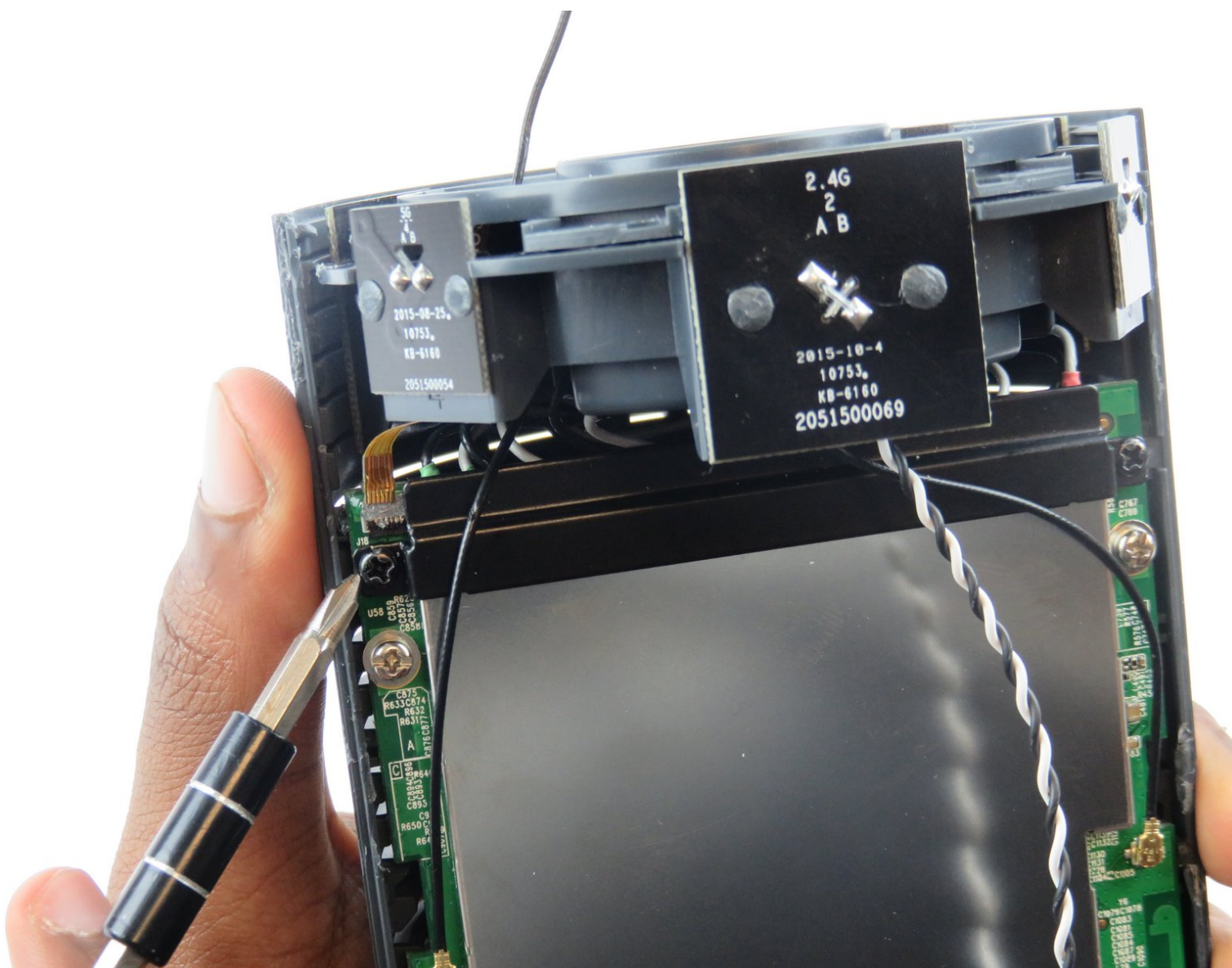




OnHub OnHub Antenna Array Replacement

By the end of this guide, you will be able to replace the antenna array on your OnHub device.

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INTRODUCTION

The antenna array is arguably the second most important component to the OnHub router, and in this guide we'll show you how to replace this essential part. A word of caution before proceeding, the gold connections for the wires are delicate. If they do get bent you can bend them back into place if you are careful.




