slight deviation between the displayed humidity and the actual humidity as air is poorly circulated.



When releasing from the factory, temperature and humidity was corrected to be optimized according to international standard. If necessary, correction is possible, however, it isn't desirable for users to correct it directly. In case that correction is necessary, please contact Rcom homepage or place where you purchased to inquire about it. As low price thermometer and hygrometer easy to purchase in the open market have much deviation of estimate value, it is desirable to use corrected thermometer and hygrometer for exclusive use.

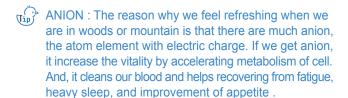
[thermometer and hygrometer for exclusive use – See Rcom homepage]

12

3. Function Settings

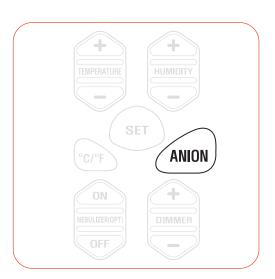
(3) How to turn ON/OFF ANION (4) How to control the brightness of Indor(Dimmer)

How to turn ON/OFF ANION



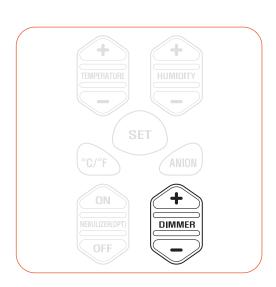
ON: One time pressing of ANION button makes the Anion lamp turns on and the Anion starts to be generated. [Default setting: ON]

OFF: One more time pressing of ANION button makes the Anion lamp turn off and stops the generation of Anion



How to control the brightness of Indor(Dimmer)

- Adjust brightness by using the DIMMER+ / DIMMERbutton.
- If you push the DIMMER- button continuously, "OFF" will appear on the display unit and the interior lights will turn off.
- ► Control to 10 stages of brightness [Default setting : OFF]



3. Function Settings

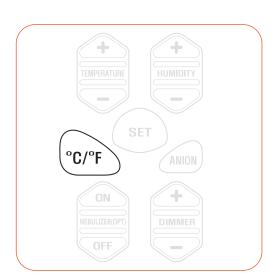
(5) How to change Cels./Fahr. (6) How to turn ON/OFF Sound

BROODER.ICU

How to change Cels./Fahr.

If you push the °C/°F button, the LED will blink alternatively from "°C" ↔ "°F".
[Default setting : °C]



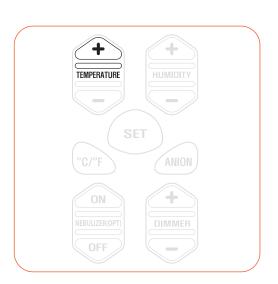


How to turn ON/OFF Sound

ON: If you push the TEMP+ button for 5 seconds all sounds are turned on and "S.ON" will appear on the display unit. [Default: ON]

OFF: If you push the TEMP+ button again for 5 seconds all sounds are turned off and "S.OFF" will appear on the display unit.





14

4. How to Clean

(1) Instructions for Disassembling and Cleaning

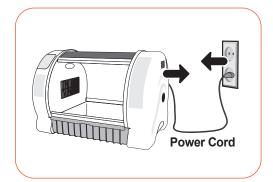
Instructions for Disassembling and Cleaning

When cleaning the filter, Please don't spray water or cleaner to the filter directly. If you do that, it might be cause of malfunction for humidity unit. Also it might be cause of fatal defect for T/H sensor. Therefore please wipe the filter clean with a damp cloth.

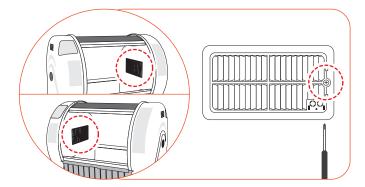
 \triangle

The Brooder power cord must be separated from the power outlet.

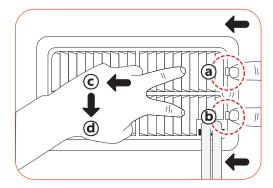
▶ pull out the power cord from the connection jack on the back and disconnect the power plug from outlet.



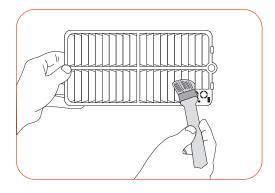
▶ Unscrew with driver.



