

## G502 LIGHTSPEED Wireless Gaming Mouse

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# GETTING STARTED

## USER GUIDE

### Package contents



## SPECIFICATIONS

Product Information		
Component	Model Number (M/N)	S/N Location
Mouse	MR0076	Label inside the weight compartment
Receiver	CU0008	On receiver

Product Dimensions				
Component	Height	Width	Depth	Weight
Mouse	132 mm (5.2 in)	75 mm (2.95 in)	40 mm (1.57 in)	114 g (4.3 oz mouse only)
Receiver	6 mm (0.24 in)	14 mm (0.55 in)	19 mm (0.75 in)	2 g (0.07 oz)

Mouse Specifications	
Connection Type	USB
USB VID_PID	VID_046D&PID_C08D
USB Protocol	2.0
USB Speed	Full-speed
USB Report Rate	1,000 MHz (Min 1ms)
DPI (Min/Max)	Min: 100 – Max: 16,000
Sensor	HERO™
Sensor Type	Optical, Visible light: No

Mouse Specifications	
<b>Max acceleration</b>	> 40 G
<b>Max tracking speed</b>	> 400 IPS
<b>Onboard Memory</b>	Yes
<b>Scroll Wheel</b>	Vertical scroll type: Hyper-fast Left/Right tilt: Yes
<b>Indicator Lights (LED)</b>	G-logo: Selectable color (RGB) DPI setting/Power: Selectable color (RGB)
<b>Number of Buttons</b>	11 Programmable
<b>Connect/Power</b>	On/Off Switch (under mouse)
<b>Battery Details</b>	Type: Rechargeable Quantity: 1 Accessible: No Size: Proprietary Technology: Li-polymer
<b>Battery Life</b>	Up to 60 hours (no lighting); Up to 48 hours (default lighting)
<b>Cable Length (Power/Charging)</b>	6 feet or 1.8 meters
<b>Durability: Max. Distance</b>	PTFE Feet: 250-km range (tested on Logitech G240 Gaming Mouse Pad)

Receiver Specifications	
<b>Connection Type</b>	USB (Wireless)
<b>USB VID_PID</b>	VID_046D&PID_C539 (Wireless)
<b>USB Protocol</b>	USB 2.0
<b>USB Speed</b>	Full-speed
<b>Data Format</b>	16 bits/axis
<b>Wireless Protocols</b>	2.4 GHz (Custom)

## FAQs

- [Device does not appear in G HUB](#)

A device's failure to appear in the software may stem from various issues, ranging from simple connectivity problems to more intricate software or hardware complications. Below are the steps and explanations for each:

Use the latest Software version:

**Why:** With each software release, Logitech incorporates support for new devices, rendering them incompatible with prior software versions. Thus, ensuring you're using the latest software is crucial for detecting your device.

**Steps:** Access the latest version and [release notes](#) on our website. Verify your software settings and update to the newest version available.

Check Physical Connections:

**Why:** Loose or faulty physical connections can hinder the software from detecting the device.

**Steps:** Confirm that cables, connectors, and power sources are securely connected.

Unplug & Replug the device:

**Why:** Reconnecting the device can resolve temporary glitches and refresh its connection status.

**Steps:** Disconnect the USB receiver, wait for 10 seconds, and reconnect.

Try Another USB Port:

**Why:** The current USB port may be defective.

**Steps:** Switch to a different USB port or connect directly to the computer to eliminate any port-related issues.

Test on Another Computer:

**Why:** Testing the device on another computer helps identify whether the issue lies with the device or the computer.

**Steps:** Connect the device to another computer to check if it is detected.

### Verify Device Power and Status:

**Why:** Insufficient power or device malfunctions can impede proper recognition.

**Steps:** Ensure the device is adequately powered and inspect for any indicators or lights signaling its status.

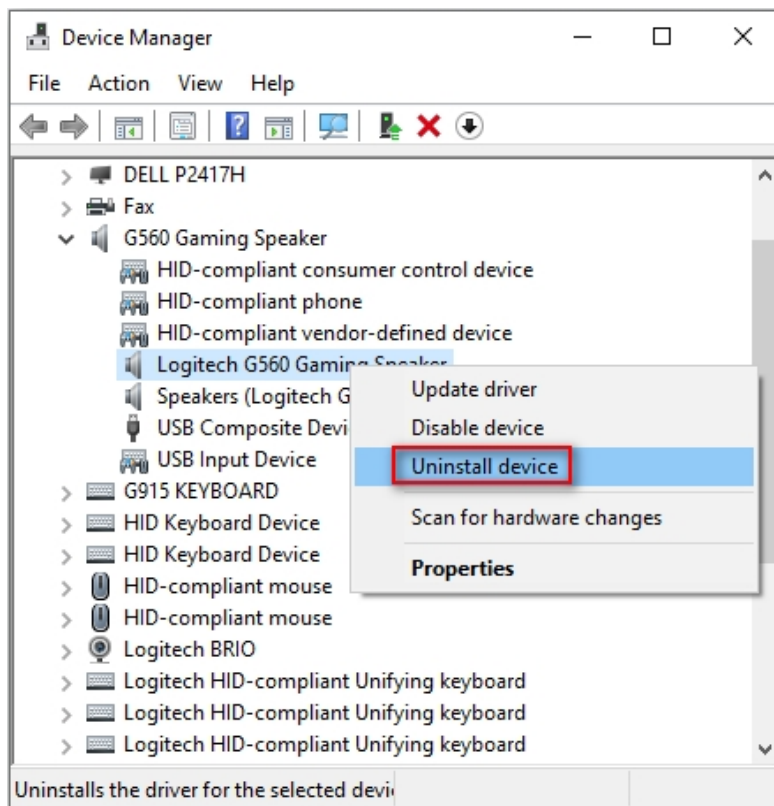
### Check for OS Updates:

