



Wi-Fi CERTIFIED™ Certificate



This certificate lists the features that have successfully completed Wi-Fi Alliance interoperability testing. Learn more: www.wi-fi.org/certification/programs

Certification ID: WFA129986

Product Info

Date of Certification	July 26, 2024
Company	Vodafone Group PLC
Product Name	Ultra HUB7
Product Model Variant	DG4278VF
Model Number	DG4278VF
Category	Routers
Sub-category	Cable, DSL or Other Broadband Gateway (Integrated Home Access Device)

Summary of Certifications

CLASSIFICATION	CERTIFICATION
Connectivity	2.4 GHz Spectrum Capabilities 5 GHz Spectrum Capabilities Wi-Fi CERTIFIED 6® Wi-Fi CERTIFIED 7™ Wi-Fi CERTIFIED™ a Wi-Fi CERTIFIED™ ac Wi-Fi CERTIFIED™ b Wi-Fi CERTIFIED™ g Wi-Fi CERTIFIED™ n
Optimization	WMM® Wi-Fi Agile Multiband™
Security	Protected Management Frames WPA2™-Enterprise 2018-04 WPA2™-Personal 2021-01 WPA3™-Enterprise 2022-12 WPA3™-Personal 2023-12
Spectrum & Regulatory Features	Spectrum & Regulatory



Wi-Fi CERTIFIED™ Certificate

Certification ID: WFA129986



Role: Access Point

Page 2 of 3

Wi-Fi Components

Wi-Fi Component Operating System

Linux

Wi-Fi Component Firmware

23.2

RF Architecture

Bands Supported	Transmit (Tx)	Receive (Rx)
2.4 GHz	4	4
5 GHz	4	4

Certifications

2.4 GHz Spectrum Capabilities

20 MHz Channel Width in 2.4 GHz
40 MHz Channel Width in 2.4 GHz

5 GHz Spectrum Capabilities

20 MHz Channel Width in 5 GHz
40 MHz Channel Width in 5 GHz
80 MHz Channel Width in 5 GHz
160 MHz Channel Width in 5 GHz

Protected Management Frames

Spectrum & Regulatory

802.11d
802.11h

WMM®

WPA2™-Enterprise 2018-04

EAP methods

WPA2™-Personal 2021-01

WPA3™-Enterprise 2022-12

EAP methods
192-bit security

WPA3™-Personal 2023-12

AKM 24
Beacon Protection
SAE-Public Key

Wi-Fi Agile Multiband™

Wi-Fi CERTIFIED 6®

4 antenna support
A-MPDU with A-MSDU
Basic Trigger frame in HE MU PPDU
BSRP Trigger frame
Compressed Block Ack Rx (buffer size 256)
DL MU-MIMO
DL OFDMA
Individual Target Wake Time



Wi-Fi CERTIFIED™ Certificate

Certification ID: WFA129986



Role: Access Point

Page 3 of 3

Wi-Fi CERTIFIED 6® (continued)

LDPC Rx
LDPC Tx
MCS 8-9 Rx
MCS 8-9 Tx
MCS 10-11 Rx
MCS 10-11 Tx
MU EDCA Parameter Set element
MU-RTS Trigger frame
Operating mode indication
SU beamformer
SU-MIMO
TXOP RTS Threshold
UL OFDMA

Wi-Fi CERTIFIED 7™

A-MPDU with A-MSDU
BSRP Trigger frame
BSS critical update
Compressed Block Ack Rx (buffer size 256)
DL MU-MIMO
DL OFDMA
Dynamic MU SMPS
EMLSR (Enhanced Multilink Single-Radio)
LDPC Rx
LDPC Tx
MCS 8-9 Rx
MCS 8-9 Tx
MCS 10-11 Rx
MCS 10-11 Tx
MCS 12-13 Rx
MCS 12-13 Tx
Multi-link reconfiguration – AP removal
Multi-link reconfiguration – AP restart
Multi-RU

Wi-Fi CERTIFIED 7™ (continued)

MU-RTS Trigger frame
Operating mode indication
STR (Simultaneous Transmit and Receive)
SU-MIMO
Triggered uplink access optimization
UL MU-MIMO
UL OFDMA

Wi-Fi CERTIFIED™ a

Wi-Fi CERTIFIED™ ac

A-MPDU with A-MSDU
DL MU-MIMO
LDPC Rx
LDPC Tx
MCS 8-9 Rx
Short Guard Interval
STBC
SU beamformer

Wi-Fi CERTIFIED™ b

Wi-Fi CERTIFIED™ g

Wi-Fi CERTIFIED™ n

A-MPDU Tx
HT Duplicate Mode
OBSS on Extension Channel
Short Guard Interval
STBC