

SANUVOX

Troubleshooting manual for Sanuvox SR+ Air Purifier



WARNING

Before servicing the unit, TURN OFF and disconnect unit from power source. Electrical shock may cause personal injuries or death.

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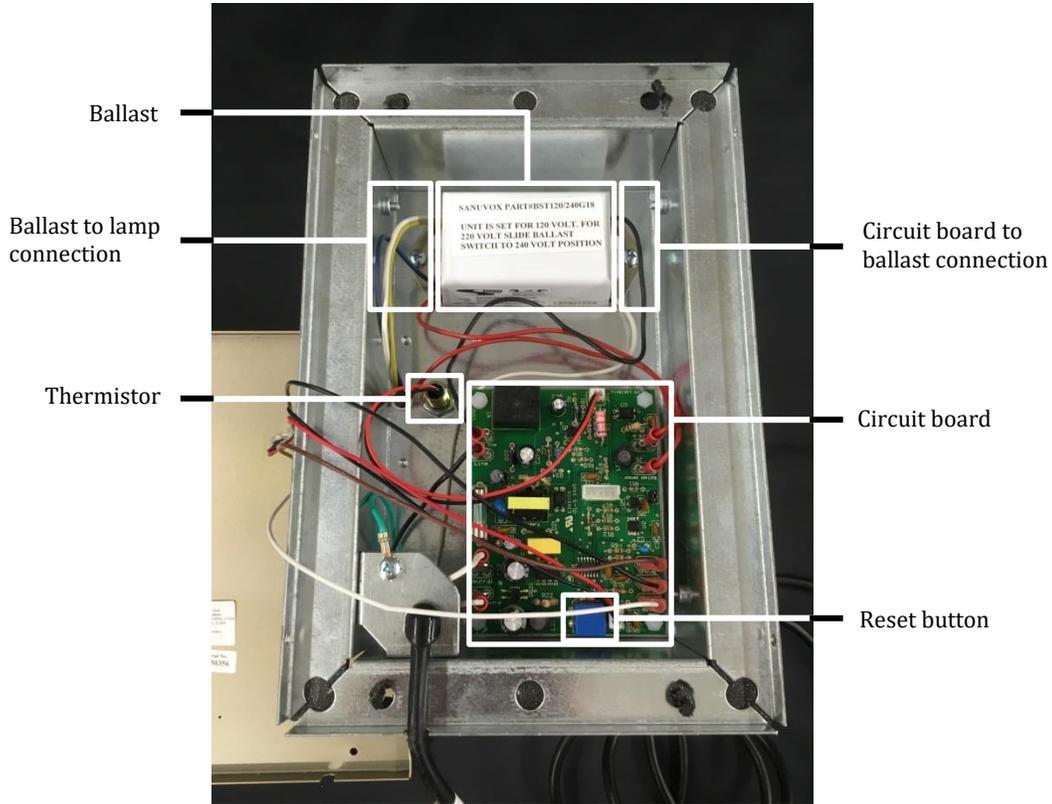
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1. Tools required for troubleshooting

- Phillip screwdriver
- Ohmmeter
- 5/16" nutdriver

2. Identifying internal components inside SR+

To access internal components of the SR+, remove cover by following the instructions in the Step-by-step instructions.



3. List of parts for replacement

Sanuvox PN	Description	
BST120/240GL	Ballast [If you have a BST120/240G18 use BST120/240GL for replacement]	

MSCELC20	Circuit board	
MSCTER1-W	Thermistor	
LMPRGXJ65	6.5in regular intensity UV lamp	