**Why:** Operating system updates may contain bug fixes or enhancements related to device recognition.

**Steps:** Confirm that both the software and device firmware are up to date.

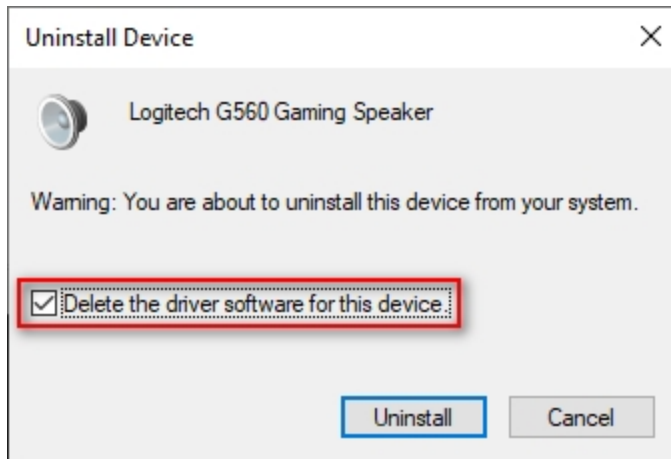
If these suggestions don't resolve your issue, we recommend trying the troubleshooting steps below:

1. Go to **Device Manager** (**WIN+PAUSE|BREAK**).
2. Click on **View** at the top and view **Devices by container**.
3. Look for your device and expand it. You are looking for the name of the device, for example, Logitech Pro X Gaming Headset, or Logitech G560 Gaming Speaker.
4. Right-click and select **Uninstall Device**.





5. Check **Delete the driver software for this device** and then click **Uninstall**.



6. Unplug the device and plug it back into a different USB port.
7. It should re-enumerate and be detected in G HUB.
8. G HUB should then download the driver for your device.

If issues persist, run G HUB with the default settings:

1. Exit G HUB by right-clicking the applet in the task tray and selecting **Quit**.
2. Navigate to **C:\Users\[USERNAME]\AppData\Local\LGHUB**, where [USERNAME] will be specific to your account.
3. Find settings.db and make a copy and back this up somewhere on your computer. The Desktop is a good place so you can find it easily.
4. Navigate to **C:\Users\[USERNAME]\AppData\Local\LGHUB**, where [USERNAME] will be specific to your account.
5. Delete the **settings.db** file in the LGHUB folder.
6. Run G HUB. You will notice that all the settings have been set back to default and the settings.db file has been rebuilt.

### Restoring your old settings

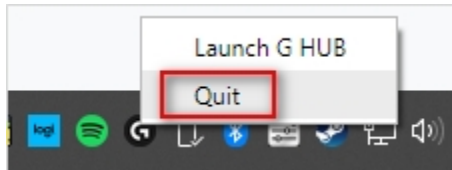
If you want to restore your old settings:

1. Quit G HUB.
2. Copy and paste the backup of settings.db that you saved earlier into the **C:\Users\[USERNAME]\AppData\Local\LGHUB folder**.
3. Run G HUB — your old settings should be restored.

- G HUB freezes while loading and logo animation loops

If G HUB seems to be stuck while trying to load and the logo animation loops, try the following:

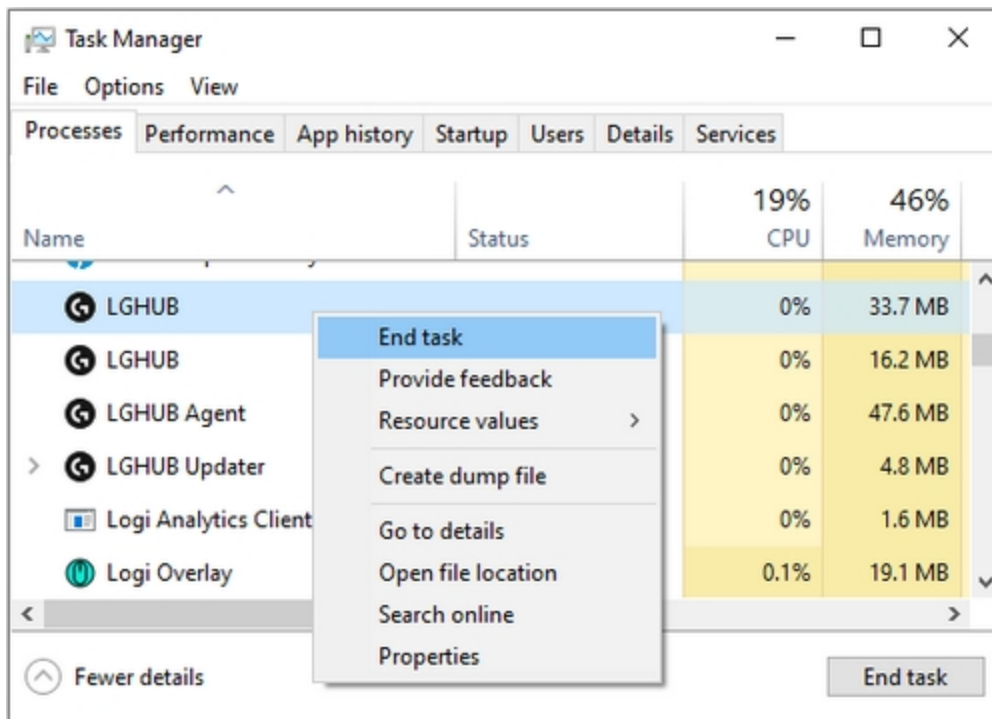
1. Exit G HUB by right-clicking the applet in the task tray and selecting **Quit**.



