

MY81SPK02M2

Bluetooth 3.0+EDR Stereo Audio module

1. General Description

The MY81SPK02M2 Bluetooth module is designed using the ISSC IS1681S chip. The module is highly integrated, compact size, low power and high data rate. It requires very few external components to achieve high quality stereo audio streaming with remote control commands.

The MY81SPK02M2 provides remote control keys, operation status indication pins, stereo audio output, AUX input interface and NFC detection interface.

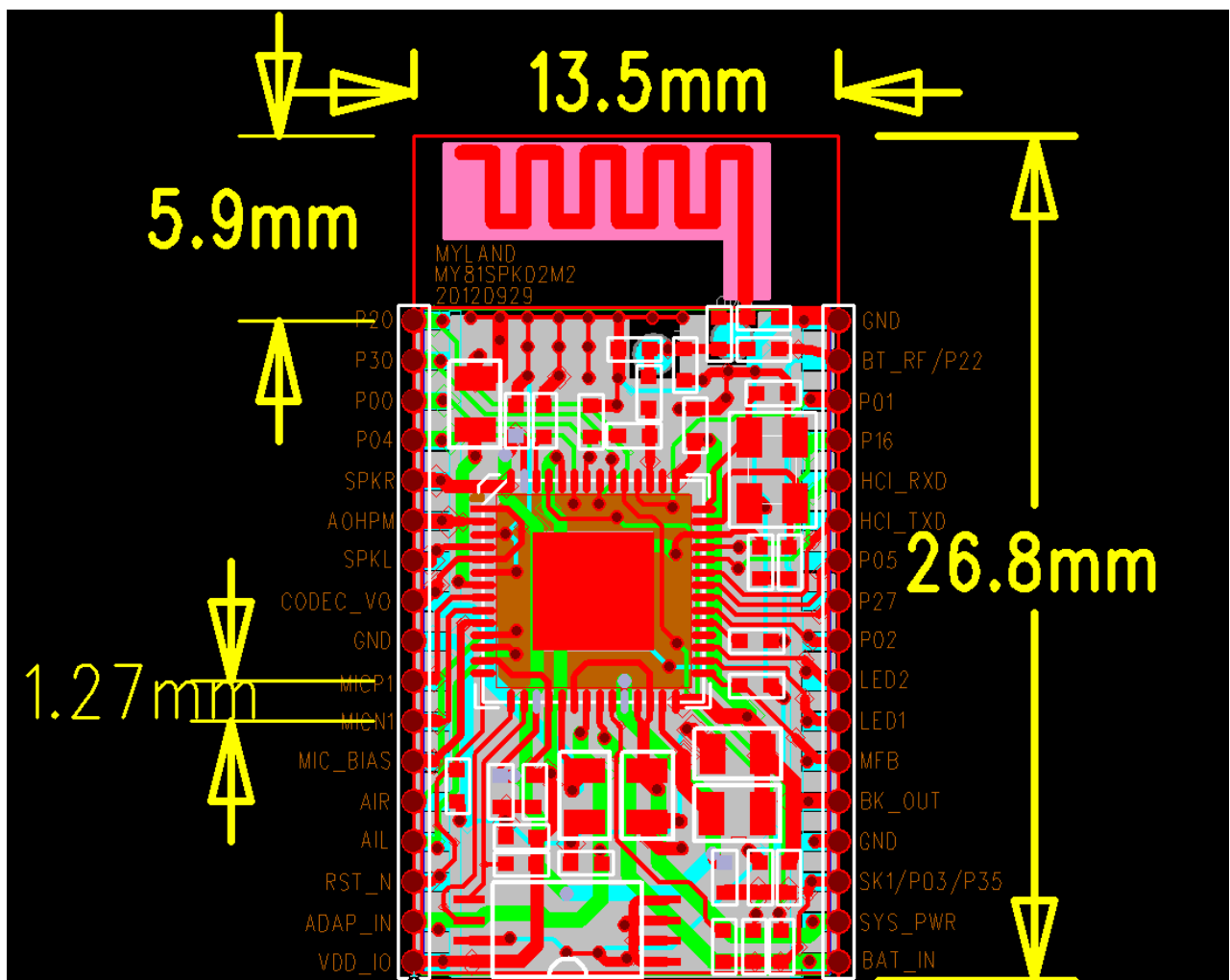
2. Features

1. Bluetooth 3.0+EDR compliant
2. Typical +2dBm Class 2 output power
3. Audio DAC: 94dB SNR
4. Build in Max. 250mAH Li-ion battery charging circuit
5. HSP, HFP, A2DP, AVRCP profile support
6. SBC decode for Bluetooth audio streaming
7. Voice prompt
8. Build in Line in interface
9. Build in MIC circuit
10. AGC/AVC, AEC
11. NFC support
12. EQ control
13. Size: 13.5mm x 26.8mm