4. Troubleshooting summary table

Problem	Possible causes	Try ...
On/Off button internal LED is not lit	<ul style="list-style-type: none"> - There is no power at the electrical outlet - The On/Off button is not ON - Power cord is damaged - Fuse is blown - Circuit board is damaged or defective 	<ul style="list-style-type: none"> - Test the outlet to make sure there is power by plugging in another electrical appliance - Press the switch to the ON position - Check the power cord for damage and replace if damaged (contact Sanuvox) - Visually inspect the circuit board (fuse or burn marks) - Contact Sanuvox to replace circuit board and thermistor together
Status LED is Orange	<ul style="list-style-type: none"> - The lamp has almost reached its 3 years lifespan 	<ul style="list-style-type: none"> - Get a genuine replacement lamp and reset the counter to 3 years (refer to reset procedure)
Status LED is Red	<ul style="list-style-type: none"> - Connection issues between the lamp and the ballast - Connection issues between the ballast and circuit board (power supply) - Defective lamp - Defective ballast 	<ul style="list-style-type: none"> - Verify that the connections between lamp and ballast (also ballast and circuit board) are secured - Test lamp continuity (refer to lamp test procedure) - Contact Sanuvox to replace UV lamp - Contact Sanuvox to replace ballast
Status LED blinks alternately Red and Green	<ul style="list-style-type: none"> - Defective thermistor 	<ul style="list-style-type: none"> - Contact Sanuvox to replace thermistor
Status LED is blank	<ul style="list-style-type: none"> - The unit is still in the 45 seconds warm up period - There is no airflow in the duct, unit in «Stand-by» - Defective LED 	<ul style="list-style-type: none"> - Wait for the 45 seconds warm up period to end - Turn the fan ON so there is airflow moving in the ductwork - Contact Sanuvox to replace LED
The lamp doesn't come ON when air is circulating in the ductwork	<ul style="list-style-type: none"> - Not enough airflow circulating in the ductwork 	<ul style="list-style-type: none"> - Change the fan setting for higher speed - Reposition the SR+ in the ductwork where the airflow is unobstructed - By-pass the thermistor (refer to thermistor by-pass procedure)
Lamp burned before the 3 years elapsed	<ul style="list-style-type: none"> - Overcycling of the UV lamp due to excessive start/stop of the variable speed fan 	<ul style="list-style-type: none"> - Contact Sanuvox to replace lamp and by-pass thermistor (refer to thermistor by-pass procedure)

5. Step-by-step instructions



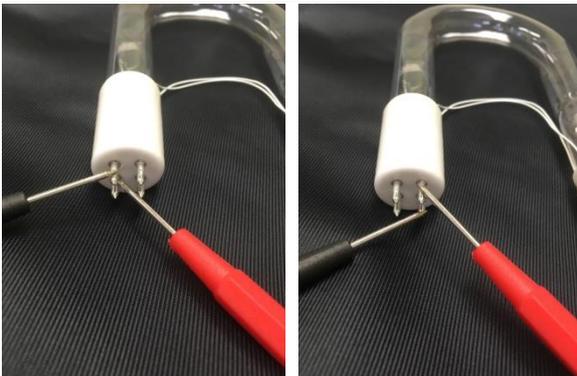
Before performing any of the instructions below, make sure that the unit is turned OFF and that it is unplugged from power.

5.1 Open the SR+ ballast box

Step	
<p>1. Take the SR+ out from the ductwork by removing the 4 screws located on the cover (4 corners) that hold it to the frame</p>	
<p>2. Place the SR+ down on a flat surface, remove the 4 screws that attach the cover to the ballast box and pull the cover off</p>	

5.2 Test UV lamp continuity

Step	
<p>1. Take the SR+ out from the ductwork by removing the 4 screws located on the cover (4 corners) that hold it to the frame</p>	

<p>2. Take the reflector off by removing the 4 screws that hold it to the ballast box and remove the lamp connector from the lamp</p>	
<p>3. Using an ohmmeter place 1 probe on 1 of the 4 pins and by sensing the 3 remaining pins, 1 should have continuity. Make sure the 2 remaining pins also have continuity.</p>	

5.3 By-pass circuit board (test ballast and UV lamp together)

Step	
<p>1. Open the SR+ ballast box</p>	<p>Refer to instructions above</p>
<p>2. Unplug from the circuit board both black wires (Line and Ballast line) and clip them together</p>	

3. Unplug from the circuit board both white wires (Neutral and Ballast neutral) and clip them together



4. Using electrical tape, carefully wrap and cover the 2 connections made in the previous steps



5. Plug the power cord directly in a power outlet and the UV lamp will light up if both the UV lamp and ballast are still functional.

6. After the test is completed, unplug the unit and replace the wires from the cord in their original position (Line and Neutral). Replace the ballast wires (Ballast line and ballast neutral) on the circuit board in their original position.



5.4 By-pass thermistor

Step	
1. Open the SR+ ballast box	Refer to instructions above
2. Pull the jumper from the 2 pins (can be set on only 1 pin in order to not lose the jumper) and set back the unit in the ductwork	

5.5 Resetting lamp timer

Step	
1. Open the SR+ ballast box	Refer to instructions above
2. Plug in the SR+ to a power source and press the switch to the ON position	
3. Press and hold the reset button for 3 seconds until the counter sets itself back to 1096days (3 years)	