

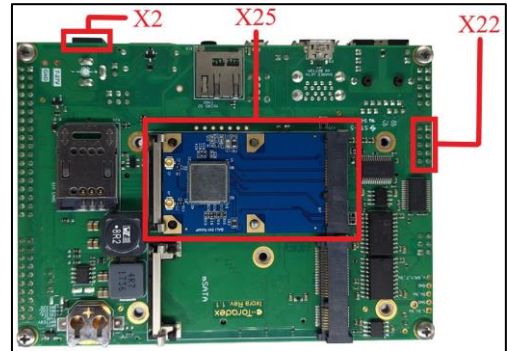
EVIA PCIe EVK & EVIA M.2 PCIe EVK

802.11 ac/a/b/g/n hosted Wi-Fi Module EVK

- ❖ Unpack the Kit and make sure the following items are available.
 - 1 x Toradex Ixora board and power adapter
 - 1 x EVIA PCIe card
 - 1 x USB to RS232 converter and DB9 Female Adapter
 - 1 x MHF4 flag antenna
- ❖ Insert the EVIA PCIe EVK into the Ixora mini PCIe X25 slot
- ❖ Mount Female DB9 adapter on X22 port of Ixora board and then Connect USB RS232 adapter between PC USB port and female DB9 adapter.
- ❖ Check for the detected serial port on PC and open it using PuTTY
 - **For more information see at the end of the document
- ❖ Power the Ixora board by connecting power adaptor to X2
- ❖ Press On/Off button SW1 on Ixora Carrier Board to power-up the board and check the LED1, it should be ON.
- ❖ Power ON the Access Point with Known ESSID in open mode
- ❖ After boot up, login with password "root", follow the below commands to connect to AP in **open mode**:
 - o \$ killall wpa_supplicant
 - o \$ killall hostapd
 - o \$ iw dev

```
root@apalis-imx6:~# iw dev phy#0
Interface wlp1s0
  ifindex 6
  wdev 0x1
  addr 50:de:19:89:70:da
  type managed
  txpower 0.00 dBm
```

- o \$ rfkill unblockall
- o \$ ifconfig <interface name> up
- o \$ iw dev <interface name> scan
- o \$ iw dev <interface name> connect <ESSID>
- o \$ iw dev <interface name> link
- o \$ udhcpc -i <interface name>
- o \$ ping <AP_IPv4_Address>



- ❖ Follow the below commands to connect to AP in **secure mode**:

- o \$ killall wpa_supplicant
- o \$ killall hostapd
- o \$ iw dev

```
root@apalis-imx6:~# iw dev phy#0
Interface wlp1s0
  ifindex 6
  wdev 0x1
  addr 50:de:19:89:70:da
  type managed
  txpower 0.00 dBm
```

- o \$ rfkill unblockall
- o \$ ifconfig wlan0 up
- o \$ iw dev wlan0 scan
- o \$ vi /etc/wpa_supplicant.conf
- o Edit and save the configuration file wpa_supplicant.conf content as below

```
ctrl_interface=/var/run/wpa_supplicant
update_config=1
network={
  ssid="replace with your network name"
  proto=RSN #for WPA2-PSK
  key_mgmt=WPA-PSK
  auth_alg=OPEN
  pairwise=CCMP
  group=CCMP
  psk="replace with your network password"
}
```

- o \$ wpa_supplicant -D nl80211 -i wlan0 -c /etc/wpa_supplicant.conf -B
- o \$ iw dev <interface name> link
- o \$ udhcpc -i <interface name>
- o \$ ping <AP_IPv4_Address>

**** Detecting Serial port**

- o Run the below command to know detected serial port (highlighted with red box)
- \$ dmesg


```
usb 1-1.6: pl2303 converter now attached to ttyUSB0
```
- o Download PuTTY and open it, change the configurations as following