2. Navigate to Task Manager (CTRL+ALT+DEL).

**NOTE:** You may also need to click More Details at the bottom of the window

Look for LGHUB, LGHUB Agent and LGHUB Updater, right-click and choose End task on each.



3. Once those processes are ended, navigate to C:\Program Files\LGHUB and run these in order:
  - Lghub\_updater.exe
  - Lghub\_agent.exe
  - Lghub.exe

This should resolve the logo spinning issue. If it doesn't, then make sure you're running with admin privileges. G HUB might need to update and needs admin privileges to do this.

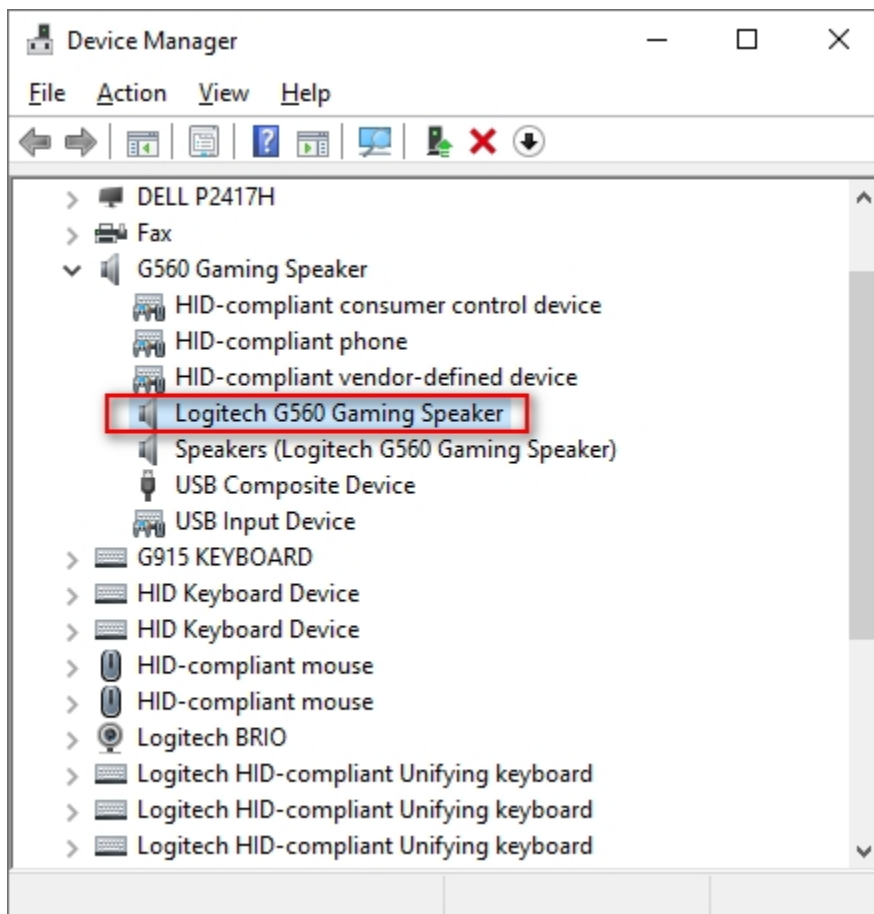
If you're using an administrator account and the issue persists, please follow the steps in [G HUB Install/Uninstall/Update Troubleshooting](#).

- Audio device not recognized

If you have problems with a headset or speaker, the following:

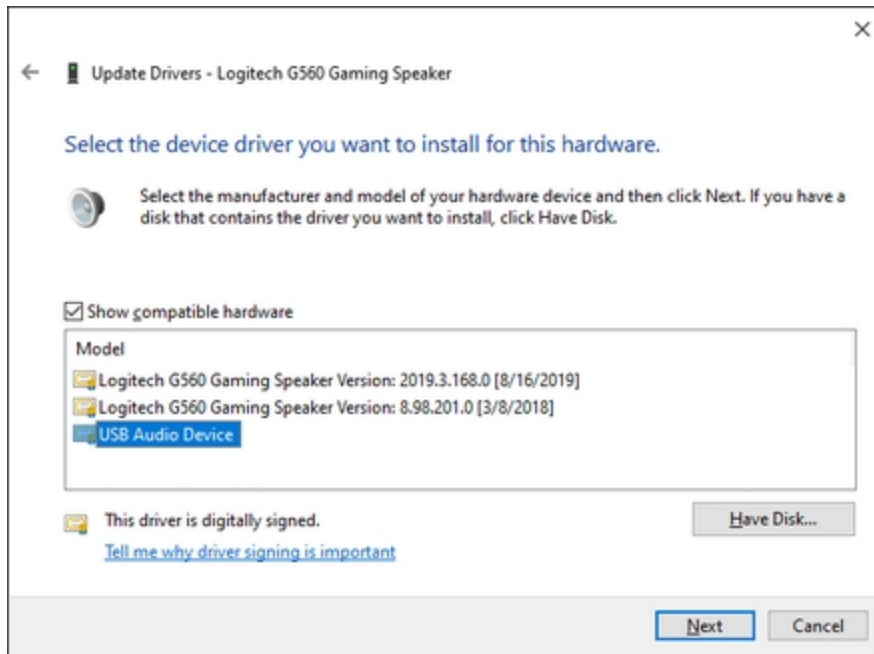
Revert back to Microsoft drivers:

1. Go to **Device Manager (WIN+PAUSE|BREAK)**.
2. Click on the **View** tab at the top and select **Devices by container**.
3. Look for your headset/speaker and expand it. You are looking for the named device, for example, Logitech G560 Gaming Speaker or Logitech Pro X Gaming Headset.



