

KONA Micro IoT Gateway

With Embedded Network and Application Server for Industrial Deployments

The **KONA Micro IoT Gateway** is designed for enterprise and lightweight industrial applications that require "Always On" connectivity. Embedded Network and Application Servers allow simplified deployment and direct integration with existing infrastructure using industrial interfaces such as Building Management System (ie. BacNet), Programmable Logic Controller (PLC), SCADA Systems. Configured with an internal 3G/4G modem and a built-in battery backup, the KONA Micro IoT gateway continues to operate and transmits sensor data to the network even when the main site has lost power.

- Smart Home & Office
- Smart Buildings
- Warehouses
- Smart Greenhouses
- Facility Management
- Safety & Security
- Schools & Universities
- Retail



CE

Key Product Differentiators

- » Includes Embedded ChirpStack Network Server
- » Includes Embedded Node-Red Application Server
- » Enables Physical Industrial Connection over Ethernet through Modbus TCP/IP and BACNet
- » Enable critical enterprise IoT applications with 'Always On' connectivity. Battery backup and an integrated 3G/4G modem.
- » Reduce set up costs with plug-n-play installation using a custom provisioned factory image.
- » Improve coverage and service resulting in increased IoT application adoption and customer satisfaction.
- » Simplify management with the KonaFT OAM tool.
- » Operational status indicated with multi-function LED.
- » Fully integrated with the broader eco-system of LoRa™ network servers and sensors.

Key Features

- » US915, EU868, AU915, AS923 ISM Bands
- » Time Duplex 8 Rx / 1 Tx
- » Integrated Cellular 3G/4G Modem
- » External LoRa Antenna
- » Four Hour Battery Backup
- » 27 dBm Tx Power
- » Operational Status LED
- » Plug & Play Operation
- » Factory Image for Mass Deployment
- » In-Service Updates

KONA Micro IoT Gateway

Indoor LoRaWAN® Gateway for Mission Critical Deployments

Technical and Functional System Specifications

Mechanical Parameters

MTBF	830,000 hours
DC Power Consumption	4.5 W (Typical)
Operational Temperature	0°C to +40°C
Operational Humidity	5% to 95% Condensing
Ingress Protection	IP30
Size	115 x 115 x 40 mm
Weight	350 g (<200 g without battery)

LoRa Radio Parameters

ISM Bands	US915, EU868, AU915, AS923, IL917, JP920 ISM Bands
Tx Power	14 dBm to 27 dBm
Rx Sensitivity	-141 dBm (SF12, 293 bits/sec)
Rx Noise Figure	3.5 dB
Rx Linearity	-10 dBm
Rx Dynamic Range	70 dB Analog, 100+ dB Digital

Software and Management

Tools	Access Control List management
	3G/4G Parameter Configuration
	System Health Monitor
	Radio Configuration and Control
	Remote Software Upgrade
	Active and Passive image management
	Factory image provisioning
	Field Configuration Tool
Networking	DHCPv4 client
	TFTP server
	HTTP server
	Firewall and Access Lists

Interfaces

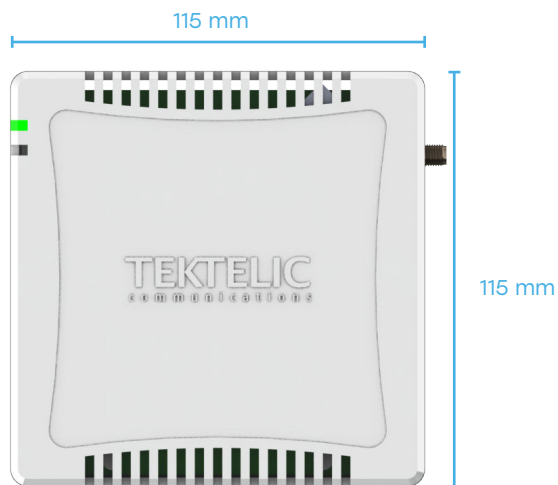
Ethernet Backhaul	RJ-45 (10/100 BaseT)
Cellular Backhaul (3G/4G)	internal antenna
LoRa Antenna	SMA-RC
Power	12V / 1A Adapter

Regulatory Compliance

Safety	UL / CSA / EN / IEC 62368-1
Regulatory	FCC: 15.247, 15.109, 15.209
	ISED: RSS - 247, RSS - Gen
	CE: RED 2014/53/EU

Cellular Carrier Certifications

Verizon
AT&T
T-Mobile
Sprint
PTCRB



TEKTELIC Communications is a premier supplier of best-in-class LoRaWAN® IoT Gateways, Sensors, and custom applications. These elements combined provide a powerful end-to-end solution that can be easily, quickly, and cost effectively deployed to address the most demanding IoT challenges.

For more information please visit www.tektelic.com