

iCastl IoT Bridge Datasheet

End-to-End Industrial Asset Monitoring Solution

- Faster Monitoring: Legacy assets can get connected and remotely monitored in minutes using Modbus RTU, 4 digital I/O & 2 analog inputs on iCast1.
- Remote Control: Control digital output(s) and write to MODBUS slave registers from web and mobile app.
- **Reduce Costs:** Enterprises can securely implement IoT capabilities at much lower up front cost without needing technical expertise.
- **Retrofit solution:** Industrial controls, commercial buildings, retail spaces and factories can be entirely retrofitted with IoT capabilities in days instead of months.



• Work Smarter: Continuously monitor, optimize the asset performance and maintain assets on a need-only basis.

iC	Cast1 IoT Bridge Model		LED Indications
lumber	SLI-ICI-M00-C	Wi-Fi LED	LED OFF – Wi-Fi not provisioned
US	RTU MASTER		SLOW BLINK – Connecting to AP
og Input	2 Analog Inputs (0-10V / 4-20mA)		FAST BLINK –Connecting to Cloud LED ON – Connected to Cloud
tal IO's	4 Pins configured as Input / Output		
		PWR LED	LED OFF – Power OFF LED ON – Power ON
Wi-Fi Inte	erface for Cloud Connectivity	BLE LED	LED OFF – BLE advertising stop
enna	Internal PCB Antenna	(used for provisioning loT	SLOW BLINK – BLE advertising start
ed	802.11 b/g/n [up to 72.2 Mbps]	Bridge)	LED ON – Connected to mobile app
otocols Supported	MQTTS, HTTPS		
equency	2.4 GHz		Environmental
		Operating	-20 °C to +70 °C [-4 °F to +158 °F]
	Serial Interface	Temperature Range	
ort	4 Pin Pigtail Connector	Storage Temperature	-40 °C to +85 °C [-40 °F to +185 °F]
terface Mode	RS485	Range	
upported Baud Rates	9600bps – 115.2 kbps	Humidity	5 to 85% RH (non-condensing)
arity	Odd, Even or None	Protection Level	Plastic case, IP40
ata Bits	8 bits	Agency Approvals	CE, FCC
op Bits	1 or 2	EMI	EN 55032 Class A
ow Control	None		FCC Part 15 Subpart C (15.247)
ermination	Internal 130 ohm	EMS	IEC61000-4-2 (ESD): ±4kV (contact),
D Protection	8 KV		±8kV (air discharge)
olation Protection	NA		IEC 61000-4-3 (RS): 10V/m (80MHz-6GHz
erial Devices Supported	1 MODBUS SLAVE		IEC 61000-4-6 (CS): 10V (150KHz-80MHz)



Power Consumption	Max 10W	R
Input Voltage	12 - 24 VDC	K
Max. Input Voltage Range	10 – 26 VDC	Pr
Reverse Power Protection	Yes	fa
Overload Protection	No	