4. Right-click and click **Properties** and then select the **Driver** tab.  
The **Driver Provider** should be Logitech — if it's Microsoft you don't need to change the driver.

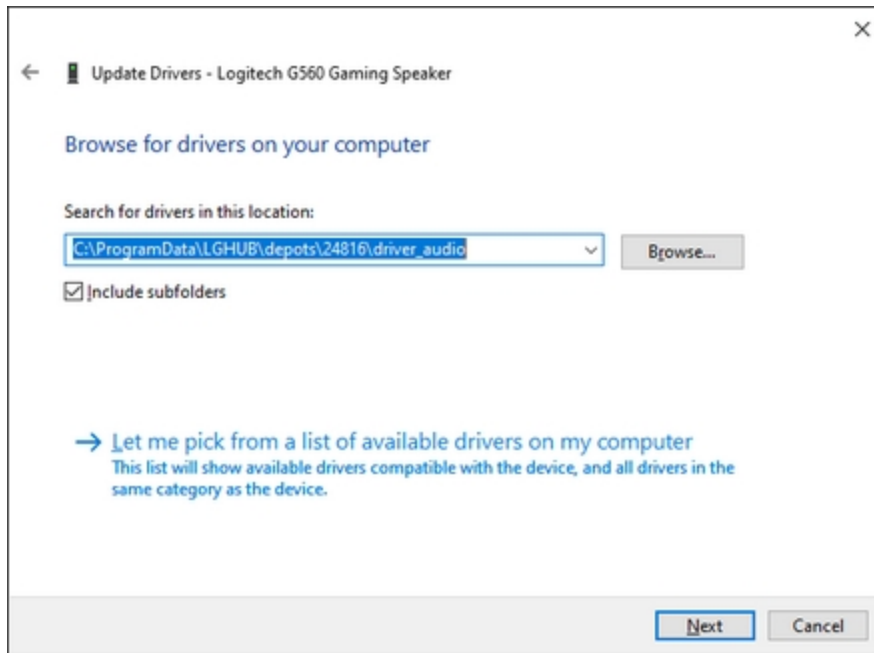
5. If the driver is Logitech, click **Update Driver** and then **Browse my computer for driver software** > **Let me pick from a list...** > and choose **USB Audio Device**.



6. Click **Next**. This should update back to Microsoft's standard drivers.

Update to latest Logitech Audio Driver:

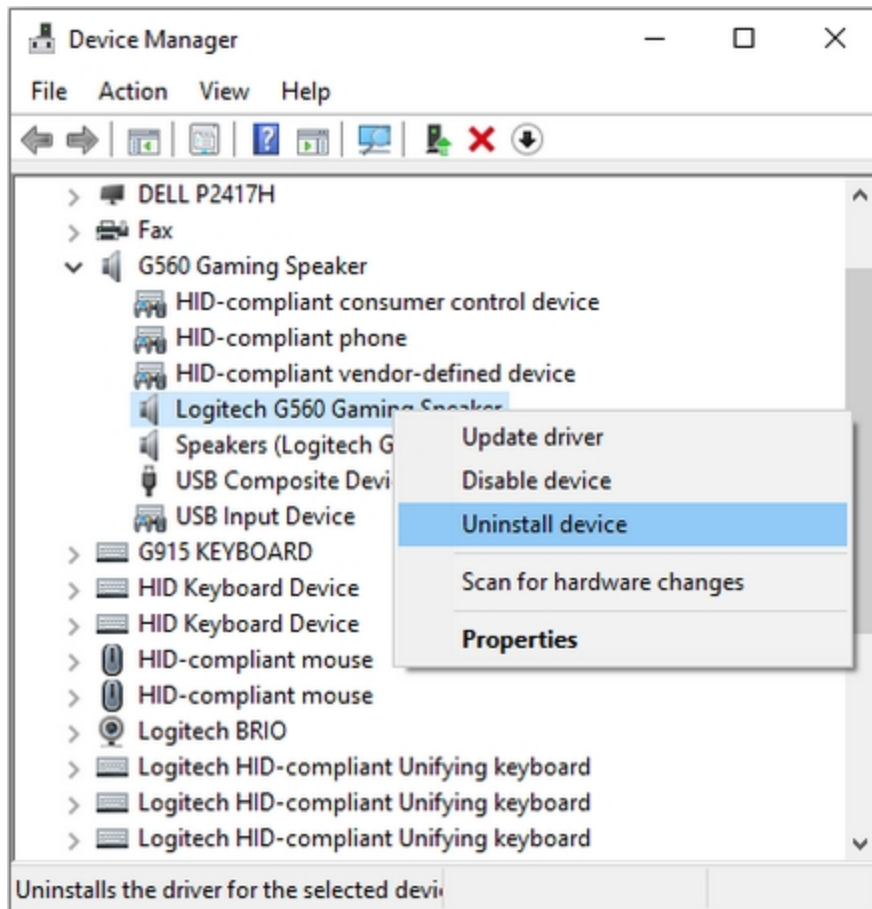
1. On the same device in **Device Manager**, right-click on **Properties** and then click the **Driver** tab.
2. Click Update **Driver** > **Browse my computer for driver software**.
3. Click the **Browse** button to the right of Search for drivers in this location:  
 Navigate to: C:\ProgramData\LGHUB\depots\2xxx\driver\_audio\ (note that although the five-digit number might be different, you are looking for a folder containing the driver audio folder).



