

Strange Errors with Electronics

There are times throughout life, when something throws an error or says it has some crazy problem... *Now what?*

It doesn't matter what was going on or why, any time that a piece of electronics says there is a problem, my first line of defense is the old catch phrase from IT Crowd: "Hello, IT. Have you tried turning it off and on again?" [YouTube Link to Video](#)

I realize how stupid and basic this sounds... really I do. Unfortunately there is often a reason for clichés, and this is one of those.

Any electronic equipment typically has some kind of processor inside and as we all know it is unreasonable to expect those processors NOT to have the occasional error. Processors are having and recovering from errors all the time, however when those errors are found & corrected on the fly, end users never even know anything happened.

The simplest way to combat the occasional uncorrectable or strange error/issue is to power cycle everything. This way, if we see the same problem again we know it *IS a problem*, and not likely to be a random bug or other temporary error.

The best practice:

- Make the room quiet
 - Every part peripherally connected to the system needs to be off before anything gets powered back on (Some things rely on others)
- Revel in the silence
 - Wait a minimum of 10 seconds with everything fully powered OFF. This ensures that all volatile memory has been completely cleared away
- Crawl before Running
 - Begin turning on equipment by waiting for each piece to complete it's boot process before powering on the next
 - I start with the smartest equipment first, leaving the dumbest devices for later because the smart ones are sometimes needed to tell the dumb devices how to power up and connect etc.

- **Example:** Raspberry Pi (Octoprint), 3D Printer, Lights, Chamber Heater, Dehydrator, Air Filter, etc. as needed

Revision #26

Created 19 August 2023 12:57:39 by smokintbird

Updated 30 March 2024 18:29:49 by smokintbird