TOOLS:

- [Phillips #1 Screwdriver](#) (1)
 - [Desoldering Braid](#) (1)
 - [Metal Spudger Set](#) (1)
 - [iFixit Opening Tools](#) (1)
 - [Tweezers](#) (1)
 - [Solder](#) (1)
 - [Soldering Iron](#) (1)
 - [Staples](#) (1)
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Step 1 — Speaker Grille



 Make sure the device is unplugged before proceeding with the disassembly.

- While holding the base firmly using the palm of one hand, remove the cowl (cover) by turning the cowl counterclockwise until a snap is heard. Once disengaged, pull upwards.

Step 2



- Place the plastic opening tool under the speaker grille, and just above the light ring.
- Move the plastic opening tool around the groove while applying upward force to pry loose the 4 clips holding the grille in place.

Step 3



- Using a metal spudger, carefully remove the congestion-sensor antenna by undoing the two clips.

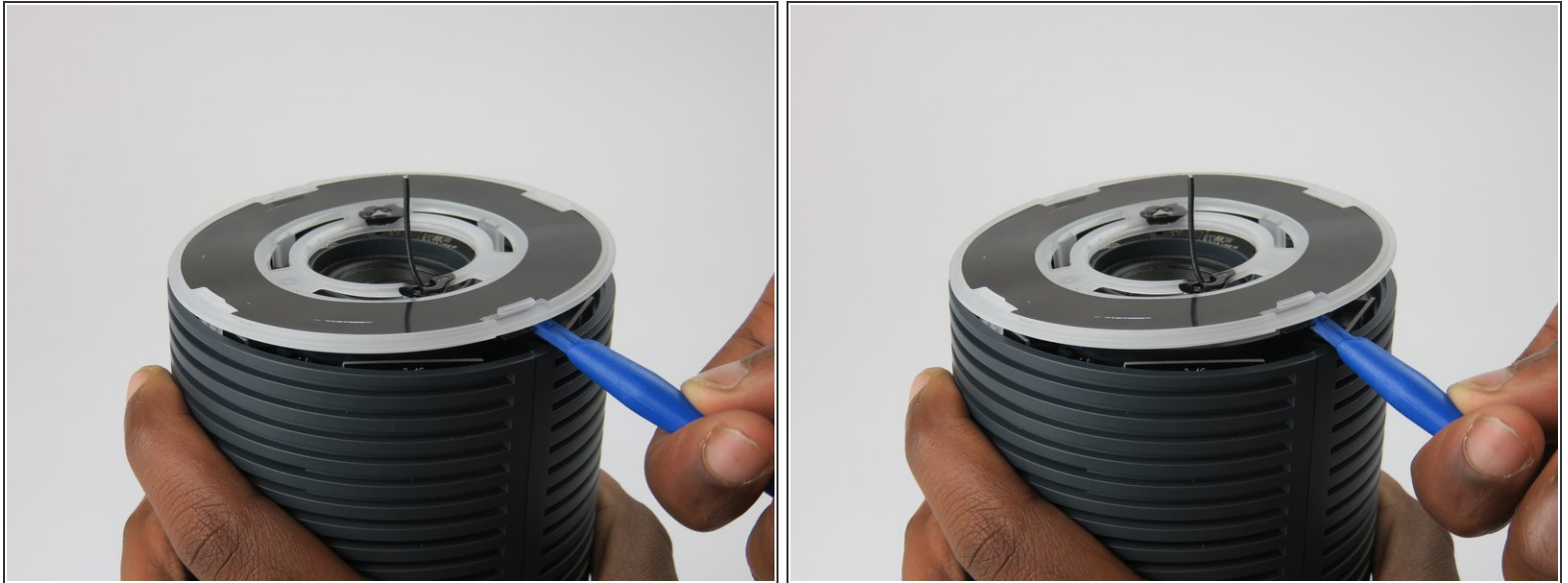
⚠ There is a delicate wire connection to the antenna that is easily broken if not careful.

Step 4 — Congestion-sensing Antenna




- Remove the wire connection to the antenna by soldering it off.
- For help with soldering and de-soldering check out the [iFixit Soldering Guide](#)

Step 5 — Outer Casing



- You must remove the plastic cover found just above the speaker.
- Wedge the plastic opening tool under the cover and apply pressure in an upward direction.
- There are four clips that you are removing. When disengaged, these clips will make a snapping noise.

 Though the snapping noise is normal, take care not to break these clips.

Step 6



- Upon removing the cover, four screws and the speaker housing will be exposed.
- Unscrew the four 12mm screws using a #1 Phillips head screwdriver.
- This unlocks the speaker housing and antenna array from the casing.

