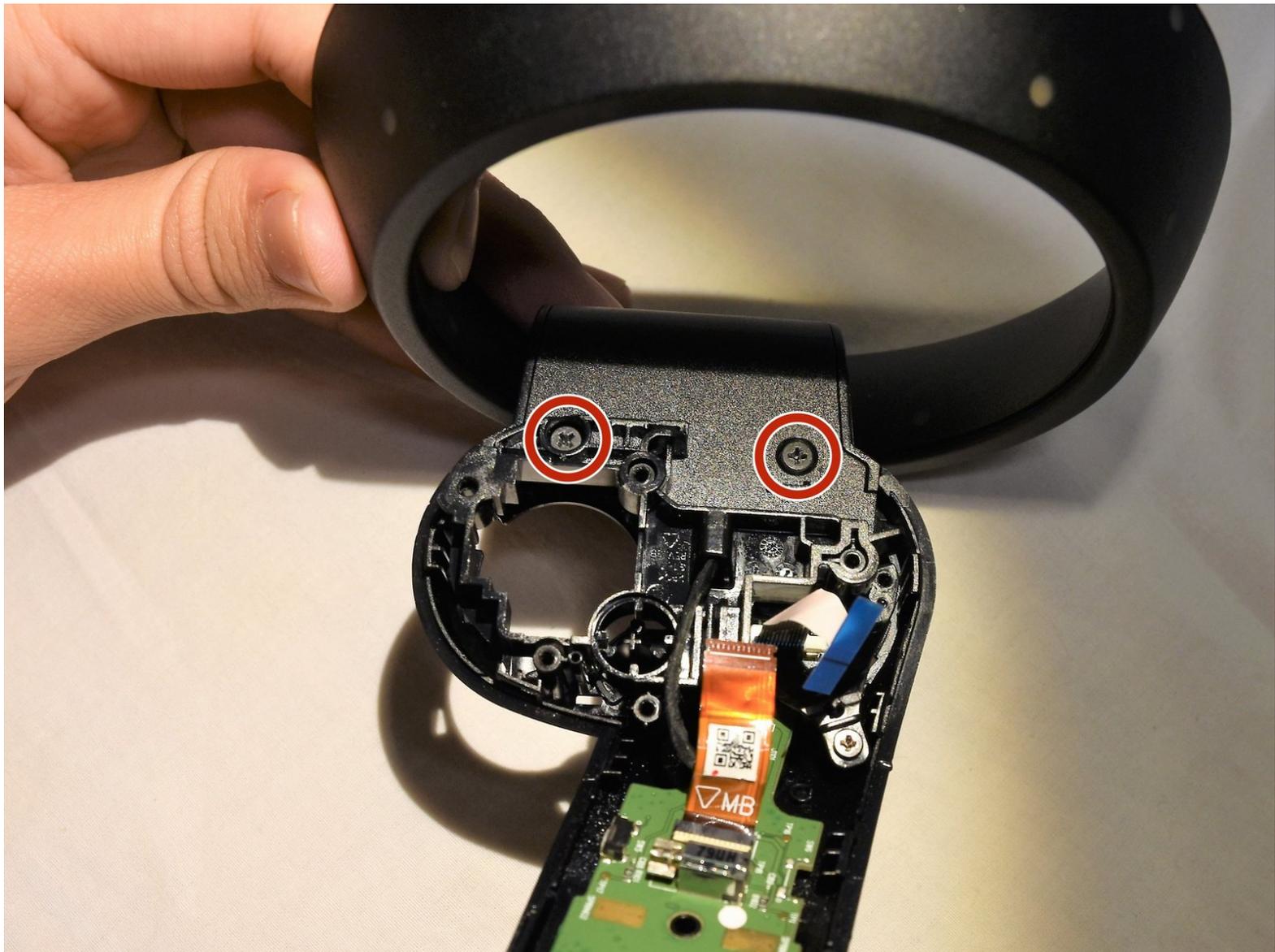




# HP Windows Mixed Reality Controllers TPC-Q044 Main Circuit Board Replacement

This guide will instruct you on how to replace the main circuit board in the HP Windows Mixed Reality Controllers TPC-Q044.

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## INTRODUCTION

This guide goes over how to replace the controller's main circuit board.

