

atilze SENSOR HUB

Designed for rapid Internet-of-Things (IoT) deployment, the Sensor Hub is a fully customizable and open IoT hardware platform; ready to support a wide range of implementations and industries.



Next-generation hardware platform for rapid IoT deployment



RAPID DEPLOYMENT

Quick and easy to set up, the Sensor Hub is ready for indoor and outdoor deployment



CUSTOMIZABLE

Pick your own mix of sensors and network connectivity to create an IoT solution suited for your requirements



OPEN

Open development with non-proprietary sensor interface, open libraries and ability to load your own firmware



END-TO-END

Complete end-to-end IoT solution, from sensor hardware to backend IoT platform on the cloud

Use Cases



Smart Agriculture



Smart Aquaculture



Smart Plantation



Smart City



Smart Building



Connected Vehicles



Smart Environment



Smart Manufacturing

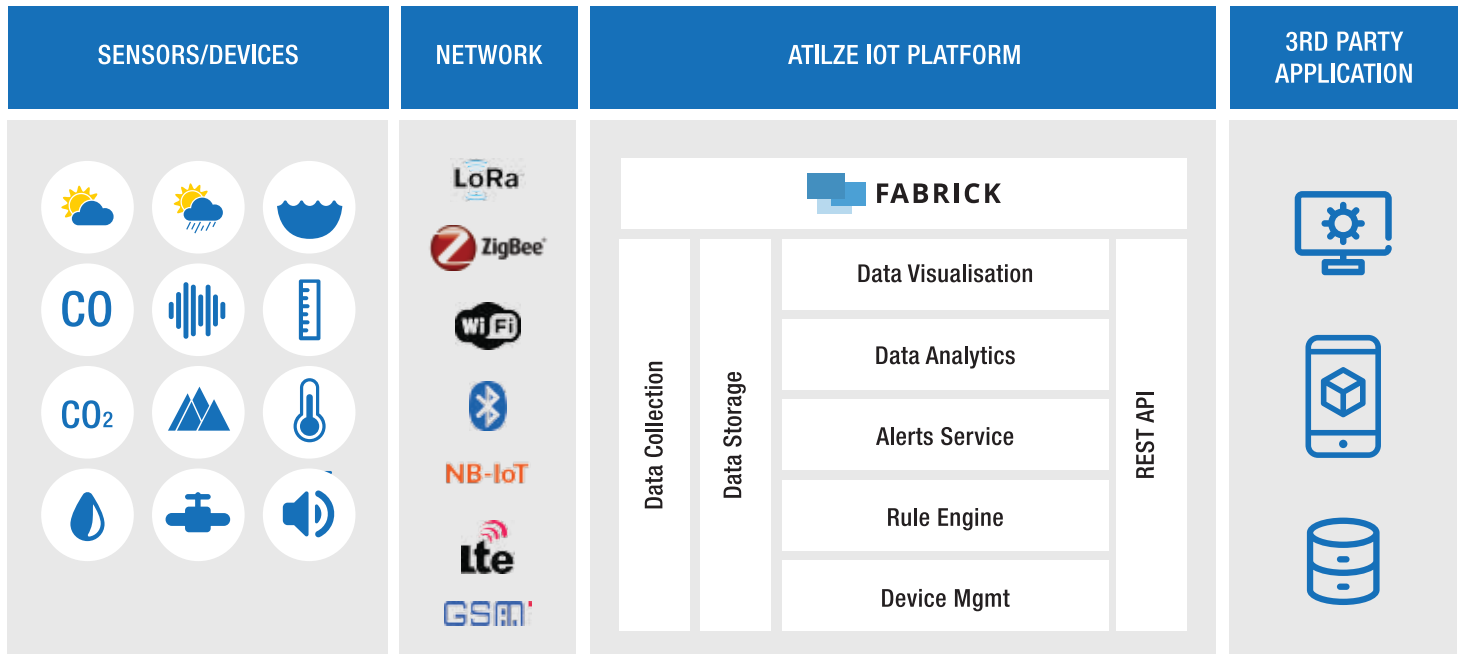


Smart Retail



Smart Security

End-to-End Architecture



Key Features

Arduino Shield Compatible	Use multitude of 3rd party Arduino compatible shields to extend functionality
Wireless Xbee Connector	Xbee form factor connectors for various wireless options such as LoRa, 3G & WiFi
Industrial Sensor Interfaces	Other than standard ADC & I2C interfaces, there is support for industrial protocols such as RS232, RS485 & 4-20mA
Outdoor Ready	Robust enclosure with IP65 rating, allowing deployment at outdoor environments
Low Power with Multiple Power Inputs	Low power Microcontroller with options to power via wired, battery or solar
Integrated IoT Platform	The Sensor Hub is integrated together with a complete end to end IoT Platform

Hardware Specifications

Microcontroller	Intel® Quark™ SE Microcontroller C1000
Connectivity	LoRaWAN, WiFi, 4G Cellular, NB-IOT, Bluetooth via XBee
Power Options	Solar Panel (12Vdc) Wired (5V) Lithium Ion Battery (3.7V)
Power Management	Low Power Consumption Mode Battery Level Reporting
Battery (optional)	Lithium Ion Battery (rechargeable)
Solar Charger (optional)	On Board Low Power Consumption MPPT Support 12V to 18V Solar Panel
Compatibility	Arduino Shield Compatible
Sensor Interfaces	3 X ADC 1 X RS232 1 X 4-20mA Additional RS485, Modbus, Canbus via UART
I/O via Arduino Header	SPI I2C UART (Only available if RS232 is not used)
Weatherproof Enclosure	IP65 Enclosure
Physical Dimension	26.9 x 15.4 x 6.25 cm