Step 7



- On the bottom of the OnHub is two screws holding the casing to the base.
- To access these screws, you must remove the rubber pad that is glued to the base.
- To remove the pad, slide a metal spudger under the edge of the pad. Pry the pad away from the base, removing the glue.
- Once the pad is pulled up enough to grab, peel it the rest of the way exposing the screws.

⚠ The rubber pad is thin and fragile; be careful not to tear when removing.

Step 8



- Remove the two 12mm screws under the base of the OnHub by using a #1 Phillips head screwdriver.

Step 9

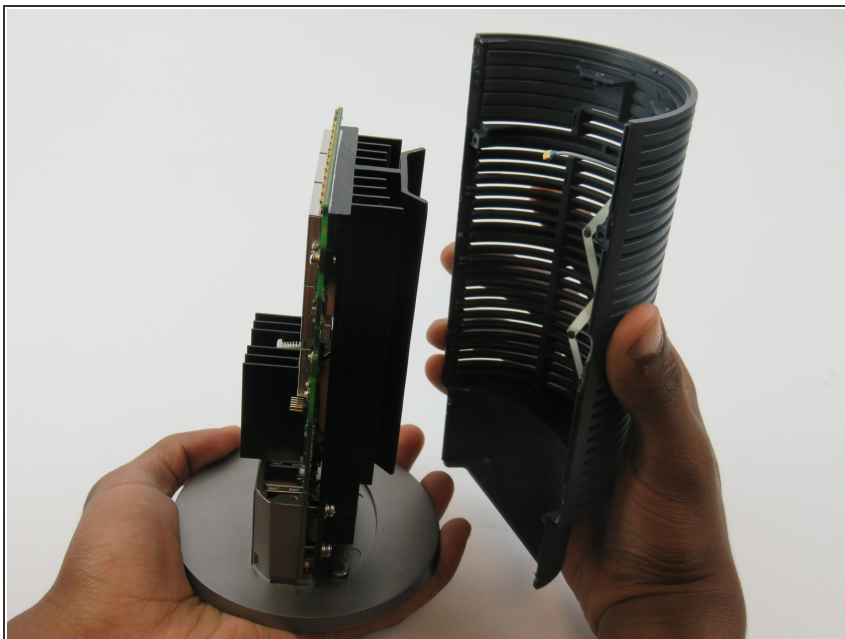


- Once the two screws are removed from the base, it is time to split the casing apart.

⚠ It is okay if a couple clips break. It will still hold together with a few remaining.

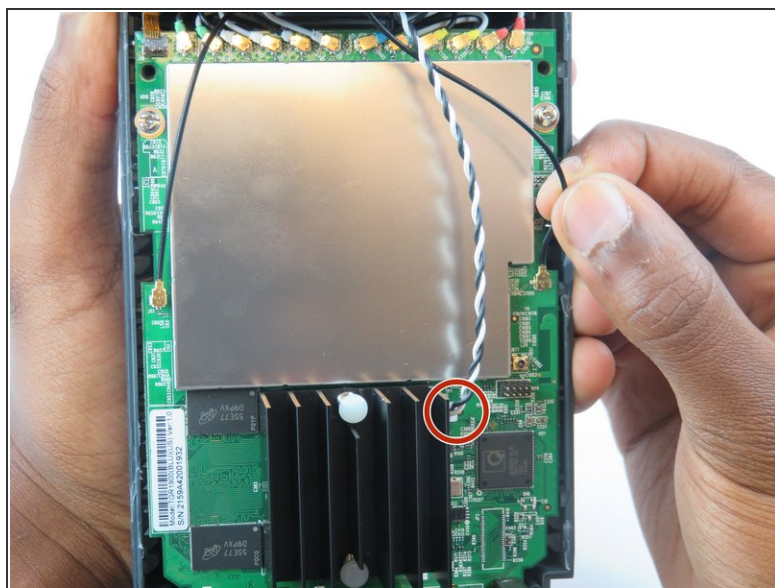
- Wedge a spudger between the two casing halves, and pry the clips apart starting from the top
- There are three hooking style clips in total.

