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## BRIEF DATASHEET

Customer:

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Product Number: CWFF102

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Description: 802.11 b/g/n 1T/1R USB Module for embedded platform

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|----------------------------|------------------------|
| <b>Approved Signatures</b> | <b>鉅景科技</b><br>股份有限公司  |
|                            | <b>Contact Person:</b> |

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## Using This Document

This document is intended for hardware and software engineer’s general information on the product. Though every effort has been made to ensure that this document is current and accurate, more information may have become available subsequent to the production of this guide.

## Revision History

| Revision | Release Date | Description            |
|----------|--------------|------------------------|
| 0.1      | 2013/05/22   | Preliminary Edition    |
| 0.2      | 2013/05/22   | Add pin definition     |
|          |              | --- Below is blank --- |

## Description

Chipsip Solution is a small-sized, 802.11bgn USB module that achieves a data rate up to 150Mbps. It is 3 times faster than the normal 11bg product and with better performance.

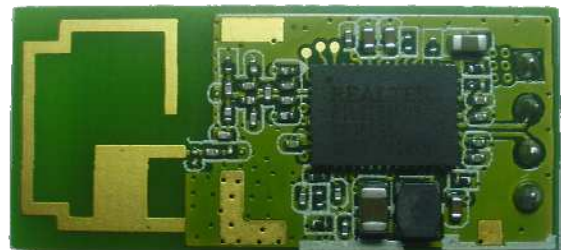
This product supports Client/Soft AP/WiFi Direct, Miracast mode for embedded platform. It is ideal for multi-purpose installation in Linux environment to share wireless connection.

By supporting 64/128-bits WEP, TKIP, WPA, WPA2 and WPS, helps to protect your data and privacy during transmission.

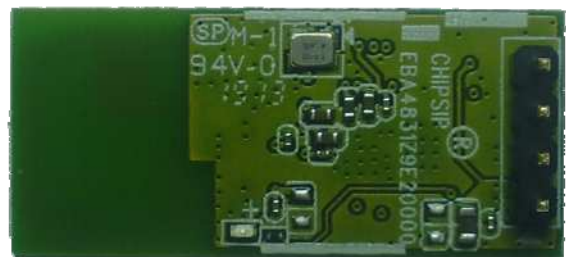
This module could be used for embedded platform that need 2.4GHz frequency band and could be mounted on system board like IPTV, STB, Media Player, Industrial PC, Connected TV, Smart Phone, PAD which embedded SOC has USB host device.

## Features

- Realtek RTL8188EUS chipset with USB 2.0 slave interface.
- Data Rate up to 150Mbps
- Security: 64/128-bits WEP, TKIP, WPA, WPA2, AES
- Linux/ some Android drivers supported



Top View



Bottom View

## Specification

### Hardware Features:

|                                |   |
|--------------------------------|---|
| Standard                       | IEEE 802.11 b/g/n   |
| Wireless LAN                   | 1T1R mode   |
| Antenna                        | PCB print antenna on board ( 0 dBi )  |
| Interface                      | USB slave with 4-pin header ( 3.3V, U+, U- and GND)<br>Power LED  |
| Frequency Range                | 802.11b/g 2.4~2.484GHz<br>802.11n 2.4~2.484GHz ( Subject to local regulations)  |
| Data Rate                      | 802.11b: 1, 2, 5.5, 11Mbps<br>802.11g: 6, 9, 12, 18, 24, 36, 48, 54Mbps<br>802.11n: 6.5, 13, 19.5, 26, 39, 52, 58.5, 65Mbps |
| Transmit Power +/- 2dBm (EIRP) | 11n HT40 MCS7 : +12dBm<br>11b : +17dBm<br>11g :+15dBm   |
| Receiver Sensitivity           | 11gn: -66dBm at HT40 ( MCS7 )<br>11gn: -67dBm at HT20 ( MCS15 )<br>11g: -72dBm at 54Mbps<br>11b: -80dBm at 11Mbps           |
| Software Supports              | Linux/Android driver  |
| Range                          | Indoors: up to 50 meters indoor   |
| Power Requirement              | 3.3V by pin header  |
| Dimension                      | 25.0 x 11.2 x 8.0 mm  |
| Certifications                 | FCC/CE by request   |

## Pin Definition

| Pin | Description |
|-----|-------------|
| 1   | VDD +3.3V   |
| 2   | USB_D-      |
| 3   | USB_D+      |
| 4   | GND         |

## Product Dimension and Drawing

**Product outline size:** about 25.0 x 11.2 mm

**Mechanical Drawing:** (unit: mm, tolerance:  $\pm 0.15\text{mm}$ )

