

Expansion kit WWN04

for 4G/5G module and SIM card

EXPANSION KIT TO INSTALL A 4G/5G CARD FOR MOBILE NETWORK

The Shuttle X-PC accessories WWN04 allow almost all Shuttle X-PC products to be upgraded with an 4G or 5G function for mobile network. The 4G/5G card will occupy a M.2 2280 slot. WWN04 includes an adapter card with 1 antenna and antenna cables. The required 4G card (in M.2 2280 format) or 5G card (in M.2 2280 format) and an activated Nano SIM card is not included in the scope of delivery.



CONTENTS

- Adapter card (Daughter board LM208)
- Fastening screw for M.2/LTE card
- 1x antenna
- 1x antenna cable with toothed lock washer and screw nut
- Quick installation guide

ADAPTER CARD

The daughter adapter card has to be installed into a compatible M.2 2280 slot of the Shuttle products DS600 or AG502 and offers the following slots:

- M.2 2280/2280 Key B compatible slot for 4G/5G cards
- SIM slot supports one SIM card in Nano format

FOUR ANTENNAS

- 4G/5G dipole omnidirectional antenna
- Colour: black
- Length: 165x50x17 mm
- Radiation: UHF
- Connector: SMA male

FOUR ANTENNA CABLES

- 4x cable lengths: 15, 17, 23, 30 cm
- Connectors: SMA (female) and SMA (male)

COMPATIBILITY

WWN04 is compatible with the following Shuttle products:

- Shuttle X-PC series DS600 series, X411H series, X4810 and X8850/2
- Shuttle X-PC all in one X5000 series and P55L series

OTHER REQUIRED COMPONENTS

- SIM card in Nano format
- a 4G or 5G mobile network card in M.2 format:

Type	M.2 form factor	Interface	Antennas
4G/LTE card	M.2 2280 Key B	USB 2.0	2
5G card	M.2 2280 Key B	PCIe or USB 3.0	4

Successfully tested mobile network cards:

- Sierra EM7350 (4G, CAT 12, for Europe and North America)
- Sierra EM7350 (4G, CAT 12, for Africa)
- Huawei ME909S (5G, CAT 14, for Africa, Australia, New Zealand)
- Quectel 5G08L (5G, CAT 14, for Africa, Australia, Brazil)
- Quectel 5G0000A (5G, Sub 6 GHz, Global, except China)



Installation Guide

1. Locate the M.2 key slots on the motherboard of Shuttle DS500 series or X50V9 series.

The marker location shows the M.2 2280 slot intended for the installation of WLAN (see photo).

Shuttle XPC slim DS500 Series:

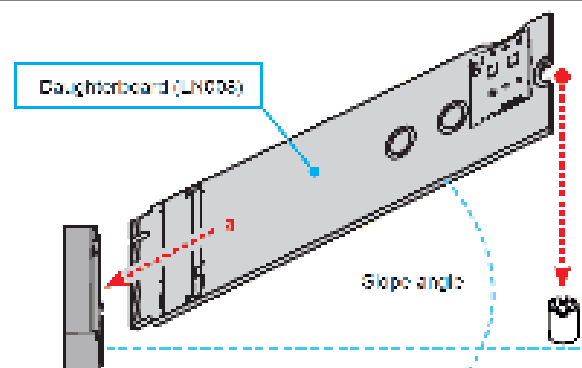


Shuttle XPC slim X50V9 / P550 Series:

Note: the daughterboard LN008 must be installed above the existing WLAN module.



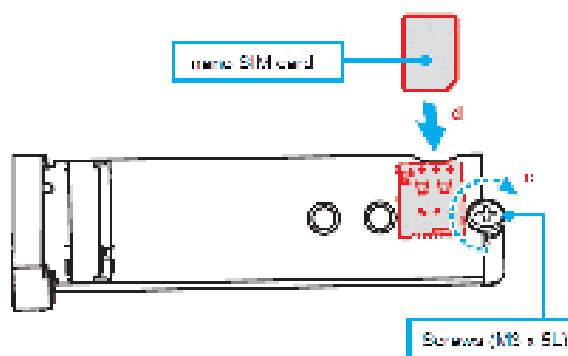
2. Install the daughterboard (LN008) into the M.2 slot and secure with the screw.



3. When inserting the SIM card, please insert the SIM card into the SIM card slot and push the SIM card until it clicks into place.

When removing the SIM card, push the SIM card in to eject it from its slot and remove the SIM card.

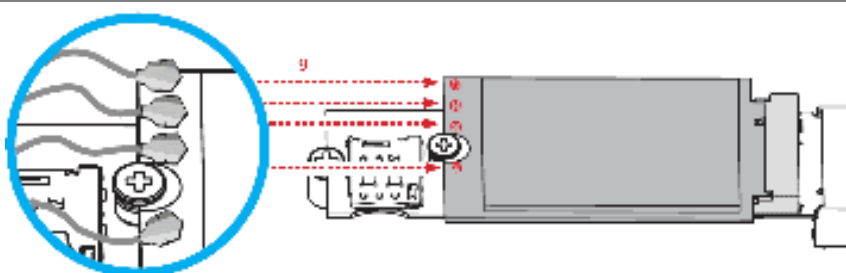
nano SIM card: The SIM card's gold-coloured contacts facing down and its cut-off corner facing inside.



4. Please install the 3G/4G/LTE module in the relevant slot on the daughterboard (LNU08), then tighten the screw with bolt firmly. As shown, connect the four antenna cables to the 3G module (two antenna cables to the 4G module).

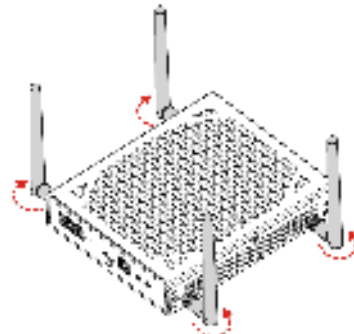
WiFiNUV supports the following WWAN modules for wireless network:

Card Type	ML/ form factor	Interface	Antennas
4G	M.2-4G-4G (SMT)	5-4-4G	2
5G	M.2-5G-4G (SMT)	4G-4G-4G-4G	4



5. Please refer to the quick guide of the Shuttle's product website to install the four antennas.

Shuttle XPC slim QS50U Series:



Shuttle XPC slim-Honda X50V9 / P55U Series:

