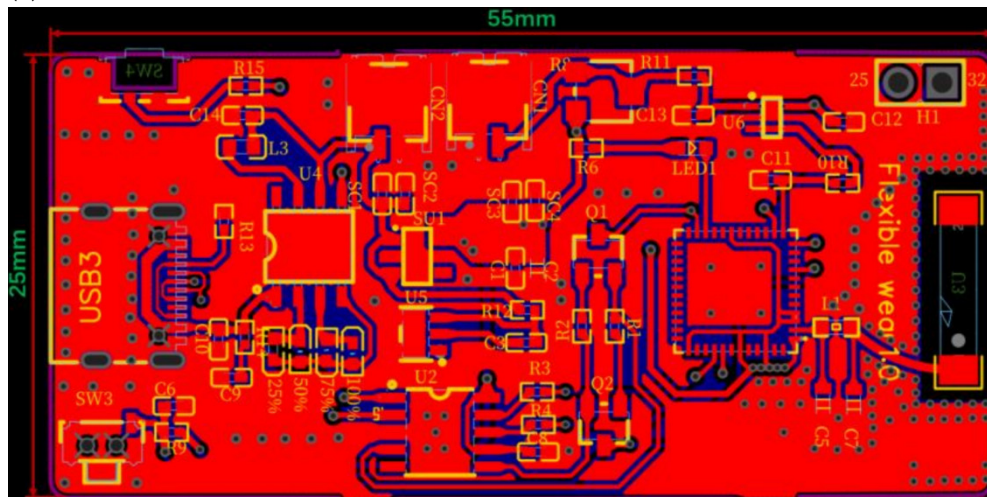
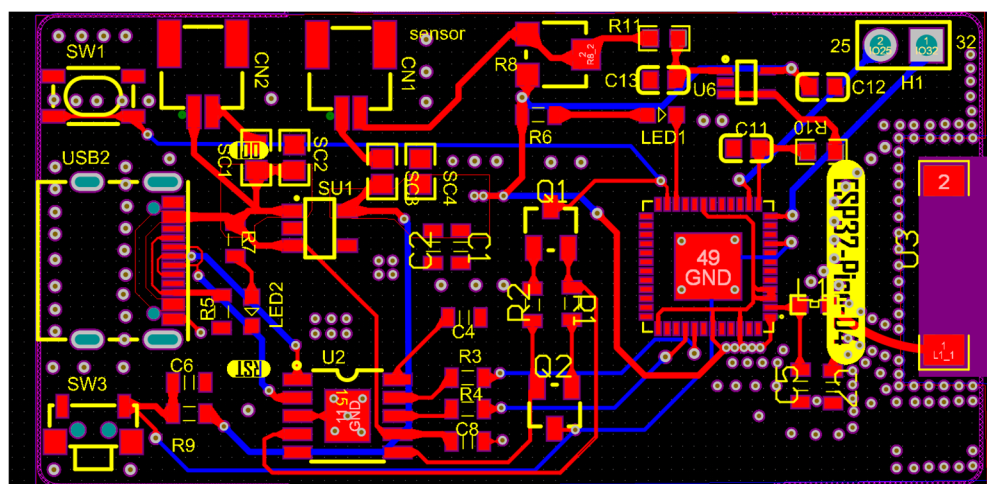


