

# iBUYPOWER Troubleshooting Guide

## Troubleshooting 102: No Power

The purpose of this guide is to provide thorough and detailed troubleshooting for when your PC is not powering on. As a 100 level guide, this should be accessible to all users.

### Tools Required

- Clean and dry hands
- Philips head screwdriver

### **\*\*Important Notes\*\***

***Read through this guide in its entirety before starting. No matter how confident you are, please do not skip a single step unless the guide tells you to. All steps in this guide are included deliberately and skipping steps can result in the guide being ineffective.***

***Always make sure the computer is completely off and unplugged while working inside of it.***

***If you ever feel the slightest bit uncomfortable or unsure, please reach out to our Tech Support team either through Live Chat, Email, or Phone.***

## No Power:

### The Basics

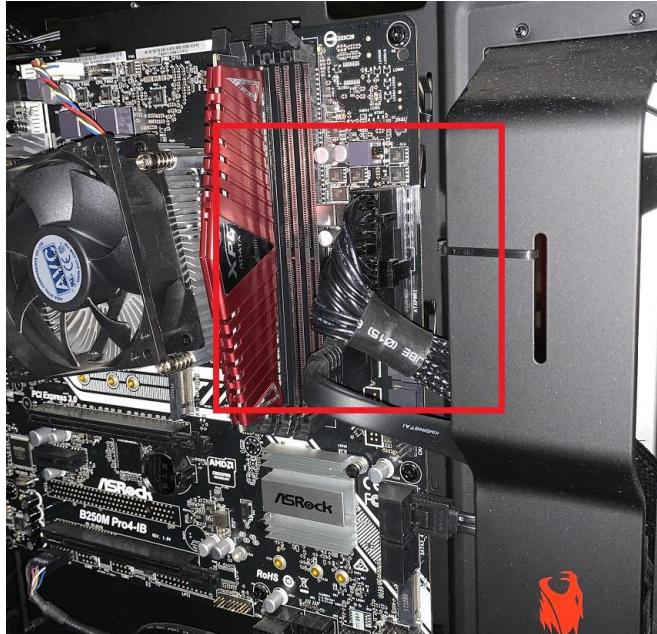
Please make sure you have reviewed Troubleshooting 101: First Boot and Troubleshooting 100: Unboxing before proceeding with this guide.

On every power-on cycle, the PC will go through 3 important steps. This guide only covers a scenario with “No Power”. For No POST or No Boot, refer to guides 103 and 104 respectively.

- **Power** – PC is receiving power from the power supply. Usually some LEDs will light up and fans will begin to spin.
- **POST** – (Power On Self-Test). The PC’s motherboard will initialize and check all attached hardware. Your display will activate, usually showing a company logo. POST is required to access the system’s BIOS.
- **Boot** – If your PC has an operating system (like Windows), it has successfully booted once you are on your desktop or login screen.

### Check Motherboard 24 Pin Cable

There may be a loose or jammed cable inside the computer causing it not to power on. If you are comfortable working inside the computer, unplug it and remove the side panel. Looking inside the case, locate the 24-pin ATX power cable on the right edge of the motherboard.



*Figure 1 - Motherboard 24 pin power connector*

Most power supply plugs have a clip that you have to squeeze in order to pull it out. Squeeze the side of the clip that is closest to the wires as you pull on the plug. If you have difficulty pulling the plug out, rock it gently from top to bottom as you pull. Just because the plug feels very tight to you does not mean it is plugged in properly -- it is still important to actually reseat the cable, if you can manage it. After doing that, plug in the power cord to the back of the computer, double check the hard switch is pushed down to the on position, then push the power button on top/front of the computer tower.

### Check Power Button Cable

If the 24-pin ATX cable is seated properly, there is only one other cable that might be causing a no power issue. This will be the power button (also known as the "soft switch") cable, that connects the front/top panel button to the motherboard. If that cable gets disconnected or broken, then the computer will not respond when you push the soft switch, even if the hard switch on the power supply is pushed to the on position. Different models of motherboard can vary, but for the most part the Power SW cable is plugged into a set of JFP1 pins located around the bottom right corner of the motherboard. You will see a set of multiple skinny, black wires plugged into two rows of pins.

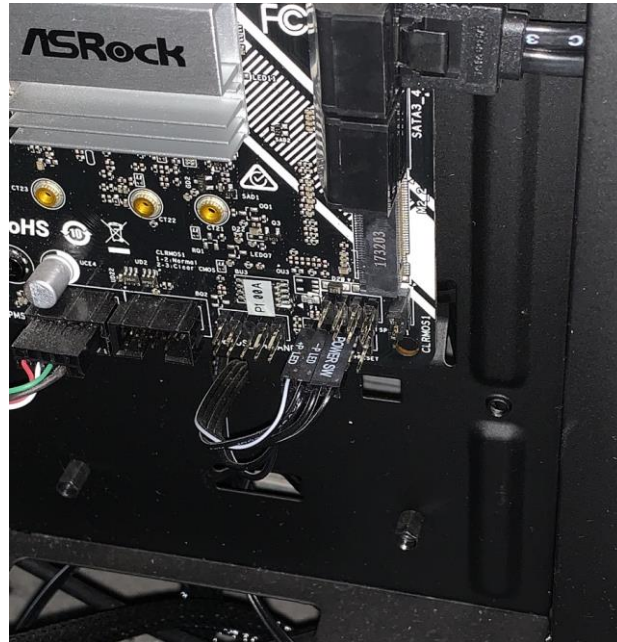


Figure 2 - Front panel headers

If you find those skinny, black wires just loose and dangling, you have likely found the issue as to why the computer doesn't power on. Check the plug at the end of each cable and you will find white writing on it. Specifically, you will want to find the one labeled 'power sw' or 'pw sw'. This is the cable for the power button, and it needs to be plugged in the top row, pins 3 and 4 counting left to right.

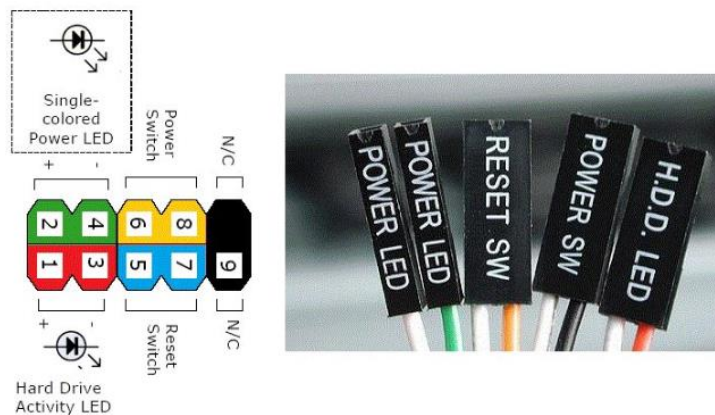


Figure 3 - Front panel header diagram

The rest of the plugs are not important to power on the computer, so for now just leave them be. Plug back in the power cord, make sure the hard switch is pushed down to the on position, then push the power button located on the top or front panel of the PC.

### Additional Guides

If this guide was not effective, for additional steps you may reference Troubleshooting 201: Advanced Power and POST Issues.