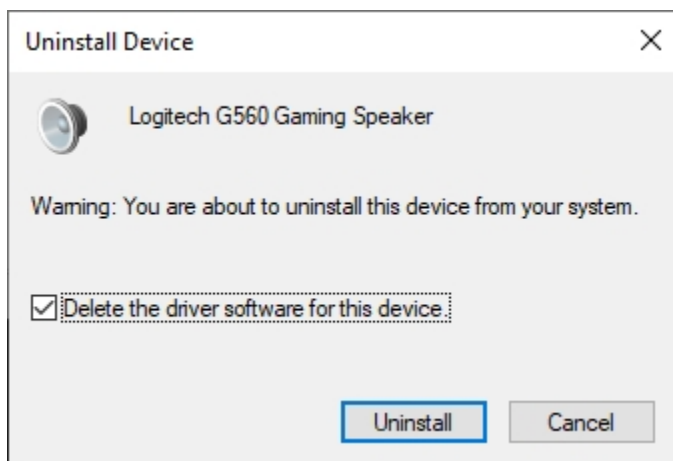
4. Click **Next** to update to the latest audio driver.

If issues persist:

1. Go to **Device Manager** (**WIN+PAUSE|BREAK**).
2. Click on **View** at the top and select **View devices by container**.
3. Look for your device in the list and expand it. You are looking for the named device, for example, Logitech Pro X Gaming Headset, or Logitech G560 Gaming Speaker.
4. Right-click and select **Uninstall device**.



5. Check **Delete the driver software for this device** and then click **Uninstall**.

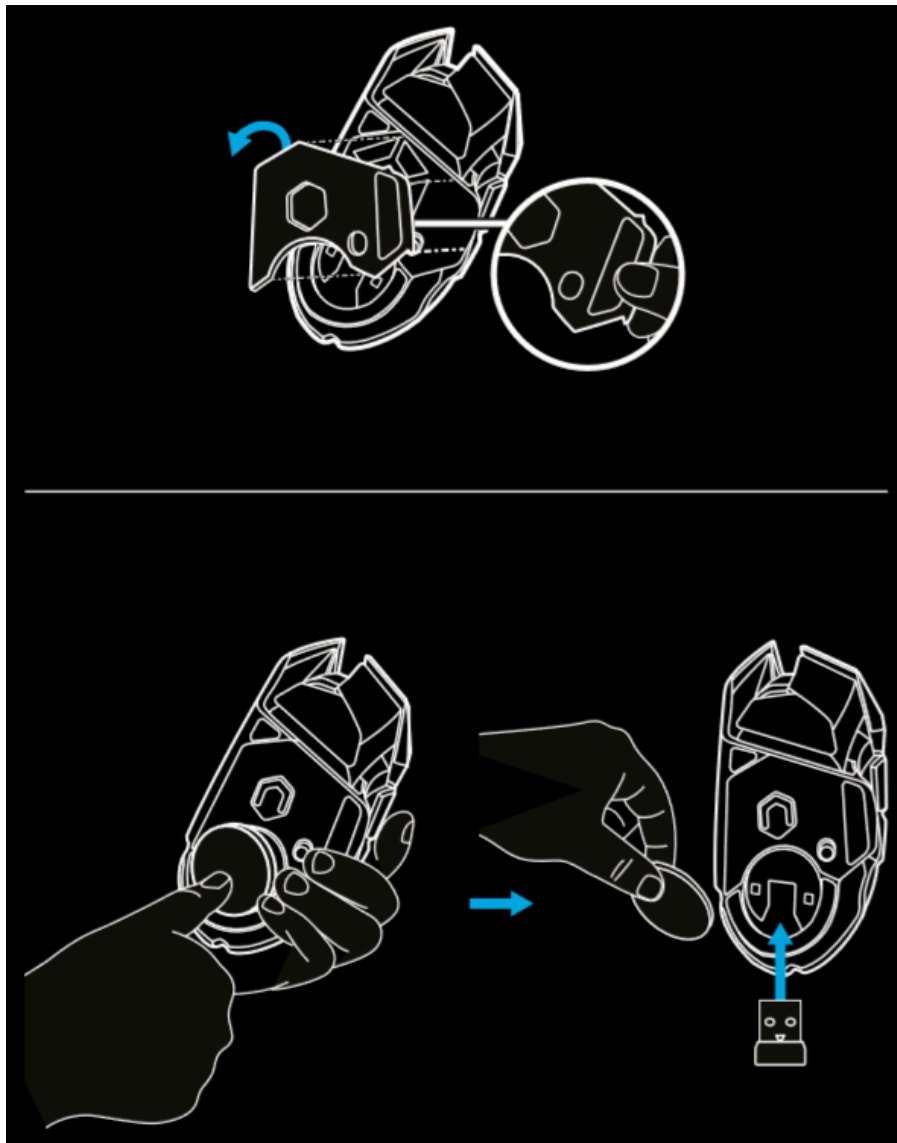


6. Unplug the device and plug it back into a different USB port. It should re-enumerate and be detected in G HUB.
7. G HUB should then download the driver for your device.

