LANCOM L-322E Wireless

Quick Reference Guide

. . . c o n n e c t i n g   y o u r   b u s i n e s s

Please observe the following when setting up the device

- For devices to be operated on the desktop, please attach the adhesive rubber footpads
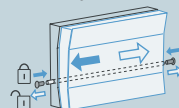- Do not rest any objects on top of the device
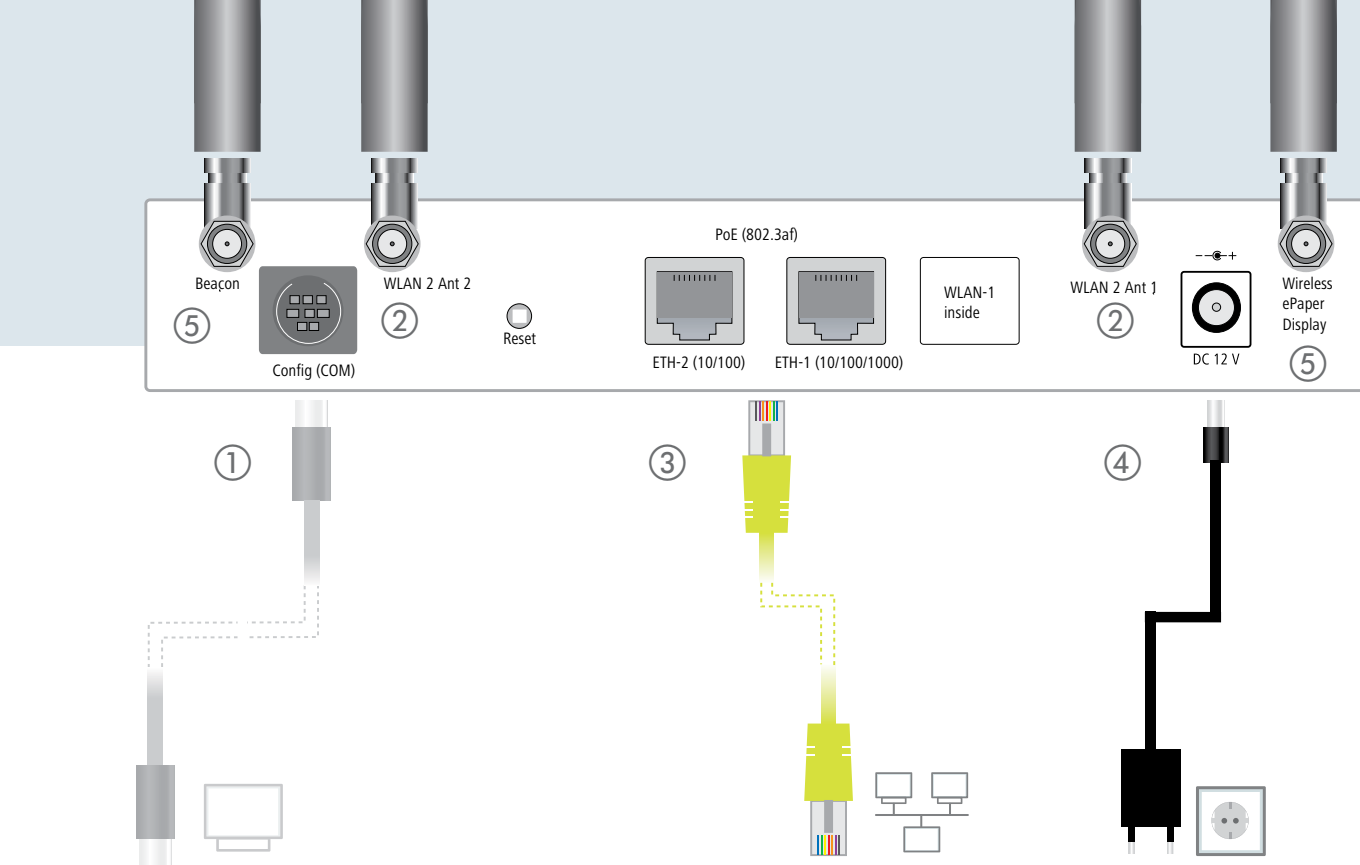- Keep the ventilation slots on the side of the device clear of obstruction
- In case of wall mounting, use the drilling template as supplied
- Lockable wall mounting with the LANCOM Wall Mount (available as an accessory).

Beacon WLAN 2 Ant 2 ⑤ ② Reset PoE (802.3af) ETH-2 (10/100) ETH-1 (10/100/1000) WLAN-1 inside WLAN 2 Ant 1 ② DC 12 V Wireless ePaper Display ⑤

Config (COM)

① ③ ④

① **Optional: Serial configuration cable**
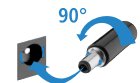You can connect the device to a PC with a configuration cable (available separately).

② **WLAN antennas**
Apply the WLAN antennas supplied to the connectors WLAN2 Ant 1 and WLAN2 Ant 2. The antennas for WLAN1 are located inside the device. Depending on how the antennas are to be used, the 'Antenna Grouping' may need to be configured in order to ensure the desired MIMO behavior.

③ **LAN**
Use the cable with the kiwi-colored connectors to connect the interfaces ETH1 or ETH2 to your PC or a LAN switch.