Standards

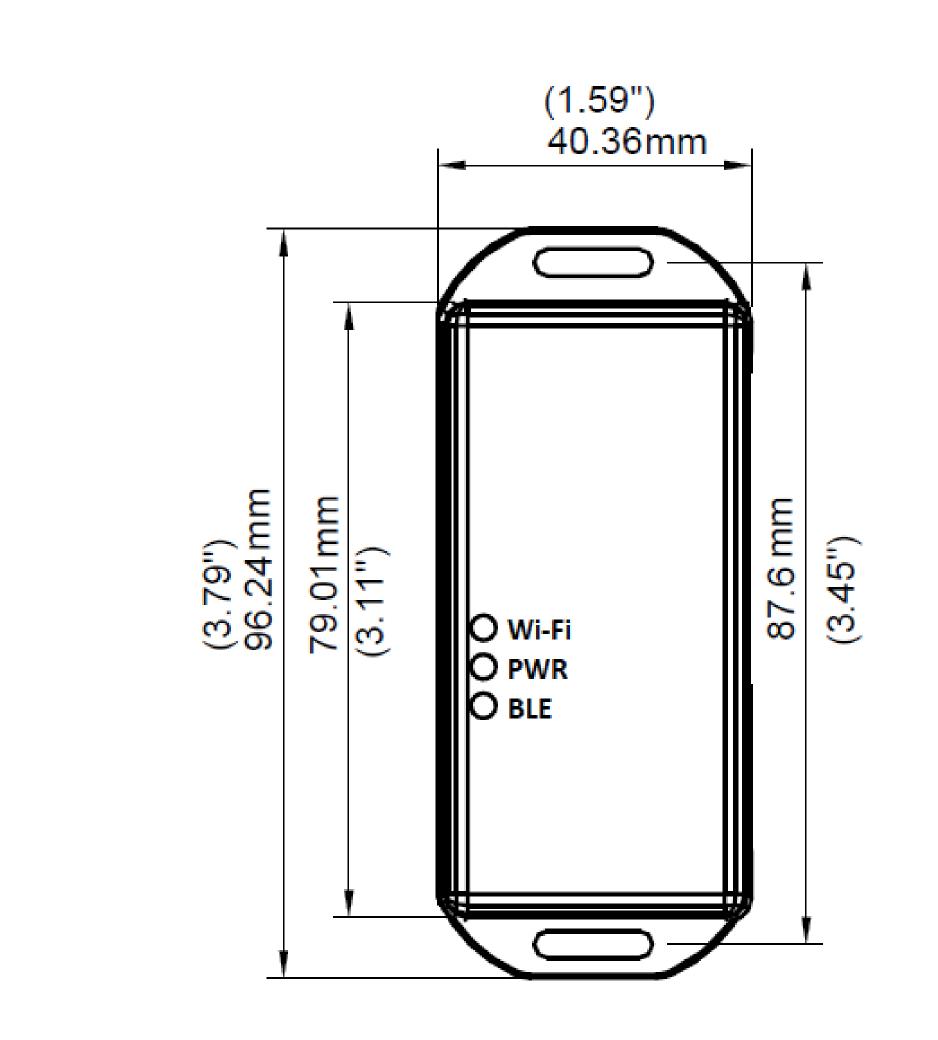
IEC60068-2-32 (Drop Test / Free Fall)

Reset to Factory Defaults

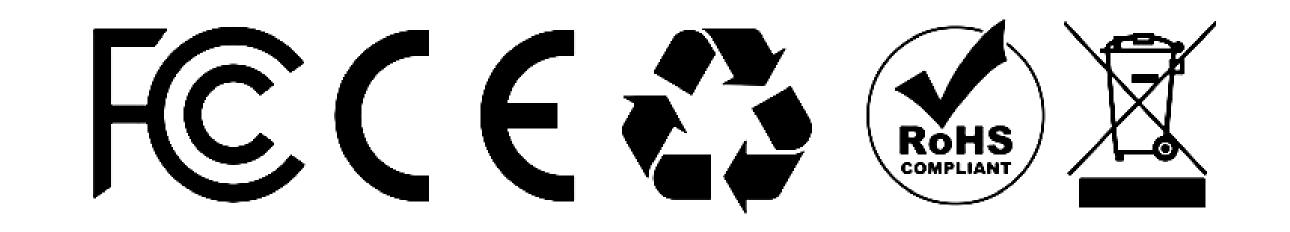
Press and hold YELLOW button for 10 seconds to reset all settings to factory default.