- [G502 LIGHTSPEED Weight Customization, Receiver Storage, and POWERPLAY](#)

#### G502 LIGHTSPEED Weight Customization, Receiver Storage, and POWERPLAY

1. The upper weight door can be opened by pulling on its right edge.
2. 4x 2-gram weights can be added.
3. The lower weight and receiver storage cover can be opened by pressing inwards at the bottom of the cover with the thumb and pulling it out with the other hand.
4. 2x 4-gram weights can be added inside the receiver storage cover.
5. The receiver storage cover and weights can be replaced by the POWERCORE adapter available with the POWERPLAY wireless charging system (sold separately).



- G502 LIGHTSPEED DPI/Onboard Profile Indicators

You can customize the onboard profile settings using the Logitech G HUB.

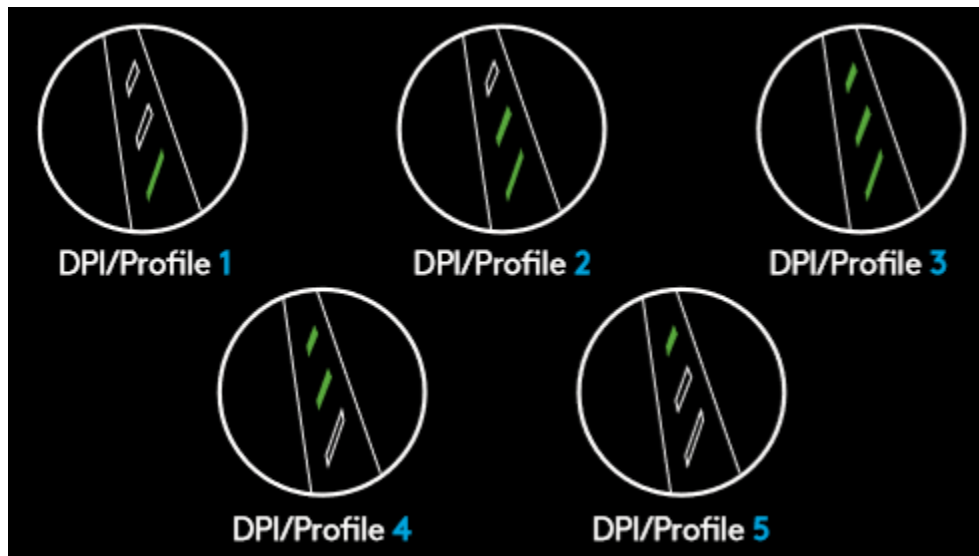
These settings include button programming, report rate, performance/endurance modes and tracking behavior.

G502 LIGHTSPEED allows up to 5 DPI settings. By default, G502 LIGHTSPEED has the following settings:

- DPI: 400/800/1600/3200/6400
- Report rate: 1ms

Tips:

- G502 LIGHTSPEED has 1 on-board profile by default but supports up to 5 onboard profiles
- Extra profiles can be added using Logitech G HUB.
- DPI/Onboard profiles are shown using three LEDs above the thumb buttons.
- The illustrations below show which values are being indicated by the LED panel.



- G502 LIGHTSPEED Charging/Data Over Cable

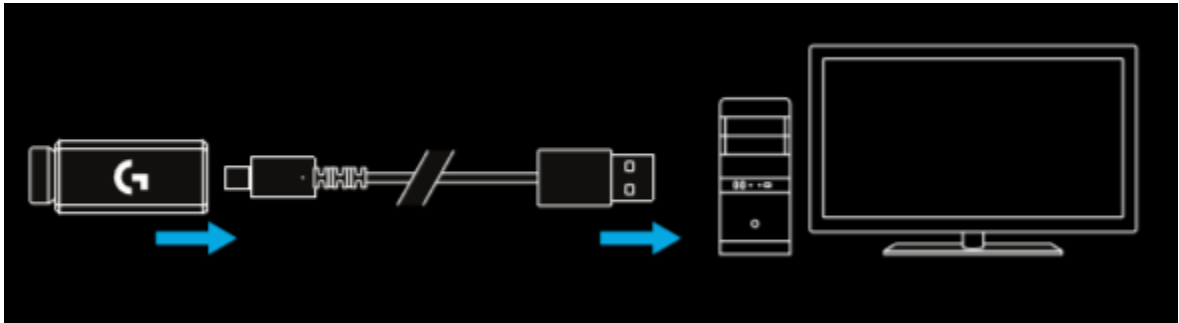
Plug your mouse in via the provided USB charging cable when the battery is low. G502

LIGHTSPEED is also compatible with the Logitech G POWERPLAY wireless charging system. (sold separately).

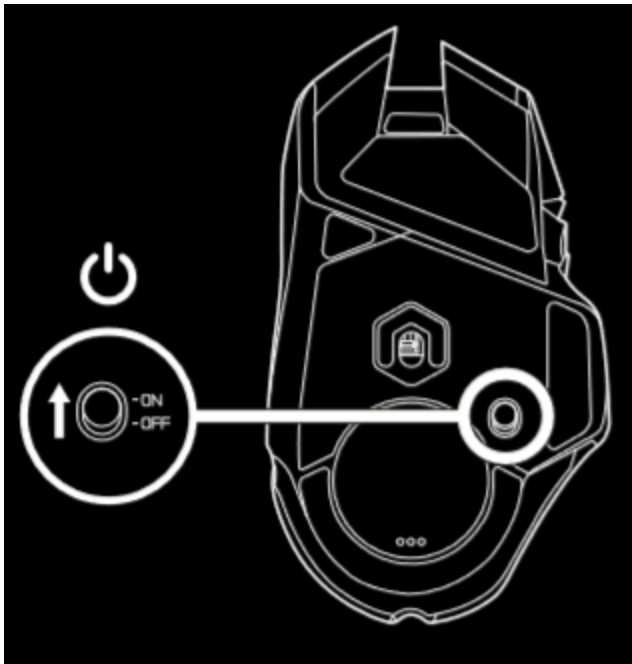


- G502 LIGHTSPEED Setup Instructions

1. A wireless receiver attached to the USB adapter can be found in the accessory box. Plug one end of the cable into your PC, and the other end into the USB adapter and receiver – The receiver can also be used plugged directly into your PC. However, using the cable and adapter when in wireless mode is recommended and allows for better connectivity and easy access to the cable for recharging.