▶ Separte cover by bending Picture ⓐ, ⓑ to the left at the same time and using your fingers or a screwdriver, then pulling in the direction of Picture ⓒ and pulling to the front of direction in Picture ⓓ. At this point do NOT completely remove the silicon hose from the cover, but follow Picture ⓔ which will allow easier assembly (using tools will help).



Please wipe off the dust of separate cover by using a brush, and wash with water.



4. How to Clean

(1) Instructions for Disassembling and Cleaning

BROODER.ICU

▶ Take out the humidifying container in the direction of the arrow. Take out the air filter, wash thoroughly with water and dry. [Fig-1]



Please do not touch the humidity unit. It can cause



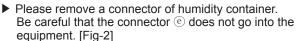
Cleaning cycle of air filter and humidifying container: Air filter should be washed with water once every week and replaced every 6 months~1 year. (May vary according to time of usage) The humidifying container should also be washed once every week.

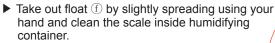


/!\ It is recommended to use distilled water in order to minimize debris (scale) from collecting around the humidifying container. If you wish to use different water please ask your vendor first.

(Underground water and lime water cannot be used) Clean once every week.

<u>Humidifier malfunction caused by debris(scale)</u> collected around the humidifying container from poor cleaning is considered to be the customer's fault and repair will be charged even during the warranty period.





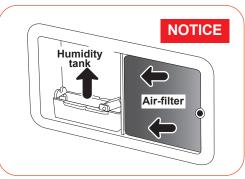
[Fig-3] (Clean once every week)

- ▶ Thoroughly clean the inside of the humidifier once every week. If not cleaned well the water level sensor (float switch) will not work and cause malfunctions. (Repair for humidifier malfunction due to poor cleaning will be charged even during the warranty
- ▶ Plug silicon tube into [®] of humidifier in [Fig-4].
- When cleaning products interior, after removing trays, Please polish inner parts with a soft cloth.

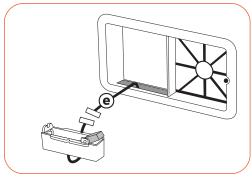


Do not clean the incubators with benzene or thinner, it can cause modify or bleach.

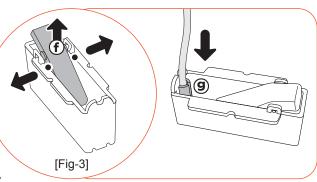
Assemble in the reverse order of separation and store.



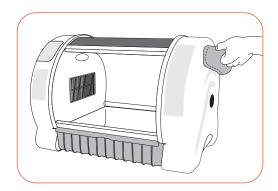
[Fig-1]



[Fig-2]



[Fig-4]



16

5. Product Information

(1) Troubleshooting

Troubleshooting

All our Rcom digital products of Autoelex Co., Ltd. are made by precision systems under strict quality control. But occasionally some defective products are found on the way of their distribution. If any problem occurs, then please contact Autoelex service center or distributors in your country. We will do our best to solve the problems, if any, for you. This product is designed in modular mode, so for its repair, if any, a qualified person can replace the part concerned with ease.

Troubles	Expected Causes (Possibility)	Countermeasures
No signs of power to the incubator.	 Check if power cord was connected well. Check power failure. Check if plug is defective. 	 Try to plug-in again. Check other electric and electronic product nearby. Check after moving to other socket.
When temperature is too high / When temperature is too low	 Check set temperature. Check if FAN for air circulation doesn't rotate. Try to make factory initialization. [See 9 page] 	 Adjust set temperature to wanted temperature. Unplug from socket and separate main body to clean FAN area for air circulation with a brush or writing brush.
When humidity is too high / when humidity is too low	 ▶ Make sure that there is enough water. ▶ Try to make factory initialization. [See 9 page] <when low=""></when> ▶ Close the window again after checking. <when high=""></when> ▶ Check surrounding environment. ▶ please check the tray of machine is wet or not. 	 Refill water sufficiently. <when low=""></when> Ensure that no foreign objects wedged in the viewing window, and will once again tightly closed. <when high=""></when> Please check the brooding room environment. [See 7 page]
The machine makes some noise. It is normal that the machine emits some sounds because it uses air circulation fan for working.	 Check if there is some other object on the brooder. Check if there is some vibration on the floor or it was installed on the desk. Check if some foreign substance was attached to FAN. 	 Remove all the objects put on the brooder. Move brooder to the safe place to install. Unplug from socket and separate main body to clean FAN area for air circulation with a brush or writing brush.
Water leaks from the machine. * In case of keeping at high humidity, there may be some dew.	▶ Dew condensation is normal.	► Please check the brooding room environment. [See 7 page]



Please operate the equipment sufficiently and check to make sure that the equipment is functioning properly before putting in the animal.

