

## MX8012C

# Industrial IOT On-Vehicle Seamless-Roaming Dual-band WiFi 5 Communication Module



## Description

Industrial dual-band WiFi 5 communication module provides professional wireless communication for warehousing logistics, manufacturing, electrical, transportation and other industries.

## Features

-High throughput

Support 802.11ac & 2x2 MIMO with Max. wireless rate up to 1.7Gbps and wired port 1Gbps.

-Enhanced wireless roaming

In mobile carrier scenarios, such as AGV navigation vehicles and handling robots, establish a backup pre-association with potential roaming destination APs outside the communication link.

When roaming is triggered, the standby link will be converted into a communication link to achieve fast and seamless roaming, effectively guarantee the real-time performance of data transmission, and improve the reliability of wireless network communication.

-High reliability

The self-developed firmware system ensures the long-time stable operation.



## Specification

Hardware	
Processor	IPQ4029
Memory	256MB DDR3L, 32MB Flash
Dimensions	110x92x32mm
Frequency	5GHz Dual-band
Interface	1x 10/100/1000Mbps
Max. transmit power consumption (per channel)	5G 0: 24dBm@VHT20 MCS0 5G 1: 24dBm@VHT20 MCS0
MIMO	5G 0: 2x2 867Mbps 5G 1: 2x2 867Mbps
Button	1x RESET
Antenna gain	5dBi



Antenna beam width	omnidirectional 360°
power supply voltage	12~48V (DC JACK or Phoenix terminal)
Installation	Wall-mount
Temperature	Operation: -20°~55°; Storage: -40°~85°
Operation Humidity	5%~90%RH non-condensing
Protection	IP41
Software	
protocols	802.11a/n/ac
mode	client
Security Configuration	WPA2-PSK
network mode	bridge
Configuration Management	Web Configuration
Other Features	Enhanced roaming, automatic frequency selection

## Radio Frequency Parameters

	TRANSMIT POWER (PER CHAIN)			RECEIVE SENSITIVITY		
	RATE	POWER	TOLERANCE	RATE	POWER	TOLERANCE
5G 0	VHT20MCS0	24dBm	+/- 2dBm	VHT20MCS0	-90dBm	+/- 2dBm
	VHT20 MCS8	18dBm	+/- 2dBm	VHT20 MCS8	-67dBm	+/- 2dBm
	VHT40MCS0	23dBm	+/- 2dBm	VHT40MCS0	-87dBm	+/- 2dBm
	VHT40 MCS9	18dBm	+/- 2dBm	VHT40 MCS9	-62dBm	+/- 2dBm
	VHT80MCS0	23dBm	+/- 2dBm	VHT80MCS0	-84dBm	+/- 2dBm
	VHT80 MCS9	18dBm	+/- 2dBm	VHT80 MCS9	-59dBm	+/- 2dBm
5G 1	VHT20MCS0	24dBm	+/- 2dBm	VHT20MCS0	-90dBm	+/- 2dBm
	VHT20 MCS8	18dBm	+/- 2dBm	VHT20 MCS8	-67dBm	+/- 2dBm
	VHT40MCS0	23dBm	+/- 2dBm	VHT40MCS0	-87dBm	+/- 2dBm
	VHT40 MCS9	18dBm	+/- 2dBm	VHT40 MCS9	-62dBm	+/- 2dBm
	VHT80MCS0	23dBm	+/- 2dBm	VHT80MCS0	-84dBm	+/- 2dBm
	VHT80 MCS9	18dBm	+/- 2dBm	VHT80 MCS9	-59dBm	+/- 2dBm