

AIM

Power interruption in WiFi router causes network blackout and this in turn causes failed downloads, errors in video and audio stream.

An UPS stand for Uninterrupted Power Supply. It is used to power critical devices like computers, servers and network hard disks to prevent data loss. The conventional UPS(s) outputs 230VAC hence are used to power 230V loads. These devices essentially have a big 12V lead acid battery, an inverter and a step-up transformer. This makes the device big and heavy. There are many power critical appliances that run on 12VDC. This project aims to develop a 12V UPS for power-critical devices like routers and other DC loads.

Requirements or Features

- Smaller Profile
- Portable
- Light-weight
- Less Heat

Components Used

- Lithium-Polymer Battery
- TP4056 Module
- LM7805 Linear Regulator
- 5V Relay
- Variable Boost Converter