If your TPC-Q044 circuit board starts failing when using your controller, you may want to think about replacing the component. The failure may be a result of bad soldering or missed connections. The replacement of the circuit board is not too complex. A couple of screwdrivers and a spudger will be sufficient to complete this task. There are no warnings or potential hazards when replacing the board.

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### TOOLS:

- [Spudger](#) (1)
  - [Phillips #00 Screwdriver](#) (1)
  - [Phillips #0 Screwdriver](#) (1)
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## Step 1 — Batteries



- Slide the rear compartment cover in the direction of the arrow.
- ☑ If replacing batteries, ensure the (+) and (-) on the battery match the (+) and (-) labeled in the battery compartment.

## Step 2 — Shell



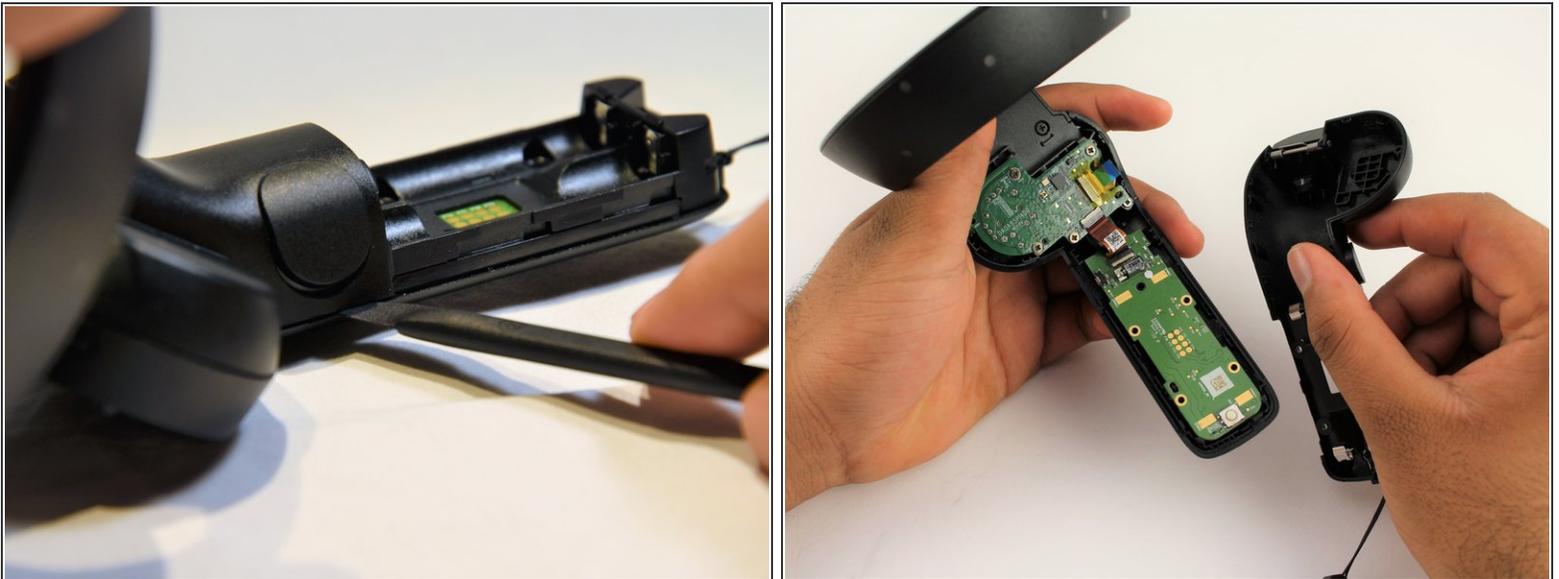
- Remove the four 4mm screws using a Phillips #00 screwdriver.

