D-Link

DWM-550-G

5G M2M Router

Key Features

5G
SA & NSA

Dual-SIM
Failover

Eth and 4G/5G
Failover

Wi-Fi 6
AX1800

Industrial
Grade Design

VPN
Security
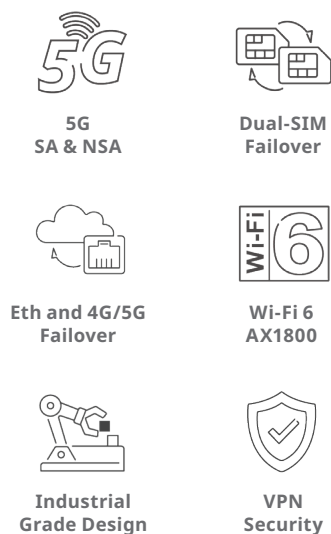
Applications

- Remote Branch
- Smart Bus Stop
- Popup and Booth
- Wi-Fi Hotspot

The DWM-550-G 5G M2M Router provides 5G-NR and 4G-LTE dual-mode connectivity. It is equipped with four gigabit Ethernet ports, one of which can be configured as an Ethernet WAN port. This allows easy switching between broadband and 4G/5G. Additionally, Wi-Fi 6 AX1800 connectivity is provided, making it suitable for a wide range of M2M applications.

5G M2M Network

The DWM-550-G is equipped with automatic WAN failover, superior connection capacity through its cutting-edge 5G NR (FR1) technology. this device supports both SA and NSA 5G architectures and is backward compatible with 4G and 3G, ensuring that throughput is high and latency low.
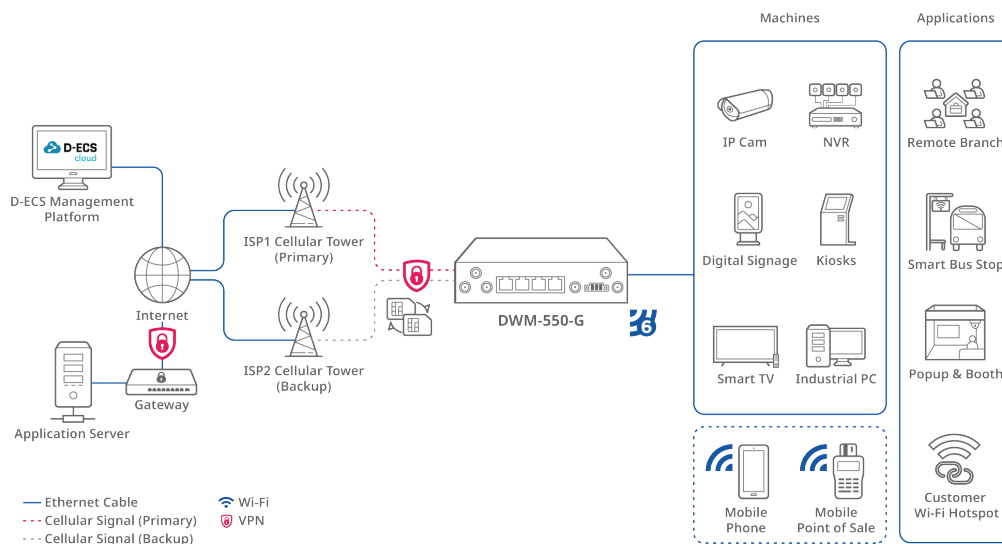
Superior Connection Capability

Empower your operations with the DWM-550-G, which provides a backup connection in case of disruption, thereby ensuring stable connectivity. It features auto-failover, load balancing, and multiple WAN switching options to maintain superb connectivity. The failover capabilities across dual SIM cards and between 5G and Ethernet WAN connections ensure seamless service without interruptions. The device is equipped with multiple VPN protocols including IPSec, OpenVPN, PPTP, L2TP, GRE, and WireGuard. These VPN features enhance security by facilitating encrypted connections, offering versatile tunneling options, and enabling secure remote access. Whether for data protection, creating secure tunnels for remote work, or connecting multiple sites, these VPN capabilities ensure that your network remains secure and flexible.

Suitable for Harsh Environments

The DWM-550-G is designed to withstand harsh environments with its metal casing ensuring durability and operates within a broad temperature range from -30 to 70°C. It supports a wide input voltage range of DC 12-36V. Additionally, the model features built-in Network Address Translation (NAT) and bridge mode, simplifying network setup while enhancing security and interconnectivity.

