

# Regulatory WLAN Antenna Information

(English Language Required for Intel Regulatory Review / Approval)

**Brand Name: ASUS**

**Platform: A7**

**Antenna Part Number: 14-152062011**

**Antenna Vendor: Tyco Electronics**

**Antenna Part Number: 1770431-1 (for main )**

## Antenna Sample / Antenna Data Requirements for worldwide regulatory approval

Section	Description of Required OEM / ODM Antenna Information	US / IC	EU	Japan	Taiwan	S.Korea
1A	Part Number for Antenna only	Required	Required	Required	Required	Required
1B	Antenna Manufacturer Name	Required	Required	Required	Required	Required
1C	Description of Antenna Type	Required	N/A	N/A	N/A	N/A
1D	Part number of Antenna Assembly / cable impedance, length & diameter.	Required	Desired	Desired	Desired	Desired
1E	Main & Aux antenna (Peak Gain W/ cable loss)	Required	Required	Required	Required	Required
	1E OR 1F, 1G, 1H					
1F	Main & Aux antenna (Peak Gain only)	Required	Required	Required	Required	Required
1G	VSWR of cable including connector	Required	Required	Required	Required	Required
1H	Main & Aux antenna (Cable loss W/ connector)	Required	Required	Required	Required	Required
2	Dimensioned Photographs <b>and</b> Drawings of main & auxiliary antennas	Required	Required	Required	Required	Required
3	Radiation patterns of antennas loaded in the host platform.	Required	Desired	Required	N/A	Required
4	Platform model name / number - correlated to antenna manufacturer and antenna part number	Required	Required	Desired	Required	Desired
5	Photograph(s) and Drawings showing location of antennas in platform. <b>(S. Korea requires photographs of antennas for approval submission). Taiwan requires pictures of each antenna type shown in the system.</b>	Required	Required	Desired	Required (Photos)	Required (Photos)
6	Mech. drawings / photos with dimensions of antenna locations and distance from end-user (For evaluation of SAR testing requirement).	Required	N/A	N/A	N/A	N/A
7	Photograph(s) or Drawings showing the location of all antennas (WLAN, BT, other) and distance between those transmitting antennas. Information will be used to evaluate whether co-location testing is required.	Required	N/A	N/A	N/A	N/A

**Singapore:** If product is shipping to Singapore the following is required:

- **Photograph of miniPCI card location in laptop to determine if it is easily accessible by the user. (See Section 4. Host Platform Information).**

# Antenna Information

## Section 1. Antenna Assembly Specifications

### Antenna Assembly Summary:

1A Antenna Part Number	1B Manufacture	1C Antenna Type	1D Cable Assembly Part Number and Information	1E Peak Gain W/ Cable loss (dBi)	1F Peak Gain w/o Cable Loss (dBi)	1G VSWR	1H Cable Loss (dBi)
(P/N:1770431-1)  Main antenna	Tyco Electronics	IFA	(P/N: 1-177408-4) 50 ohm Coaxial. length: 630 mm diameter: 1.13mm Connector: Tyco	2400-2500MHz -1.02dBi (peak)	2400-2500MHz 0.64 dBi (peak)	2400-2500MHz 2.0 max	2400-2500MHz -1.665dBi (peak)
			5.150-5350MHz 2.21 dBi (peak)	5.150-5350MHz 4.78 dBi (peak)	5.150-5350MHz 2.0 max	5.150-5350MHz -2.579dBi (peak)	
			5470-5875MHz 4.72 dBi (peak)	5470-5875MHz 7.49 dBi (peak)	5470-5875MHz 2.0 max	5470-5875MHz -2.77 dBi (peak)	