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Dimensions (0.68") (0.56'')17.26 mm 14.28mm



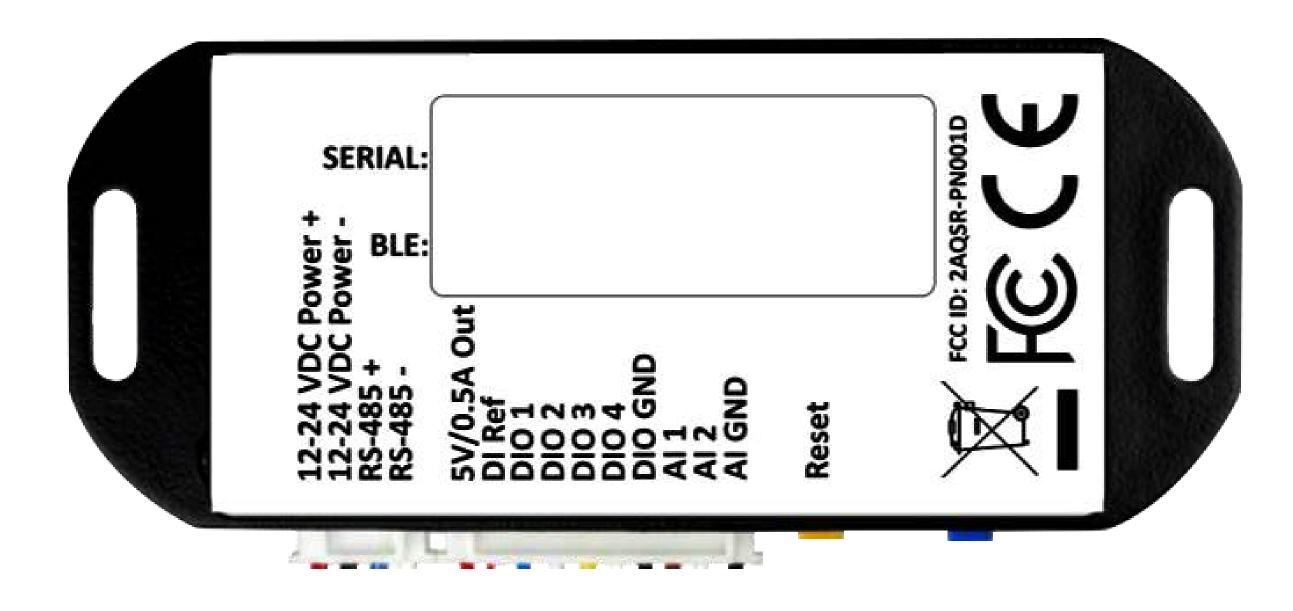
Safety Standards



Quick Setup & Provisioning

- Mount iCast1 Wireless IoT Bridge
- Download Mobile App & Create Account
- Create a Device Profile from the Web App
- Provision the iCast1 to Your Account

Ports Details



Power Supply & Serial Port			
Pin Name	Pin Function		
12-24 VDC Power +	12-24 volts DC, positive terminal		
12-24 VDC Power -	12-24 volts DC, negative terminal		
RS-485 +	RS-485 positive terminal		
RS-485-	RS-485 negative terminal		

- Requires iOS/Android smartphone with Bluetooth for provisioning and 2.4GHz AP with active internet connection
- For detailed instructions kindly refer to Quick Start Guide

Cloud Subscription

• iCastl IoT Bridge requires maintaining a monthly cloud subscription for providing long-term data storage, real-time monitoring and alert notifications.