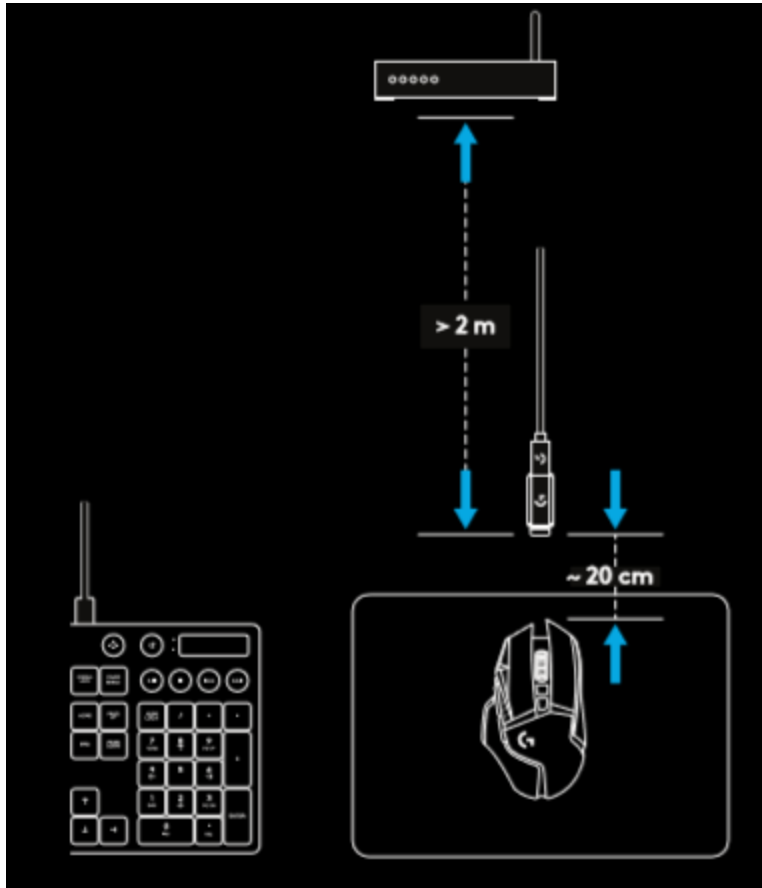
2. Turn the mouse on via the switch on the bottom of the mouse.



3. Download [Logitech G HUB](#) gaming software.
4. To charge, disconnect the cable from the adapter and plug into the front of the mouse.
5. Your mouse will operate in data-over-cable mode whenever it is plugged in directly to a PC. Full charge from empty requires around 2 hours plugged into a PC USB port.

### Tips:

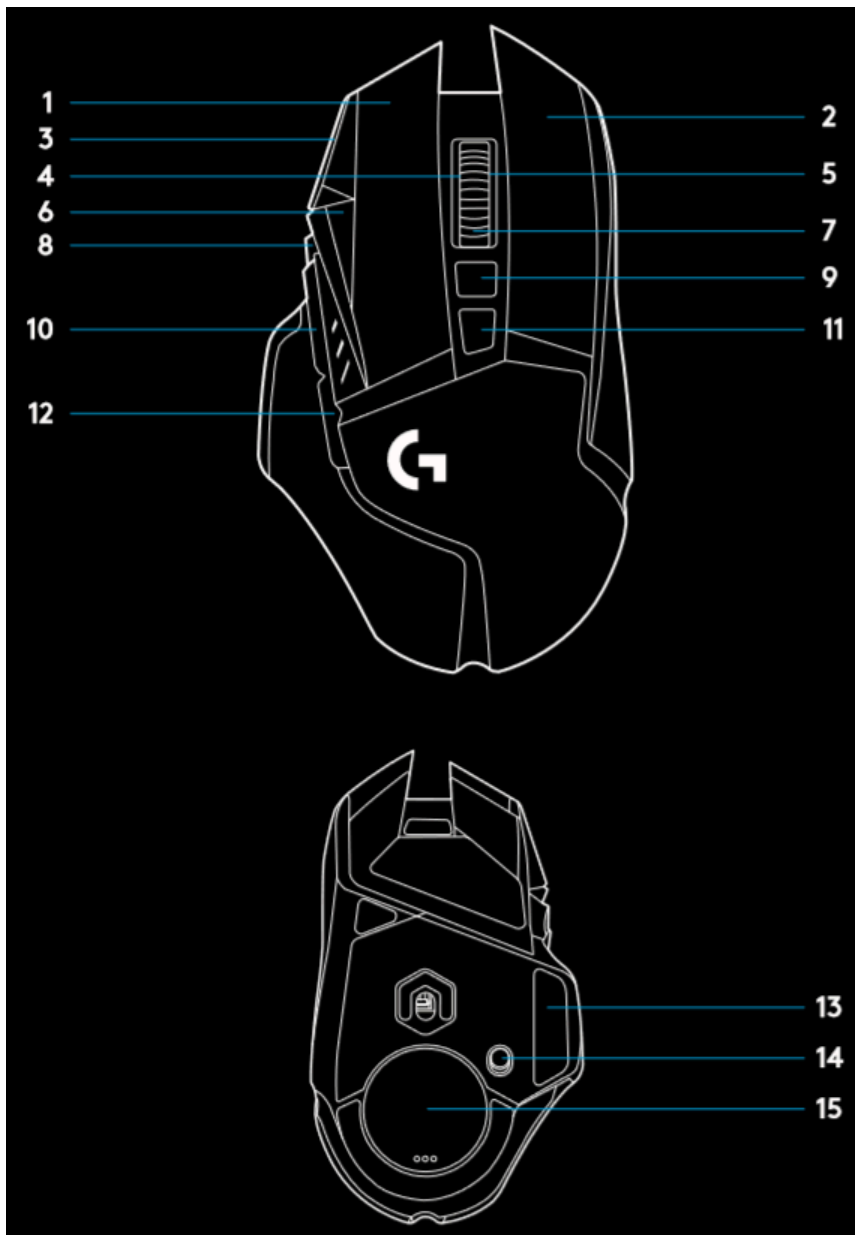
1. Keep the mouse and receiver 2 m+ away from wireless routers or other 2.4GHz wireless devices to minimize environmental noise.
2. G502 LIGHTSPEED has a wireless range of up to 10 meters. To ensure optimal performance in noisy wireless environments, and to keep the charging cable easily accessible, it is recommended to keep the receiver within 20 cm of the mouse.