Step 10



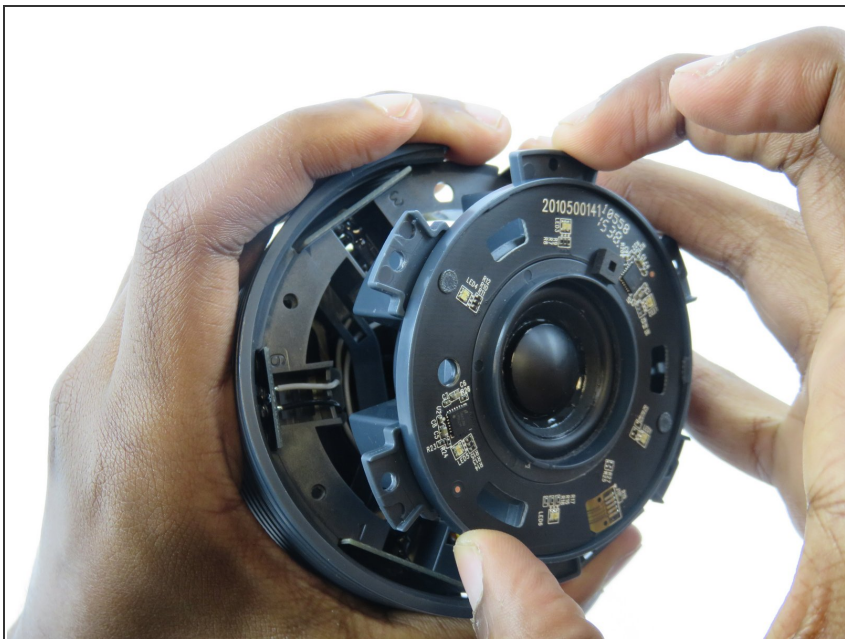
- Once unclipped, you can slide the two casing halves apart, and remove the casing.

Step 11 — Speaker



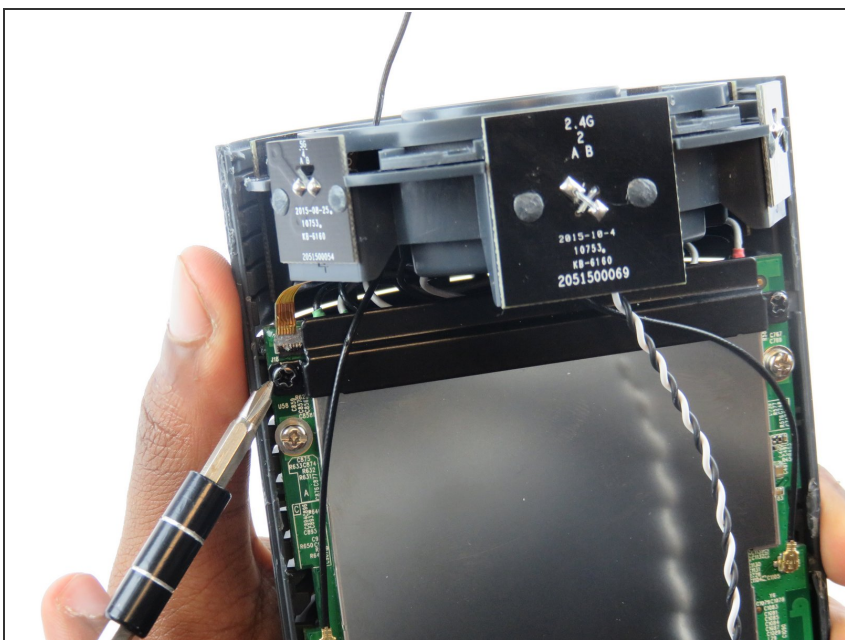
- Underneath the speaker is an intertwined black and white wire.
- Disconnect the wire from its connection to the motherboard.