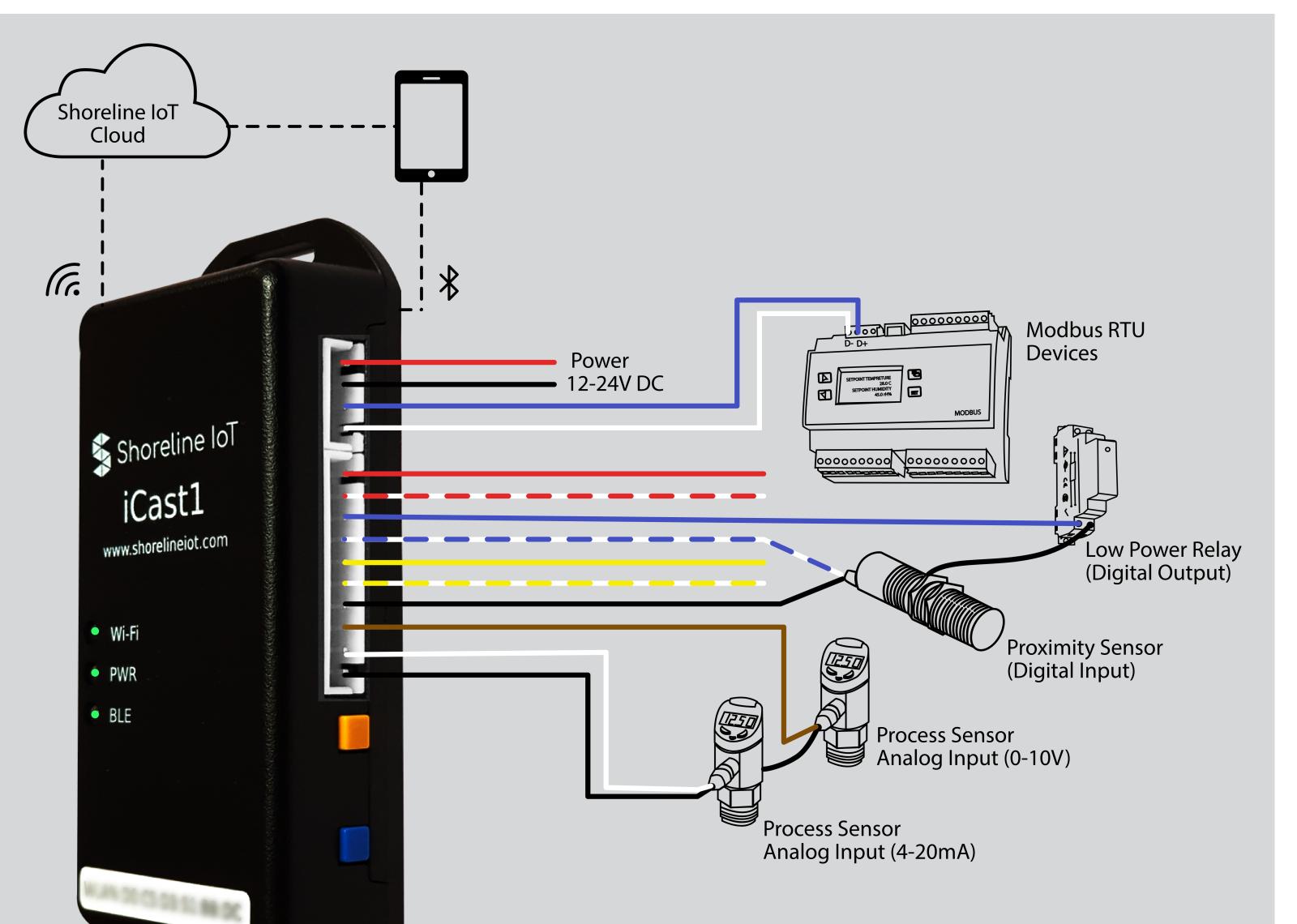
Subscription details at, https://cloud.shorelineiot.com/pricing

Additional Help and Support:

Please refer to the iCastl IoT bridge User Manual for more detailed information.



Input / Output Port		
Pin Name	Pin Function	
5V/0.5A Out	+5 Volts DC output @ 0.5amps	
DIRef	Digital Port Input reference	
	(Range from 3.3V up to 24V)	
DIO 1	Digital Input or Output 1	
DIO 2	Digital Input or Output 2	
DIO 3	Digital Input or Output 3	
DIO 4	Digital Input or Output 4	
DIO GND	Ground	
AI 1	Analog Input 1 Signal (4-20mA/0-10V)	
AI 2	Analog Input 2 Signal (4-20mA/0-10V)	
AIGND	Ground	







Note:

- Digital inputs are sinking and need a cold contact driving them.
- Digital outputs are 1A @ DI Ref Volts
- Analog inputs are 0-10VDC or 4-20 mA

Disconnect power when wiring connections to the iCastl unit

1 of 2

- Mount the iCast1 unit indoors only
- Avoid mounting inside a metal enclosure.

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