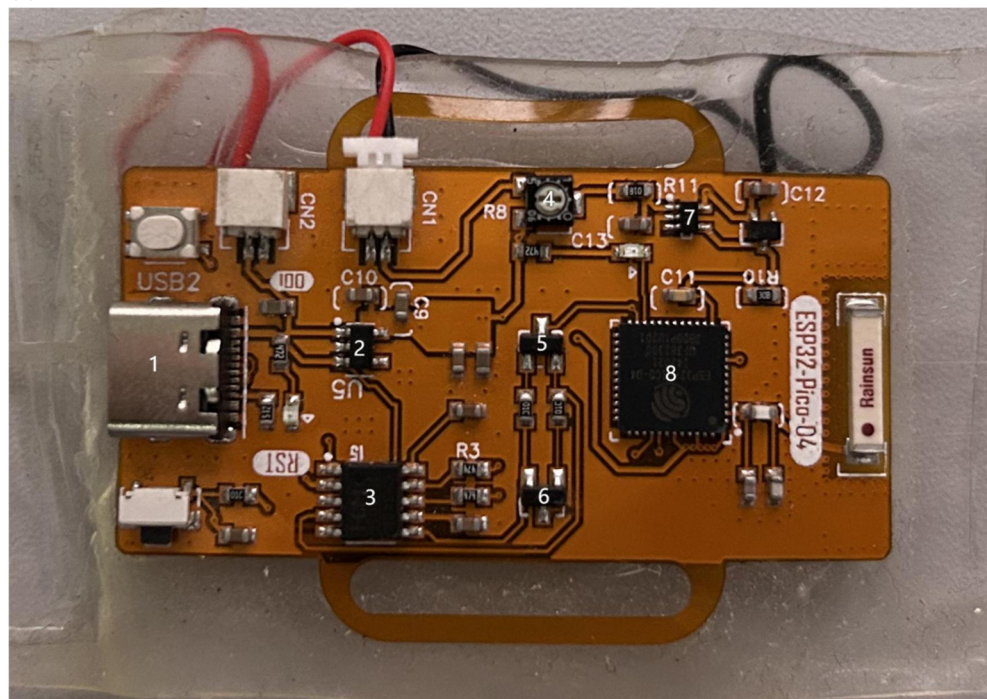
(a)



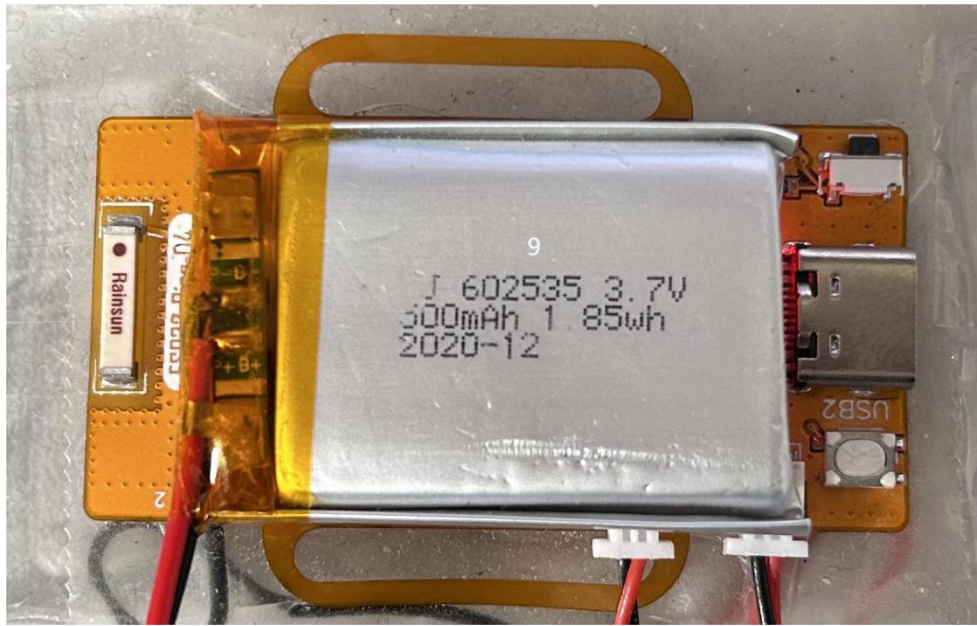
(b)



(c)



(d)



Supplementary Figure S1 | Layouts of the FPC board. (a) Layouts of the FPC board with coppering (b) Layouts of the FPC board without coppering (c) Photos of the FPC board with key components (Supplementary Table S1) labeled (d) Photos of power supply module connecting with FPC board.

Supplementary Table S1 | Key components used in the control electronics. All of the components are commercially off the shelf.

Component designator	Description	Manufacture product number
1	USB connector	TYPE-C 16PIN
2	Voltage regulator	SPX3819M5-L-2.2/TD
3	USB chip	CH340K
4	Variable resistor	G32AT-B105
5,6	Transistor (NPN)	S8050-J3Y
7	Operational amplifier	AD8555ARZ
8	MCU and bluetooth module	ESP32-PICO-D4
9	Power supply module	Li battery