### Step 3



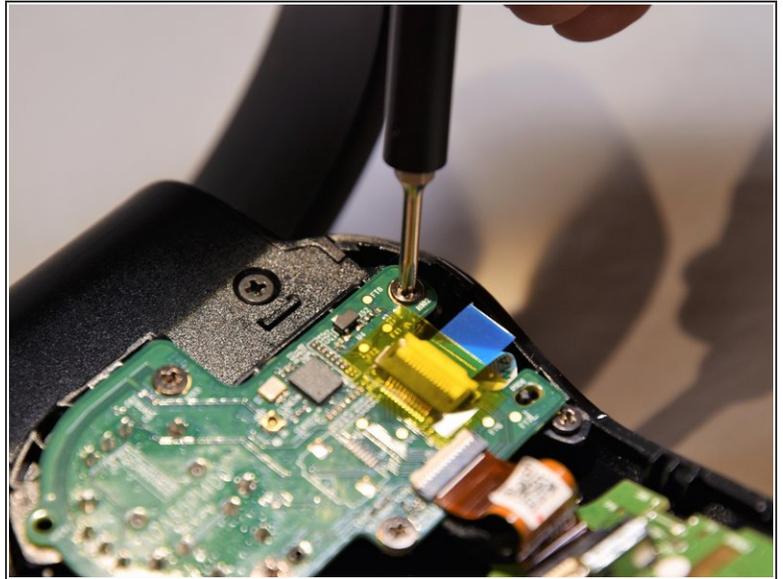
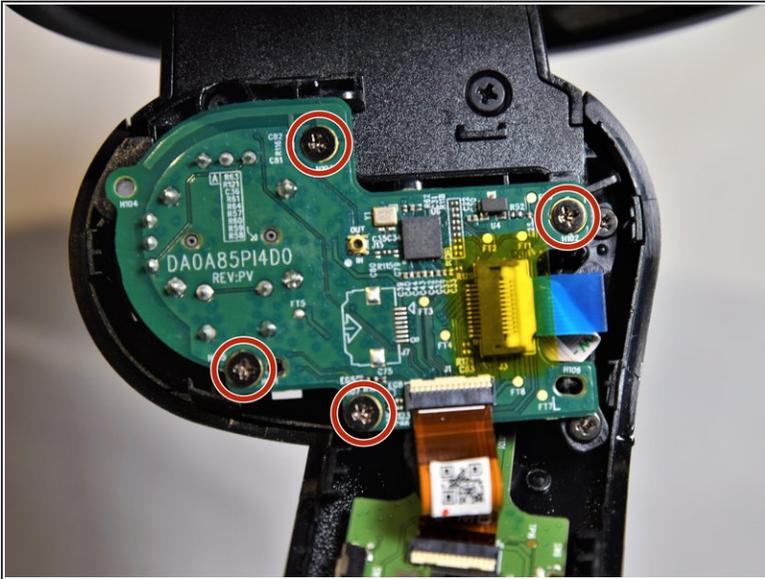
- Grip the main body and pull the joystick outwards until the entire front panel pops off.
- Remove the 6mm screw in the corner of the joystick well using a Phillips #00 screwdriver.

### Step 4



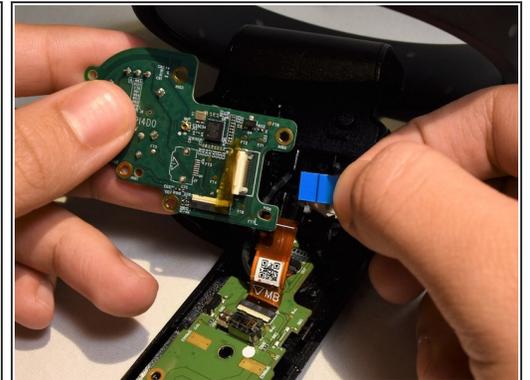
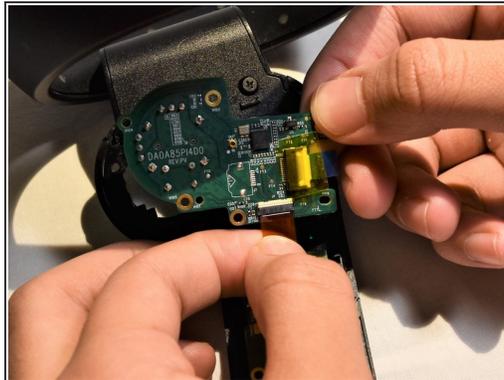
- Use a spudger to pry apart the two halves of the assembly.
- Work slowly, prying a small section at a time until the halves are completely separated.

## Step 5 — Small Circuit Board



- Using a Phillips #00 screwdriver, remove the four 4mm screws located on the joystick circuit board underneath the top half of the controller.

