

Product: OWL 4G Europe ☑



LTE Ethernet Gateway, Europe, VPN, Dual SIM, Serial, IO, Vehicles (E-Mark)

# **Product Description**

Industry 4.0 and Industrial IoT Cellular Router and Gateway. Optimized for 4G applications with edge pre-computing. VPN and openly programmable and extendable Linux. Rugged and approved for vehicles.

## **Technical Specifications**

# **Product description**

Туре:	OWL-L01.01-W00.00-F01-U01-A02-VXX.X.XX
Name:	OWL 4G Europe
Description:	Industry 4.0 and Instustrial IoT Cellular Router and Gateway. Optimized for 4G distributed applications with edge pre-computing. VPN and open extendable Linux.
Part Number:	942283001
Port type and quantity:	2x Ethernet, 2x Antenna, 2x SIM, 1x Power, 2x I/O, 2x Serial
Country certification:	Europe (Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech, Denmark, Estonia, Finland, France, Germany, Great Britain, Greece, Hungary, Ireland, Italy, Latvia, Lituania, Luxembourg, Malta, Netherland, Poland, Portugal, Romania, Sweden, Slowakia, Slowenia, Spain), Iceland, Liechtenstein, Norway, Switzerland, Turkey
Processor:	ARMv7
Hard disk space:	Flash memory (512MB User data storage, 830MB User module storage)
RAM:	512MB

# **More Interfaces**

Serial:	On 10-pin panel socket (connector included): RS485, RS232 , Serial2TCP , Serial2UDP
Ethernet:	2x Ethernet: 10/100 Mbit/s (RJ45)
Power Supply:	Via 2-pin terminal block 3.5mm (included)
Signaling contact:	On 10-pin panel socket (connector included): Digital Input, Digital Output

## Radio technology

Antenna connector:	2 x SMA Female (Cellular, Diversity)
Frequency band:	$ \label{eq:GPRS/EDGE (2G): 900/1800 MHz, UMTS/HSPA+ (3G): 900(Band 8) / 2100(Band 1) MHz, LTE (4G): 700(Band 28A) / 800(Band 20) / 900(Band 8) / 1800 (Band 3) / 2100(Band 1) / 2300(Band 40) / 2500(Band 41) / 2600(Band 7, Band 38) MHz } $
Transmission rate:	LTE Category 4: 150Mbps Download, 50 Mbps Upload

# **Power requirements**

Current consumption:	Idle 2.5 W, Average 4 W, Maximum 11 W
Operating Voltage:	9 V DC to 36 V DC
Redundancy functions:	Dual VRRPv2 (with ping probes), Dual VRRPv3 (with ping probes), multiple routed interfaces (ping monitoring, failover and load balancing), PPPoE bridge mode

## **Diagnostics features**

Monitoring:
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# **Security features**

Authentication:	User Management (local, RADIUS, TACACS+, mixed)
Stateful inspection firewall:	Static Firewall IPv4/IPv6 with Incoming and Forwarding Ruleset, DoS protection

## **Service**

Other services:	DHCP Server (IPv4/IPv6, dynamic and static leases, IPv6 Prefix Delegation, DNS proxy), DynDNS client, PPPoE, FTP server, E-Mail via SMTP, SMS (notifications and commands), Telnet server	
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#### **Software**

Operating system:	Custom embedded Linux with Busybox Shell
VPN:	OpenVPN, IPSec, GRE, L2TP, PPTP
Switching:	VLAN (via Scripting), tunneled VLANs (via Scripting) , IGMP
Management:	HTML5, SSH, SNMPv1/2c/3, Automatic configuration and firmware fetch from a web- or ftpserver, backup and restore with drag & drop
Diagnostics:	One click support report package, System log, Linux kernel log, reboot log, signal strength history (60 days), SSH linux shell, Signal strength LED indicators
Configuration:	Simple to edit text file configuration, HTTP, HTTPs, SMS, SSH, Telnet, 4 Configuration Profiles, automatic via web/ftp, SNMPv1/2c/3
Security:	HTTPs, SSH, Authentication with RADIUS or TACACS+, activate cellular interface with SMS, Ethernet 802.1X (EAP-PEAP/MsCHAPv2 or EAP-TLS)
Time synchronisation:	SNTP Client, SNTP Server , Battery for RTC (CR1225)
Routing:	Static unicast routing, Multinetting, IP masquerading, Port forwarding, Multiple routes with priority and load sharing, 1:1 NAT
Dynamic routing:	Dual VRRPv2 (with ping probes), Dual VRRPv3 (with ping probes), multiple routed interfaces (ping monitoring, failover and load balancing)

#### **Ambient conditions**

MTBF (MIL-HDBK-217F-2, parts count):	55.2 Years
Degree of Protection when Installed:	IP30
Operating temperature:	-40-+65 °C
Storage/transport temperature:	-40-+85 °C
Relative humidity (non-condensing):	0-95 %

#### **Mechanical construction**

Weight:	510 g
Housing:	Metal
Mounting:	DIN Rail and Wall mounting
Protection class:	IP30

#### **Approvals**

Safety of industrial control equipment:	EN 62311:2008, UL/EN/AS/NZS 62368-1:2014 (formerly EN 60950-1)
Transportation:	E8 (vehicles), EN 45545-1 (fire), EN 45545-2 HL1/HL2/HL3
Radio:	ETSI EN 301 511:2017 V12.5.1, ETSI EN 301 908-1:2016 V11.1.1, ETSI EN 301 908-2:2017 V11.1.2, ETSI EN 301 908-13:2017 V11.1.2

## Scope of delivery and accessories

Modules and components:	User modules as separate downoad: Lua, Python
Accessories:	942042105 Indoor LTE Antenna , 942117001 500hm terminator for cellular antenna , 943662015 Rail Power Supply
Scope of delivery:	Device, DIN rail clip, wall mount wings, 2-pin power connector, 10-pin connector for I/O and RS232/RS485

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