

CLAIMS:

1. A system for sharing a power delivery controller, comprising:
a plurality of ports; and
a power delivery controller communicatively coupled to the plurality of ports, and the power delivery controller is to:
rotate between the plurality of ports to determine a particular port of the plurality of ports that has access to the power delivery controller;
negotiate with the plurality of ports by advertising capabilities of a computing device that comprises the power delivery controller and the plurality of ports at each port of the plurality of ports;
send a first message to the particular port of the plurality of ports; and
remain connected to the particular port and enable power delivery to the particular port in response to a particular return message from the port.
2. The system of claim 1, wherein the plurality of ports is connected to a cable.
3. The system of claim 1, wherein the plurality of ports is connected to a plurality of devices.
4. The system of claim 1, wherein the return message is a GoodCRC message.
5. The system of claim 1; wherein the return message is a Request message.
6. The system of claim 1, comprising a plurality of dead battery (DB) modules corresponding to each of the plurality of ports, wherein each DB module is to enable charging of the system.
7. The system of claim 6, wherein the DB modules are to emulate a minimal portion of a USB PD controller to support dead battery operation.
8. The system of claim 1, wherein a second power delivery controller is communicatively coupled to the plurality of ports, and the power delivery controller or the second power delivery controller are connected to the particular port.
9. A method for sharing a power delivery controller, comprising:

polling a plurality of Universal Serial Bus (USB) ports by rotating between the plurality of ports to determine a particular port of the plurality of ports that has access to the power delivery controller;

negotiating with the plurality of ports by advertising capabilities of a computing device that comprises the power delivery controller and the plurality of ports at each port of the plurality of ports;

sending a first message to each port of the plurality of USB ports; and

coupling to a particular port of the plurality of ports in response to a return message from the particular port, wherein power is delivered to the particular port.

10. The method of claim 9, wherein the plurality of ports is a group of ports connected to a plurality of cables.

11. The method of claim 9, wherein the plurality of ports is a group of ports connected to a device plurality of devices.

12. The method of claim 9, wherein the return message is a GoodCRC message.

13. The method of claim 9; wherein the return message is a Request message.

14. A tangible, non-transitory, computer-readable medium comprising code to direct a processor to:

rotate between a plurality of ports to determine a particular port of the plurality of ports that has access to the power delivery controller;

negotiate with the plurality of ports by advertising capabilities of a computing device that comprises a power delivery controller and the plurality of ports at each port of the plurality of ports;

send a first message to the particular port of the plurality of ports;

couple to the particular port of the plurality of ports in response to a return message from the port; and deliver power to the particular port.

15. The computer-readable medium of claim 14, wherein the processor is a power delivery controller.

16. The computer-readable medium of claim 14, wherein the processor is a power delivery controller and the power delivery controller is to send a message to the plurality of ports, and couple with a port in response to a device requesting power at the port.

17. The computer-readable medium of claim 14, wherein the plurality of ports is a group of ports connected to a plurality of cables.

18. The computer-readable medium of claim 14, wherein the plurality of ports is a group of ports connected to a plurality of devices.

19. The computer-readable medium of claim 14, wherein the return message is a GoodCRC message.

20. The computer-readable medium of claim 14; wherein the return message is a Request message.