3. Application

- High quality stereo headset
- High quality stereo speaker and HiFi
- High quality wireless stereo audio receiver

4. Outline Dimension & Pin Definition



Pin No.	I/O	Name	Description
1	I/O	P20	GPIO, default pull-high input System Configuration, H: Application L: Baseband(IBDK Mode)
2	P	P30	GPIO, default pull-high input Line-in detection, 1: no line-in detected; 0: line-in detected
3	I/O	P00	GPIO, default pull-low input. Slide Switch Detector
4	I/O	P04	GPIO, default pull-high input Audio AMP Enable or NFC detect
5	AO	SPKR	R-channel analog headphone output, single-ended application only
6	AO	AOHPM	Headphone common mode output/sense input
7	AO	SPKL	L-channel analog headphone output, single-ended application only
8	AP	VDDA	Reserve for external cap to fine tune audio frequency response
9	AP	AGND	Audio ground
10	AI	MIC1_P	Mic 1 mono differential analog positive input
11	AI	MIC1_N	Mic 1 mono differential analog negative input
12	AP	MIC_BIAS	Microphone biasing voltage
13	AI	AIR	Stereo analog line in, R-channel
14	AI	AIL	Stereo analog line in, L-channel
15	I/O	RST_N	System Reset Pin
16	P	ADAP_IN	Power adaptor input
17	P	VDDIO	VDDIO pin, for calibration only Do not add external power to this pin
18	P	BAT_IN	Battery input
19	P	SYS_PW	System Power Output
20	I/O	SK1/P03	Default SAR input for battery detection This pin can be re-defined as GPIO P03
21	P	GND	Digital ground
22	P	BK_OUT	Buck feedback sense pin
23	P	MFB	Multi-Function Push Button key Combined Play/Pause key when A2DP enabled.
24	P	LED1	LED Driver 1
25	P	LED2	LED Driver 2
26	I/O	P02	GPIO, default pull-high input PLAY/PAUSE button
27	I/O	P27	GPIO, default pull-high input, Forward button

28	I/O	P05	GPIO, default pull-high input, REW button
29	O	HCI_TXD	HCI TX data
30	I	HCI_RXD	HCI RX data
31	I/O	P16	GPIO, default pull-high input Volume down button
32	I/O	P01	GPIO, default pull-high input Volume up button
33	AIO	BT_RF/P22	NC for on board PCB antenna/ Audio AMP Enable Antenna matching if an external antenna is used
34	P	GND	Digital ground

5. BQB Approval



Qualified Design ID (QD ID)	B020022	Export PICS
PRD 1.0 ID (QP ID)		
Design Name	Bluetooth speaker module (MY8XSPK02M2)	
Wi-Fi® Certification ID		
Subsetting Designs	Date Created	Type
	Sep 23, 2012	Main
		PICS
Member Company	Myland Ltd	
Specification Name	3.0	
Core Spec Addenda	N/A	
Design Model Number	MY8XSPK02M2, where X means 1~9	
Hardware Version Number	SPKV002	
Software Version Number	SPKV002	
Qualification Assessment Date	September/28/2012	
Listing Date	September/28/2012	
Design Description	Bluetooth Speaker Module with A2DP, AVRCP, HFP, HSP, GAVDP, PBAP profiles	
Product Type	End Product	

Revision History

Version	Date	Description
V0.1	2012-9-10	First draft
V0.2	2012-10-10	QDID added

Contact us:

Myland Limited

Rm.3, 3/F., Block B, Tonic Ind. Centre, 19 Lam Hing Street, Kowloon Bay, Kowloon, Hong Kong

Tel:852-23312212 Fax:852-27573135。 E-Mail:myland@myland.com.hk

Http://www.myland.com.hk