

Description:

FN-M16P is a small and low-price MP3 module with an simplified output directly to the speaker. The module can be used as a standalone module with attached battery, speaker and push buttons or used in combination with an Arduino UNO or any other with RX/TX capabilities.

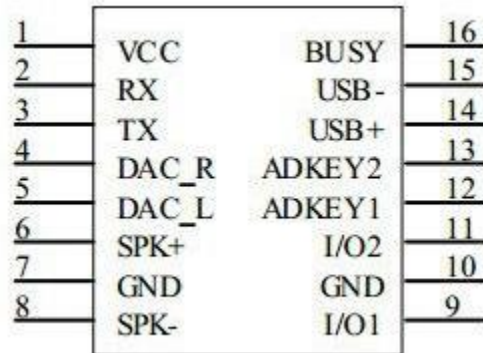
Features:

1. Supports MP3 and WAV decoding.
2. Works with most Windows, Mac, and Linux systems
3. Supports FAT16 and FAT32 file system.
4. 24-bit DAC output and supports dynamic range 90dB and SNR 85dB.
5. Supports AD key control mode and UART RS232 serial control mode.
6. Supports maximum 32GB micro SD card and 32GB USB flash drive.
7. Supports maximum 3000 audio files under the root directory of the storage device.
8. Supports maximum 99 folders, and each folder can store 255 audio files.
9. Supports inter-cut advertisements.
10. Supports random playback.
11. Built-in a 3 watts amplifier that can direct drive a 3 watts speaker.
12. 30 levels adjustable volume, and 6 levels adjustable EQ.

Specifications:

- MP3 Format: Support 11172-3 and ISO13813-3-layer 3audio decoding
- UART Port: Standard serial; TTL level; Baud rate adjustable (default baud rate is 9600)
- Working voltage: DC 3.2-5.0V; Type: DC 4.2V
- Standby current: 20Ma
- Operating temperature: -40~+70°C
- Humidity: 5%~95%

Pin Function:



Pin Name	Pin Description	Note
VCC	Input voltage	DC 3.2~5.0V; Type: DC 4.2V
RX	UART serial input	
TX	UART serial output	
DAC-R	Audio output right channel	Drive earphone and amplifier
DAC-L	Audio output left channel	Drive earphone and amplifier
SPK2	Speaker	Driver speaker less than 3W
GND	Ground	Power GND
SPK1	Speaker +	Driver speaker less than 3W
IO1	Trigger port 1	Short press to play previous (long press to decrease volume)
GND	Ground	Power GND
IO2	Trigger port 2	Short press to play next (long press to increase volume)

ADKEY1	AD Port 1	Trigger to play first segment
ADKEY2	AD Port 2	Trigger play fifth segment
USB+	USB+ DP	USB Port (connected with a USB flash or connected to pc)
USB+	USB-DP	USB Port (connected with a USB flash or connected to pc)
BUSY	Indicator pin	Low level when working / High level when standby

Applications:

- Car navigation voice broadcast.
- Road transport inspectors, toll stations voice prompts.
- Railway station, bus safety inspection voice prompts.
- Electricity, communications, financial business hall voice prompts.
- Vehicle into and out of the channel verify that the voice prompts.
- Public security border control channel voice prompts.
- Multi-channel voice alarm or equipment operating guide voice.
- Electric tourist car safe driving voice notices.
- Electromechanical equipment failure alarm.
- Fire alarm voice prompts.
- Automatic broadcast equipment, regular broadcast