

PIN Definition

N/A	7 1	24 〈	NRST
PC10	2	23 ⟨	PB0_IO_INT1
PA6_SPI1_MISO	3	22 <	PA9_USART1_TX
PC6	4	21 <	PA10_USART1_RX
PB6_SCL	5	20 {	PB1_IO_INT2
PB7_SDA	6	19 ⟨	PA13_SWDIO
PC4	7	18 <	PA14_SWCLK
PC2	8	17 \langle	PB15
PC3	9	16 <	+3.3V
GND	10 🔠	15 <	+3.3V
ANT) 11	14 <	GND
GND	∑ 12 - 	13 ⟨	GND

Transceiver	SX1276		
MCU	AcSiP STM32L073xZ		
Operating supply voltage	3.3V		
Frequency	EU868/US915 MHz		
Band Width	62.5~500KHz		
Modulation	LoRa/GFSK/FSK/OOK/MSK/GMSK		
Transmit power	+20dBm max.		
Sensitivity	Down to -137dBm		
Data rate	300Kbps(FSK)		
Communication distance	10Km		
Antenna impedance	50Ω		
Operating temperature	-40°C ~ +85°C		
Storage temperature range	-50°C ~ +105°C		
Dimension	23.5mm×23.2mm×3.1mm		

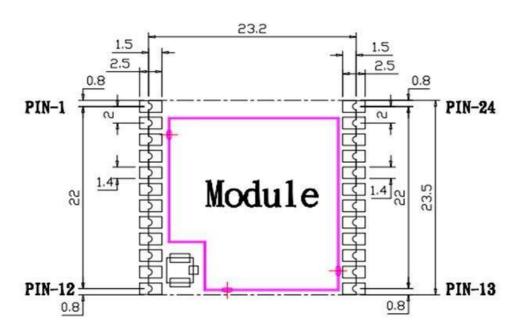
Note

- The module transmission data rate will affect Transmission distance, the higher the data rate, the closer the distance, and the lower the receiving sensitivity.
- The supply voltage to the module will affect TX power, in the operating supply voltage range, the lower the voltage to get the lower the TX power.
- The antenna will strongly affect the communication distance, please select matched antenna and connect it correctly.
- The module mount will affect the communication distance.

Pin Configuration

PIN#	PIN NAME	Function Description
1	N/A	N/A
2	PC10	For RS485/1:RS485 Tx, 0: RS485 Rx
3	PA6_SPI1_MISO	GPIO
4	DO1	ModBus-1, DO
5	PB6_SCL	Channel Scan
6	PB7_SDA	Channel Scan
7	PC4	GPIO
8	PC2	GPIO
9	PC3	Cfg Mode(0)/Normal Mode(1) Sel
10	GND	GND
11	ANT	ANT
12	GND	GND
13	GND	GND
14	GND	GND
15	+3.3V	+3.3V
16	+3.3V	+3.3V
17	DO2	GPIO
18	PA14_SWCLK	S/W GPIO - P01, ModBus-2, DO
19	PA13_SWDIO	S/W GPIO - P03, ModBus-2, DI
20	DI2	GPIO
21	PA10_USART1_RX	Pass Through UART RX
22	PA9_USART1_TX	Pass Through UART TX
23	DI1	ModBus-1, DI
24	NRST	Reset

PCB Dimension



Note

- The module power supply voltage is recommended work at DC3.3V.
- The module interface uses half circle pad to soldering on the system PCB board, the GND must soldering to the system digital GND reliably, or use connector to connect main-board.
- The antenna must get to the module's ANT pin as close as possible.