iMM377/ iMM378/iSM378

Wireless Stereo Speaker dock for Smartphone

Circuit Description

Emphasized features

- myBOT® Arm Technology - Cradles most smartphones regardless of interface placement.
- Charge via adjustable   microUSB connector,cannot connect to pc to use.
- Wireless audio connection via Bluetooth, working frequency 2400-2483.5MHz. which the BT module use the osc is 26MHz.
- Wired through 3.5mm plug using Aux-input
- Audio control via Bluetooth for Play/pause/receive/end, Next/Previous Track, fwd/rev seek, volume, .
- Built-in microphone with noise and echo cancellation for enhanced speakerphone functionality and convenience.
- Impeccable sound quality for its small size

Features

- Desktop / bedside speaker for your Smartphone
- Plays and charges your Smartphone
- Power On/Off and volume Up/Down, Previous/Next track, Pairing buttons.
- Powerful amplifiers provide better efficiency and performance
- 3.5mm Aux input jack
- Minimize the TDMA noise for compatible with Smartphones.
- No pop noise or no white noise.

Environmental Requirements

- Operating temperature: 32° to 95° F (0° to 35° C)
- Non-operating temperature: -4° to 113° F (-20° to 45° C)
- Relative humidity: 5% to 95% non condensing

User Interface
- Power: On/off/Pair
- Volume +: Increase volume
- Volume –: Decrease volume
- Play/Pause/Call receive/end
- Next Track/FF: Next track or sustain push for fast forward (Bluetooth only)
- Previous Track/Rew: Previous Track or sustain push for rewind (Bluetooth only)

The working frequency range of RF BT_module F3088 is setted from 2402.00MHz to 2480.00MHz, the sepeartion is 1.0MHz and there are 79 channels in total. The working procedures are:

a. When power on, the EUT will scan the whole frenquency until a connection command from the other BT devices.

b. When receiving the signal from the other BT devices, The EUT transmit a response signal..

c. The other devices receive the response signal and recognize it, then send a connection command to establish the connection.

d. After the connection establish successfully, the data transmission is beginning. At the same time, the both devices will shift frequencies in synchronization per a same pseudo randomly ordered list of hopping frequencies, the hopping rate is 1600 times per second. This device conform to the criteria in FCC Public Notice DA 00-705.

e. The bandwidth of the receiver, which is set to a fixed width by the software, match the hopping channel bandwidth of their corresponding transmitter.