5. Product Information

(2) Specification

BROODER.ICU

Specification

1-1 Name: Rcom BROODER&ICU (BIRD / PET)

1-2 Model: MX-BS500, MX-BS500(N) / MX-BL500, MX-BL500(N)

MX-BS600N / MX-BL600N

Model. NO	MX-BS500, MX-BS500(N) / MX-BS600N	MX-BL500, MX-BL500(N) / MX-BL600N	
Power	AC 100~120[V], 50/60[Hz] / AC 220~240[V], 50/60[Hz]		
Temp. Control Range	Ambient temperature ~ 38[°C] (Ambient temperature ~ 100.4[°F])		
Outside Environment Temp.	Optimal range : 20 ~ 25[°C] (68~77[°F])		
Humidity control	40 ~ 60[%] (Subject to change depending on the ambient environment)		
Outside Environment Humi.	40 ~ 60[%]		
Power Consumption	Average 60[W] Max. 100[W]	Average 75[W] Max. 130[W]	
Product Weight	9[Kg]	10[Kg]	
Product Size	(W)655×(L)470×(H)440[mm]	(W)855×(L)470×(H)440[mm]	
FUSE Standard	250[V] 5.0[A] (Ø6*30[mm])		

We are not allowed to extend warranty therefore we ONLY provide 1 year warranty service. If you do not register, we provide limited warranty service for 1 year based on factory releasedate.



You will be asking for service charge if you are in below cases.

- 1. Broken or Problem caused by 'No cleaning' or 'Improper handling'
- 2. Broken or problem caused by 'Not using distilled water'
- 3. Broken or problem caused by 'Trying Bird hatching in incubator' (Please don't try bird hatching in incubator. Please use Hatcher during bird hatching.)
- 4. Broken or problem caused by 'Wrong controling(Using)'5. Broken or Problem caused by using the machine out of User's Manual.
- 6. Broken or problem caused by 'Customer's mistake or fault'
- * Product Registration Procedures

If you are a new member of Rcom, you need to log in our website at www.Rcom.co.kr

- 1. Click "SIGN UP" on top of the right corner.
- 2. Fill out the information on the blanks.

If you already registered your information on the Rcom website,

- 1. Click "Login" on top of the right corner.
- 2. Select "Customer" and click "Register Products".
- 3. Fill out the information on the blanks.

You will need below information to register on our website.

- 1. Your name
- 2. Your (home/company) address & Email address, country
- 3. Your product(model) name & Serial number
- 4. Date of purchase & Name of purchased shop you bought from

18

Rcom Incubator Series Rcom PRO MINI (PX-03) Rcom KINGSURO MAX 20 (MX-SURO) Rcom MAX 20 (MX-20) Rcom PRO 50 (PX-50) **NEW** Rcom REPTILE MAX 90 (MX-R90) Rcom REPTILE PRO 90 (PX-R90) Rcom REPTILE MAX 230 (MX-R230) Rcom REPTILE MAX 230 (PX-R230) **NEW** Rcom REPTILE MAX 60 (MX-R60) **Rcom DIGILOG2 Rcom DIGILOG** (PX-V1) (PX-V2)

Rcom is designed for user's easy and convenient use. It can be changed without notice for improvement in performance, design, treatment, and software, etc.



https://www.R-com-hatcher.com



North America Sales & Service

https://www.R-com-hatcher.com

MANUFACTURER

AUTOELEX CO.,LTD.

- OFFICE: 218, Sangdong-ro, Sangdong-myeon, Gimhae-si, Gyeongsangnam-do, 50805 Korea

Rcom is the Best Design with High Quality, Value, and Performance!

Newborn & frail animals or exotic Birds Rcom ICU User Manual