④ **Power**
When connecting the cable to the device, turn the bayonet connector 90° clockwise until it clicks into place.
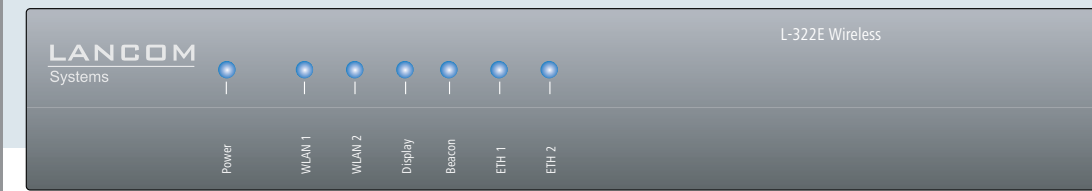
Use only the supplied power adapter.

⑤ **iBeacon & Wireless ePaper Display antennas**
Apply the antennas supplied to the connectors Beacon and Wireless ePaper Display

! If you operate separately purchased antennas, please ensure that you do not exceed the maximum allowed transmission power for your system. The system operator is responsible for adhering to the threshold values. Antennas are only to be attached or changed when the device is switched off. Mounting or demounting antennas while the device switched on may cause the destruction of the radio module!

M O U N T I N G   A N D   C O N N E C T I N G   T H E   D E V I C E

L-322E Wireless

① ② ③ ④ ⑤

① **Power**	
Off	Device switched off
Green, on (permanently)	Device operational
Blinking green	Configuration password not set. Without a configuration password, the configuration data in the device is unprotected.

② **WLAN 1, WLAN 2**	
Off	No WLAN network defined or WLAN module deactivated. The WLAN module is not transmitting beacons.
Green	At least one WLAN network is defined and WLAN module activated. The WLAN module is transmitting beacons.
Green inverse flashing	Number of flashes = number of connected WLAN stations and P2P wireless connections, followed by a pause (default). Alternatively the frequency of the flashing can indicate signal strength over the defined P2P link or the signal strength between the access point and the device operating in client mode.
Blinking green	DFS scanning or other scan procedure.

⑤ **ETH 1, ETH 2**	
Off	No networking device attached
Green, on (permanently)	Connection to network device operational, no data traffic
Flickering green	Data traffic

④ **Beacon**	
Off	iBeacon disabled
Green, on (permanently)	iBeacon enabled
Blinking green	iBeacon module initializing
Red, on (permanently)	Initialization failed

③ **Display**	
Off	Wireless ePaper module is off
Orange	Wireless ePaper module is ready, but no connection to the server yet (radio is off)
Green, on (permanently)	Wireless ePaper module is connected to server (radio is on but is sending sync packets only)
Blinking green	Wireless ePaper module transmitting data to display
Red	Error condition (e.g. module reset)

License information for the device firmware (LCOS) is available in the file LCOS-Licenses.txt on the data medium supplied.

T E C H N I C A L   D A T A

Hardware	
Power supply	12 V DC, external power adapter (110 or 230V) with bayonet connector to secure against disconnection
Power consumption	Approx. 7 watt via 12V/1A power adapter (value refers to the overall power for the access point and power adapter), about 8.5 watts via PoE
Environment	Temperature range 0–45 °C; humidity 0–95 %; non-condensing
Housing	Robust synthetic housing, rear connectors, ready for wall mounting, Kensington lock; measures 210 x 45 x 140 mm (W x H x D)
Number of fans	None; fanless design, no rotating parts, high MTBF
WLAN	
Frequency band	2400–2483.5 MHz (ISM) or 5150–5825 MHz (restrictions vary between countries)
Radio channels 2.4 GHz	Up to 13 channels, max. 3 non-overlapping (2.4-GHz band)
Radio channels 5 GHz	Up to 26 non-overlapping channels (channels available vary according to country regulations; DFS for automatic dynamic channel selection required)
Interfaces	
Wireless ePaper Displays	Support of LANCOM Wireless ePaper Displays: The device is equipped with a radio module for the update of LANCOM Wireless ePaper Displays in the 2.4 GHz frequency band.
iBeacon	Support of iBeacon technology: The device is equipped with a BLE radio module and can thus transmit a configurable iBeacon. The UUID as well as the major and minor ID are configurable. On top of that, all three radiated powers are supported (near, immediate, far).
ETH1	10/100/1000 Base-TX, autosensing, auto node hub, PoE compliant with IEEE 802.3af
ETH2	10/100Base-TX, autosensing, auto node hub, PoE compliant with IEEE 802.3af
DSL over LAN (DSLoL)	The LAN port can (even parallel to LAN mode) be used as a WAN port for connecting external DSL modems (PPPoE) or external routers.
External antenna connectors	Four reverse SMA connectors for external LANCOM AirLancer Extender antennas or for antennas from other vendors.
Serial interface	Serial configuration interface / COM port (8-pin Mini-DIN): 9,600–115,000 baud
Declaration of conformity	
For the declaration of conformity, see the product page on our website www.lancom-systems.eu	
Package content	
Manual	Quick Installation Guide (DE/EN/FR/ES/IT/PT/NL)
CD/DVD	CD/DVD with firmware, management software (LANconfig, LANmonitor, LANCAP) and documentation
Cable	Ethernet cable, 3m (LAN: kiwi-colored connectors; WAN: green connectors)
Antennas	Four 3-dBi dipole dual-band antennas
Power adapter	External power adapter, NEST 12 V/1.5 A DC/S, barrel connector 2.1/5.5 mm bayonet, LANCOM item no. 110723 (EU, 230 V), LANCOM item no. 110829 (UK, 230 V)