

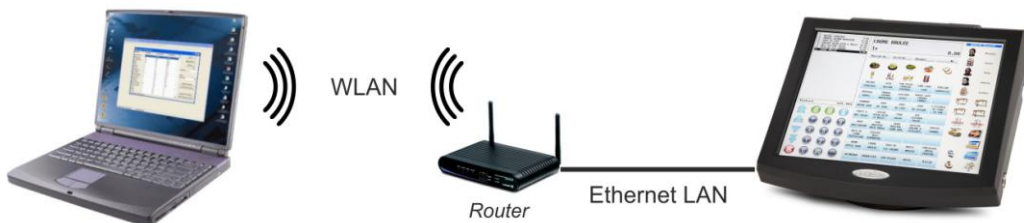
## How to use a WLAN connection

### 1. Laptop – POS/ECR

#### You need:

- Laptop with integrated WLAN
- QUORION POS or electronic cash register (ECR)
- Router

#### Topology:



#### Configuration:

1. Configure your router. Refer to the manual of your router for specific details.
  - a. Specify the SSID (Service Set Identifier) – the name that identifies the wireless network.
  - b. Specify a security option and a password.
  - c. Set a static IP-address, e.g.:
    - IP-address: 192.168.1.2
    - Subnet mask: 255.255.255.0
    - Gateway: 192.168.1.1
    - DNS-server: 192.168.1.1
2. Configure the POS/ECR. Refer to the manual of the POS/ECR for specific details.
  - a. Set a static IP-address within the subnet but different from IP and gateway of the router:
    - IP-address: 192.168.1.100
    - Subnet mask: 255.255.255.0
    - Gateway: 0.0.0.0
3. Connect the router via standard Ethernet LAN cable to the POS/ECR.
4. Switch on all devices.
5. Check for wireless networks with your laptop. Look for the SSID of your router.
6. Connect to that network, enter the password, and save the connection.
7. Start QProg on your laptop to access the POS/ECR:
  - a. Select Communication – LAN Connection
  - b. Specify the programmed IP-address of the POS/ECR
  - c. Start communication.

## 2. External Printer – POS/ECR

### You need:

- Printer with Ethernet LAN port
- Ethernet Wireless Bridge
- QUORION POS or electronic cash register (ECR)
- Router

### Topology:



### Configuration:

1. Configure your router. Refer to the manual of your router for specific details.
  - a. Specify the SSID (Service Set Identifier) – the name that identifies the wireless network.
  - b. Specify a security option and a password.
  - c. Set a static IP-address, e.g.:
    - IP-address: 192.168.1.2
    - Subnet mask: 255.255.255.0
    - Gateway: 192.168.1.1
    - DNS-server: 192.168.1.1
2. Configure the POS/ECR. Refer to the manual of the POS/ECR for specific details.
  - a. Set a static IP-address within the subnet but different from the other devices:
    - IP-address: 192.168.1.100
    - Subnet mask: 255.255.255.0
    - Gateway: 0.0.0.0
3. Configure your wireless bridge. Refer to the manual of the bridge for specific details.
  - a. Program the same SSID, security option and password as you specified for the router.
  - b. Set a static IP-address within the subnet but different from the other devices:
    - IP-address: 192.168.1.20
    - Subnet mask: 255.255.255.0
    - Gateway: 0.0.0.0
4. Configure the printer. Refer to the manual of the printer for specific details.
  - a. Set a static IP-address within the subnet but different from the other devices:
    - IP-address: 192.168.1.50
    - Subnet mask: 255.255.255.0
    - Gateway: 0.0.0.0
5. Connect the router via standard Ethernet LAN cable to the POS/ECR.
6. Connect the bridge via standard Ethernet LAN cable to the printer.
7. Switch on all devices.
8. Use external printer as usual.

### 3. POS/ECR Network

**You need:**

- 2 or more QUORION POS or electronic cash registers (ECR)
- Router
- Ethernet Wireless Bridge

**Topology:**



**Configuration:**

1. Configure your router. Refer to the manual of your router for specific details.
  - a. Specify the SSID (Service Set Identifier) – the name that identifies the wireless network.
  - b. Specify a security option and a password.
  - c. Set a static IP-address, e.g.:
    - IP-address: 192.168.1.2
    - Subnet mask: 255.255.255.0
    - Gateway: 192.168.1.1
    - DNS-server: 192.168.1.1
  
2. Configure your wireless bridge. Refer to the manual of the bridge for specific details.
  - a. Program the same SSID, security option and password as you specified for the router.
  - b. Set a static IP-address within the subnet but different from the other devices:
    - IP-address: 192.168.1.20
    - Subnet mask: 255.255.255.0
    - Gateway: 0.0.0.0
  
3. Configure the first POS/ECR. Refer to the manual of the POS/ECR for specific details.
  - a. Program the cash register network parameters:
    - Register number (53): 1
    - Network size (55): 2
    - Network port (89): 255
  - b. Set a static IP-address within the subnet but different from the other devices:
    - IP-address: 192.168.1.100
    - Subnet mask: 255.255.255.0
    - Gateway: 0.0.0.0
  
4. Configure the second POS/ECR. Refer to the manual of the POS/ECR for specific details.
  - a. Program the cash register network parameters:
    - Register number (53): 2
    - Network size (55): 2
    - Network port (89): 255

- b. Set the static IP-address **same** to the first POS/ECR. Note, that the register number minus one is automatically added to the IP, e.g. 192.168.1.100 becomes 192.168.1.101
  - IP-address: 192.168.1.100
  - Subnet mask: 255.255.255.0
  - Gateway: 0.0.0.0
5. Configure up to 24 POS/ECR on the same way. Take care about a consecutive register number, the right network size, and the **same** IP settings in **all** ECR/POS.
6. Connect the router via standard Ethernet LAN cable to the first POS/ECR.
7. Connect the bridge via standard Ethernet LAN cable to the other POS/ECR.
8. Switch on all devices.
9. Use the register network as usual.

#### 4. Example of a Complex Wireless POS Network



**Recommended QMP settings:**

- Option 93 (Floating Articles)
- Option 92 (Floating Balances) **or** 112 (Floating Clerks)
- Option 157 (Network KP Check Before Printing)
- Option 311 (Table Open On One Network Register)
- Option 412 (Only Master Has Balances)
- Option 431 (TCP Printer Ping Check)
- Parameter 157 (158, 159) = 1 (Master Machine)

**All above configurations were tested with:**

- QUORION QTouch<sup>2</sup>
- QUORION QPrint and QPrint2
- NETGEAR 54 Mbps Wireless Router WGR614 v7
- D-Link Ethernet Wireless Bridge DWL-G810 High-Speed 802.11g