

Description of transmitter

1. Power supply : 12V/200mA AC//DC adapter or size “AAA” battery x 6.
2. U3 is a 9V DC regulator, supply the power to circuit
3. SW1 is the power ON/OFF switch
4. U4 is a 3.3V DC regulator, supply the power to U1 and U2 consume.
5. Audio from the J1 jack, U2 is a audio stereo encode ICs ,U1 is a PLL ICs, it's lock the work frequency 49.85MHz.
6. Q3 with assistant components composing a oscillator, with the U1 tuned to 49.85MHz .
7. Q2 with assistant components composing RF preamplifier
8. Q1 with assistant components composing RF power amplifier
F1 is a band filter, it's resonance to 49.85MHz, E1 radiate the RF power.
10. Antenna impedance : 50 ,RF output power: 100dBu.