Step 12



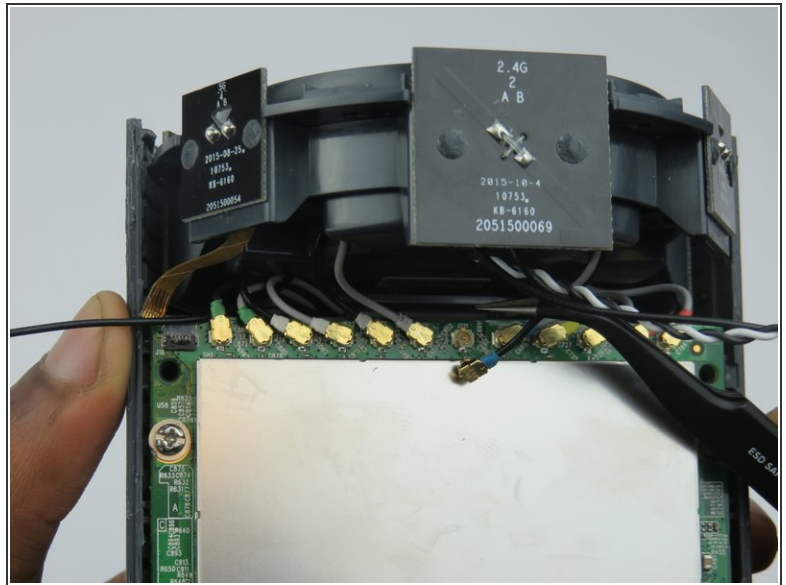
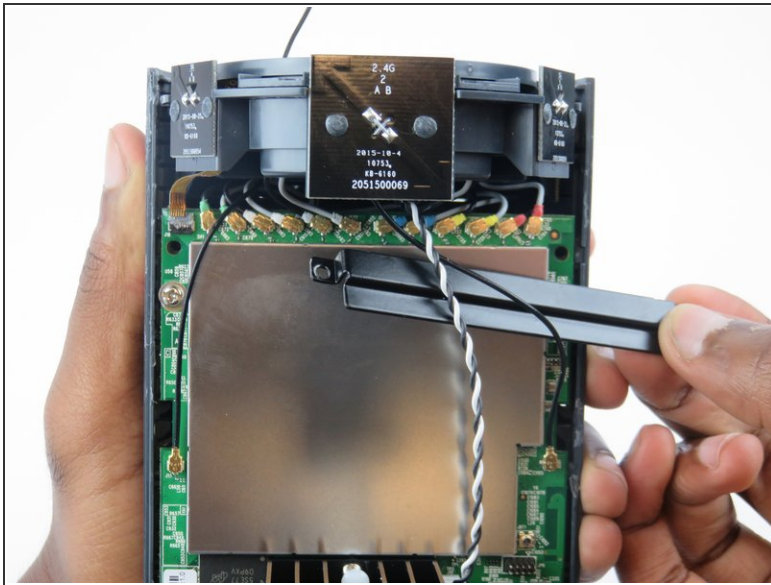
- The speaker should now easily come off with a firm grip on the OnHub device and pull.

Step 13 — OnHub Antenna Array



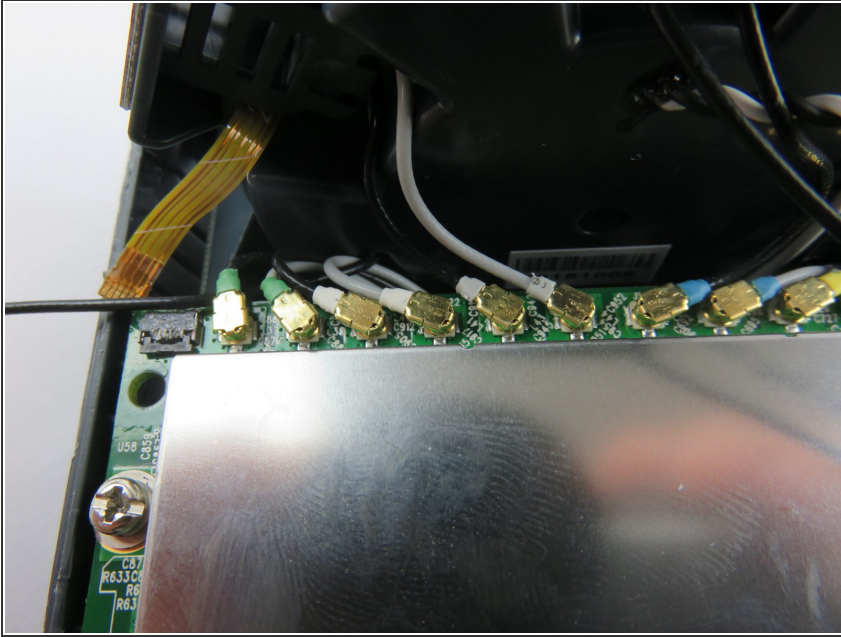
- There is a black, horizontal brace covering 12 wire connections.
- Remove the brace, held by two screws


Step 14



- ✦ Make a note of each wire's position and color, so it will be easier to reconnect later.
- Using tweezers, gently disconnect each of the 12 wire connections, attached to the top of the motherboard.
- ⚠ Be careful when removing the gold connectors as they are easily bent.
- ℹ The connection points can be bent back if not damaged too badly.

Step 15



 Make sure to carefully pull the tape style wire furthest to the left that is held by glue.

To reassemble your device, follow these instructions in reverse order.