

Sony RX0 Dummy Battery

Parts required

- 3D printed battery case (ABS)
- 26 AWG silicon wire (red, yellow? and black. I have used yellow to distinguish between the 4V dc and the battery voltage)
- JST connector
- DimensionEngineering SWADJ3 adjustable voltage regulator <https://www.dimensionengineering.com/products/de-swadj3>
- Female JST-XH connector for connections to Lipo Balance lead.
- 3Pin JST-XH to connect to voltage regulator
- 100k Ω Resistor
- Copper/brass sheet.
- Superglue
- Hot Glue

Instructions.

1. Print 3d case and cover in ABS. Set at 100%infill
2. Cut small brass/copper sheet into squares that fit inside the battery case recesses.
3. Solder a yellow 100mm long copper wire cable to the positive terminal copper pad.
4. Solder a black 100mm long copper wire to the ground pad along with one leg of the 100kohm resistor. The legs may need to be trimmed shorter
5. Solder the other leg of the 100kohm resistor to the remaining centre pad.
6. Install the pads into the dummy battery housing, ensure the contacts and resistor are not shorting and use liberally squirt hot glue to hold in place.
7. Install the male JST connector on the power leads.
8. Install dummy battery cover and secure with a few drops of super glue
9. Cut 2 x 100mm silicon wires (black and red) Solder the wires to the GND pin and the opposite Voltage pins on the JST-XH connector. This will give you full battery voltage across all cells.
10. Solder both black GND wires (from the battery and the dummy camera connector) to the GND pin on the 3 pin male JST-XH connector
11. Solder the red battery cable to the corresponding Vin pin on the 3 pin male JST-XH connector
12. Solder the yellow wire from the dummy battery connector to the Vout pin on the 3 pin male JST-XH connector
13. Plug the voltage regulator into the battery, but **leave the dummy battery disconnected** and using a multimeter at the red JST connector, turn the pot to adjust the output voltage to 4V. Also check the polarity.