# Section 2. Dimensioned Photos and Drawings of Antennas

## Main Antenna Dimensioned Drawing:



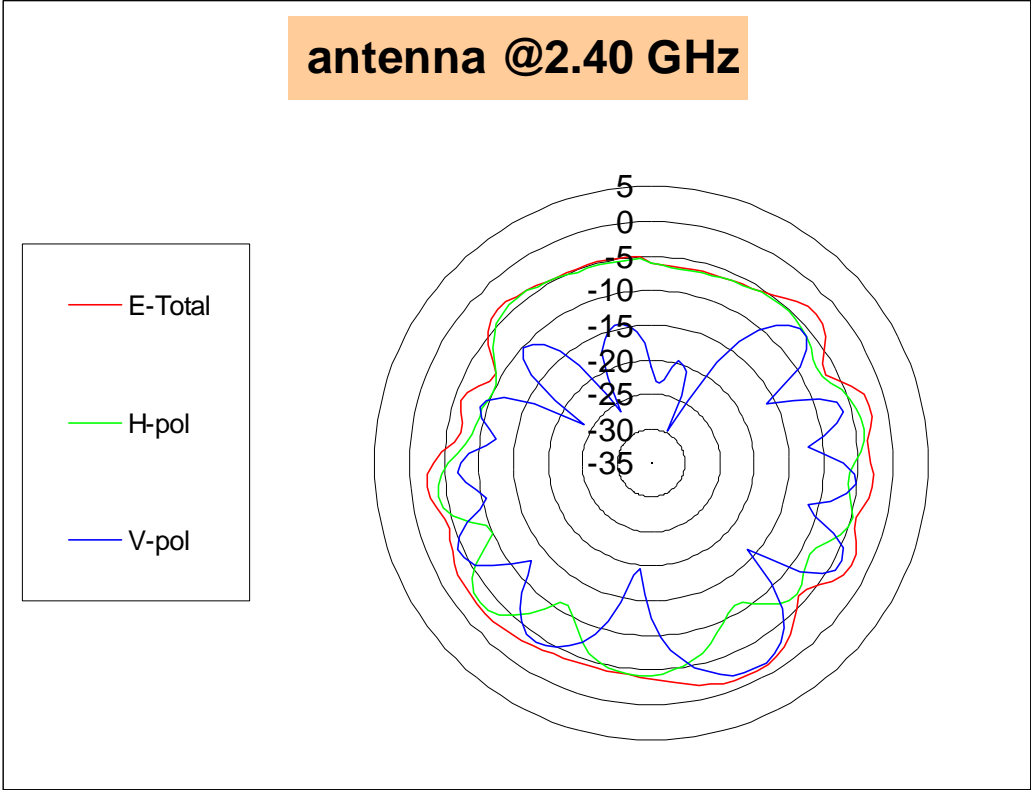
## Main Antenna Photo:



# Section 3. Radiation characteristics of antenna Loaded in Host Platform

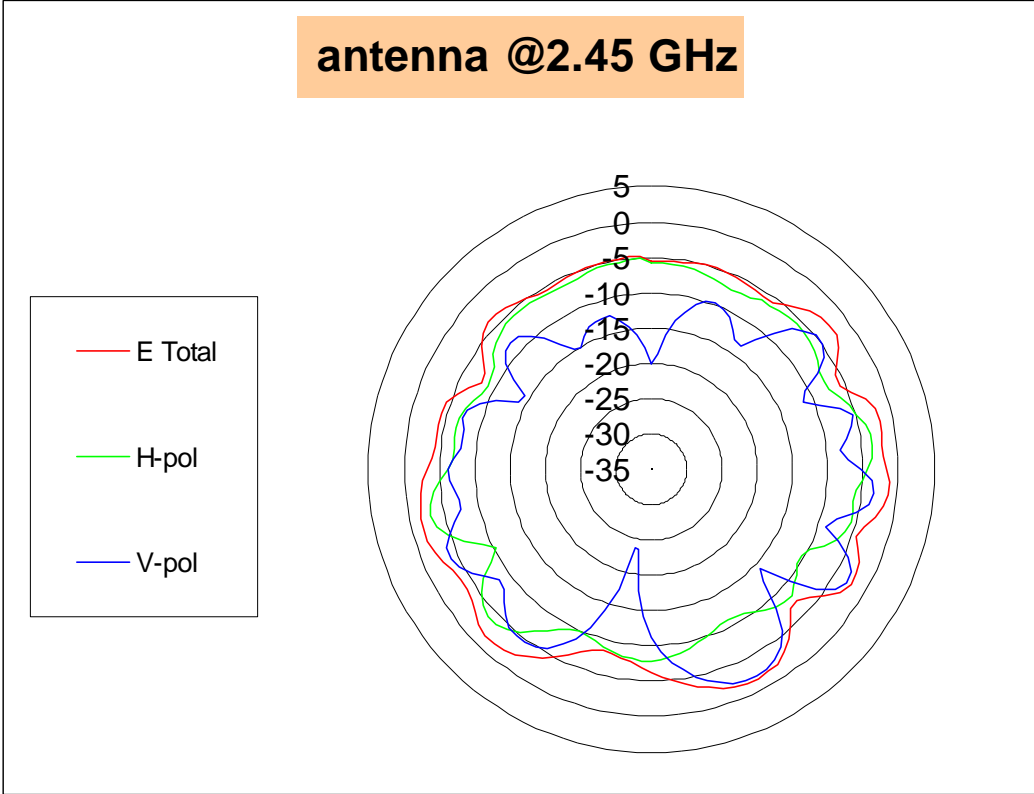
## 2400-2500MHz radiation characteristic