### • G502 LIGHTSPEED II Fully Programmable Buttons

- |                               |                                       |
|-------------------------------|---------------------------------------|
| 1. Left click<br>(Button G1)  | 4. Scroll left<br>(Wheel tilt left)   |
| 2. Right click<br>(Button G2) | 5. Scroll right<br>(Wheel tilt right) |
| 3. DPI up<br>(Button G8)      | 6. DPI down<br>(Button G7)            |

7. Middle click (Button G3)
8. DPI shift/Sniper button (Button G6)
9. Wheel mode toggle button (not programmable)
10. Forward (Button G5)
11. Battery status (Button G9)
12. Back (Button G4)
13. Upper weight door (bottom of mouse)
14. On/Off switch (bottom of mouse, not programmable)
15. Lower weight and receiver storage door (bottom of mouse)



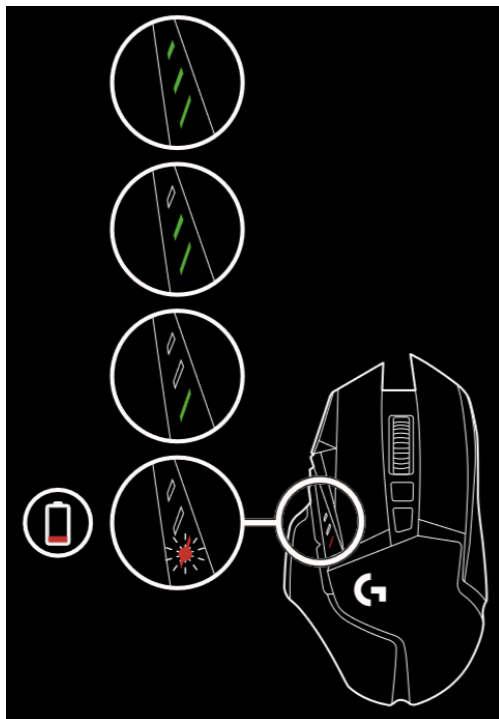
- G502 LIGHTSPEED Battery Life

G502 LIGHTSPEED has a rechargeable 250mAH LiPol battery which provides it with up to 55 hours non-stop gaming at 1ms report rate with lights off, or 48 hours non-stop gaming at 1ms report rate with RGB color cycling on.<sup>1</sup>

- Charge level can be checked when the mouse is powered on or by pressing the G9 button or using Logitech G HUB to assign a button to check charge level
- Charge level is displayed for seven seconds at mouse power-on using the color and number of bars illuminated on the DPI indicator:
  - 3 green lines = 50–100%
  - 2 green lines = 30–50%
  - 1 green line = 15–30%
  - 1 flashing red line = <15%

Tips:

- The bottom dot will flash red when the battery is at 15% or less. When this happens, plug in your mouse to charge.
- Charge level, power draw, and estimated remaining battery life can be checked in Logitech G HUB.



<sup>1</sup> Battery life and capacity may vary with age and use. Rechargeable batteries have a limited number of charge cycles.

- [Logitech G HUB – FAQs](#)

**VIDEO:** [youtu.be/a5a4iAhTaho](https://youtu.be/a5a4iAhTaho)

## About G HUB

See the following link for more information:

<https://support.logi.com/hc/en-us/articles/4461144061975-Logitech-G-HUB-FAQs>

## WARRANTY – G502 LIGHTSPEED Wireless Gaming Mouse

[2 year limited hardware warranty](#)

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Check our Logitech Warranty here:

<https://support.logi.com/hc/en-us/articles/360023361413-Warranty-FAQ-AMR-AP>

## CONTACT US

Would you like to speak with us? We're here to help.

Get 24/7 live support with chat here: [logitech.com/support](https://logitech.com/support)

Phone: (Local) +1 646-454-3200

(Toll Free) +1 866-632-5644

Monday – Friday:

**9:00 a.m. – 9:00 p.m. Eastern Time**

## DOWNLOAD

See here to download G Hub:

[logitechg.com/ghub](https://logitechg.com/ghub)