## Step 6



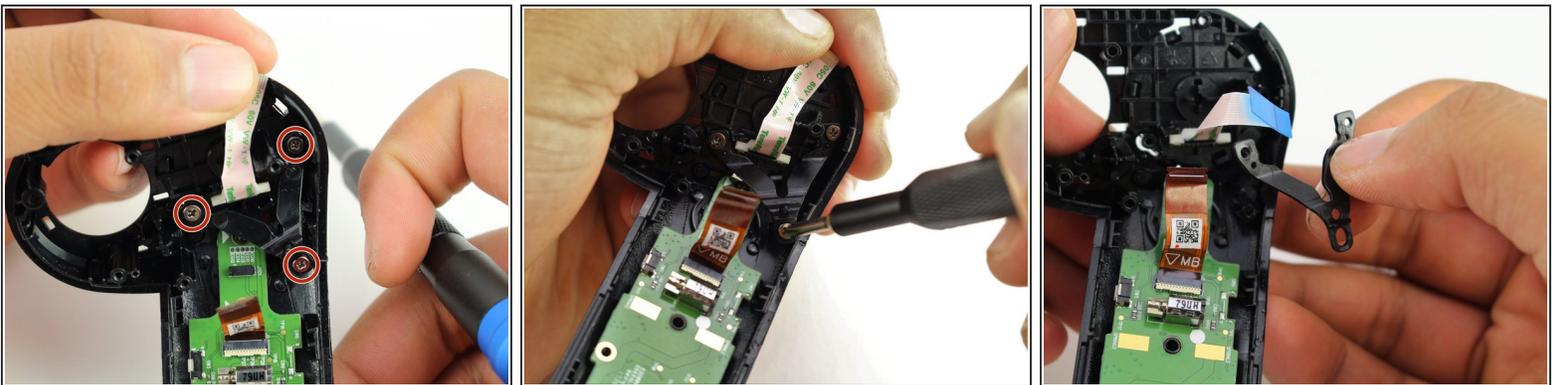
- Remove the orange flat cable by pulling the orange tab parallel to the circuit board.
- Release the blue flat cable by lifting up the white latch with a spudger.

## Step 7 — Main Circuit Board



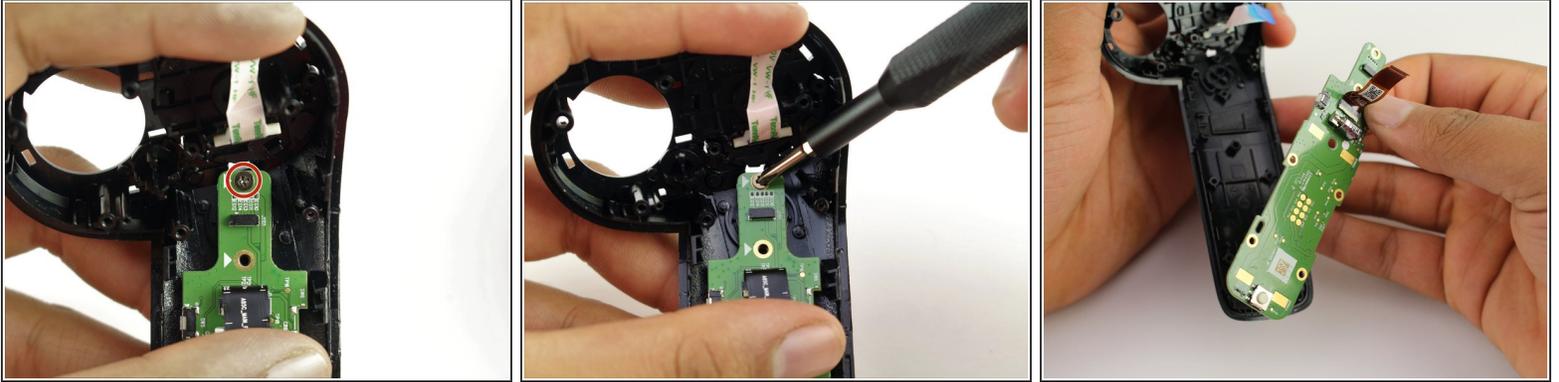
- Remove the two 6mm screws at the base of the ring using a Phillips #0 screwdriver.
- Pull towards the base of the controller to release the black wire from the connector on the circuit board.
- Pull the ring apart from the rest of the controller.

## Step 8



- Remove the two 3mm screws on the V-clip using a Phillips #00 screwdriver.
- Remove the V-clip from the device.

## Step 9



- With the V-clip off of the controller, use a Phillips #00 screwdriver to remove the remaining 4mm screw.
- Remove the circuit board.

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