Connection Diagram

— Ethernet Cable	📶 Wi-Fi
--- Cellular Signal (Primary)	🔒 VPN
--- Cellular Signal (Backup)	

Specifications

Device Interface

- Cellular: 3GPP Rel. 16, 5G (sub-6 GHz), 4G (DL Cat 19/UL Cat 18)
- SIM Slot: 2 x SIM (Nano SIM) with auto failover
- Ethernet: 1 x GE WAN/LAN port, 3 x GE LAN ports
- Wi-Fi: Wi-Fi 6 AX1800 (2.4 GHz/5 GHz)
- Power Input: DC 12-36 V terminal block
- Antenna Connectors: 4 x SMA (F) cellular, 2 x SMA (RP-F) Wi-Fi

Performance[1]

- Maximum Cellular Data Throughput:
  - 5G NSA: 3.4 Gbps (DL) / 550 Mbps (UL)
  - 5G SA: 2.4 Gbps (DL) / 900 Mbps (UL)
  - LTE: 1.6 Gbps (DL) / 200 Mbps (UL)
- Maximum Wi-Fi Data Rate:
  - 2.4 GHz: Up to 574 Mbps
  - 5 GHz: Up to 1201 Mbps

WAN

- WAN Interface: Cellular, Ether-WAN, Wi-Fi
- Multi-WAN Function: Failover, load balance
- Cellular: NAT, bridge
- Ether-WAN: Dynamic IP, static IP, PPPoE
- Connection Monitoring: Ping/DNS query reboot

Network

- LAN & VLAN: DHCP server/relay, port/tag-based VLAN
- Routing: Static, dynamic RIPv1/v2, OSPF, BGP
- DDNS: DynDNS, No-IP, dynamic DO
- QoS: Traffic priority queuing by source/destination, service

Wi-Fi

- Function: Multi SSID, WIDS, AP router mode, station
- Security: WPA2-PSK, WPA2, WPA-PSK/WPA2-PSK, WPA3-SAE, WPA2-PSK/WPA3-SAE, WPA3, 802.1x
- Encryption: WEP, AES, TKIP/AES

Services

- Cellular Toolkit: Data usage, SMS, SIM PIN, network scan
- Event Management: SMS, e-mail

VPN

- VPN Tunnel: IPSec, OpenVPN, PPTP, L2TP, GRE, WireGuard
- VPN Pass Through: IPSec, PPTP, L2TP

Security

- Firewall: SPI firewall, IPS, port forward, ALG
- Access Control: MAC/IP filter, URL blocking

Administration

- Management: SNMPv1/2/3, D-Link D-ECS[2]
- Maintenance: Web UI, diagnostic tools via ping/tracert
- System: FW upgrade, backup and restore config, reboot and reset
- Logging: System log, external syslog server

Monitoring

- Device Status: CPU/memory usage, WAN status, client list
- Cellular Status: IMSI, ICCID, operator, connection state, connected band, RSSI, SINR, RSRP, RSRQ, LAC, TAC, cell ID, MCC, MNC
- Security: VPN status, firewall status
- Statistics and Reports: Cellular signal, cellular usage

Operating Environment

- Operating Temperature: -30 to 70°C (-22°F to 158°F)
- Storage Temperature: -40 to 85°C (-40°F to 185°F)
- Operating Humidity: 10% to 95% non-condensing
- Storage Humidity: 0 to 95% non-condensing
- Dimensions: 160 x 125 x 35 mm

Certifications and Approvals

- Certifications: CE, UKCA

Package Contents (Standard)

- 4 x Cellular SMA Antennas
- 2 x Wi-Fi RP-SMA Antennas
- 1 x RJ-45 Cable
- 1 x Power Adapter
- 1 x Terminal Block (3-pin)

Available Versions

EU SKU (HW: A1)	
5G NR	n1/n3/n5/n7/n8/n20/n28/n38/n40/n41/n71/n75/n76/n77/n78
4G LTE	FDD: B1/B3/B5/B7/B8/B20/B28/B32/B71
	TDD: B38/B40/B41/B42/B43

Global SKU (HW: A2)	
5G NR	n1/n2/n3/n5/n7/n8/n12/n13/n14/n18/n20/n25/n26/n28/n29/n30/n38/n40/n41/n48/n66/n70/n71/n75/n76/n77/n78/n79
4G LTE	FDD: B1/B2/B3/B4/B5/B7/B8/B12/B13/B14/B17/B18/B19/B20/B25/B26/B28/B29/B30/B32/B66/B71
	TDD: B34/B38/B39/B40/B41/B42/B43/B46 (LAA)/B48

TWN SKU (HW: B1)	
5G NR	n1/n2/n3/n5/n7/n8/n20/n25/n28/n30/n38/n40/n41/n48/n66/n71/n77/n78/n79
4G LTE	FDD: B1/B2/B3/B4/B5/B7/B8/B12/B13/B14/B17/B18/B19/B20/B25/B26/B28/B29/B30/B32/B66/B71
	TDD: B34/B38/B39/B40/B41/B42/B43/B46 (LAA)/B48

1 Data rates are theoretical. Data transfer rate depends on network capacity and signal strength.

2 You only have to pay a M2M device license fee when applying for D-ECS license.

Hardware

Front View

Status LEDs · Reset Button · SIM A · SIM B

Back View

Wi-Fi Antenna Connector · WAN/LAN Port · LAN Ports · Wi-Fi Antenna Connector · 5G Antenna Connectors · PWR/GND/IGN Connector

D-Link®