## BTH011-BK headset circuit principle description

- 1 The headset uses the CSR chip 57F687 (U1) with bluetooth V2.1+EDR protocol.
- 2 Rechargeable polymer li-ion battery supplies power for the headset, the voltage is 3.7V, the polymer li-ion battery is charged by external DC 5V through IC (U1) pin 39,the current and voltage is managed by U1.
- 3 L1,C5 and IC internal circuit make up of BUCK circuit and convert the LI-ION battery's voltage to 1.8V supply for U1 and U2.
- 4 Y1 crystal oscillator (16M) supply clock frequency for bluetooth IC (U1),and through multiplicator provide 2.441G frequency for radio
  - 5 R6,C15,R8,Q1compose the pulse reset circuit.
- 6 The antenna is made on the PCB panel with FLTI, L3, C14, L4 matched for the 50omh impedance 2.441G selected frequecy net.
  - 7 E<sup>2</sup>PROM (U2) is used to store the custom parameter by user.
  - 8 Antenna Gain:0.5dBi
  - 9 USB is for charging only without data exchange