Main antenna: 2400 MHz

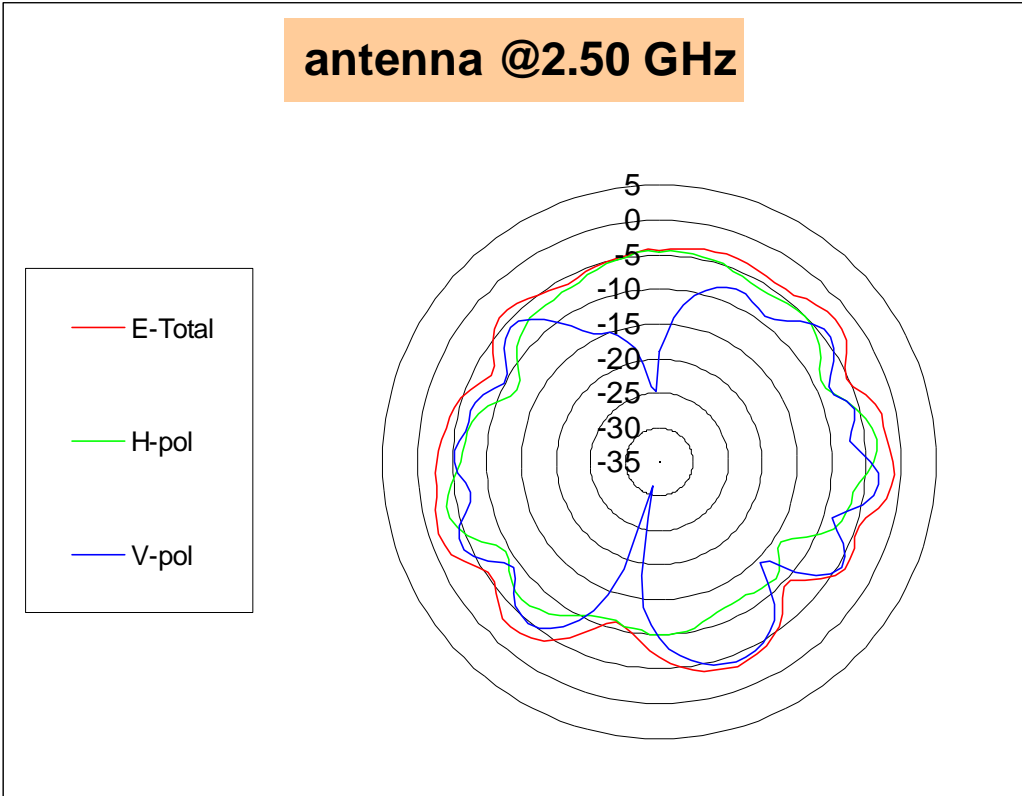


	H-pol	V-pol	Total
Peak Gain	-3.09	-1.66	-1.15

Main antenna: 2450 MHz



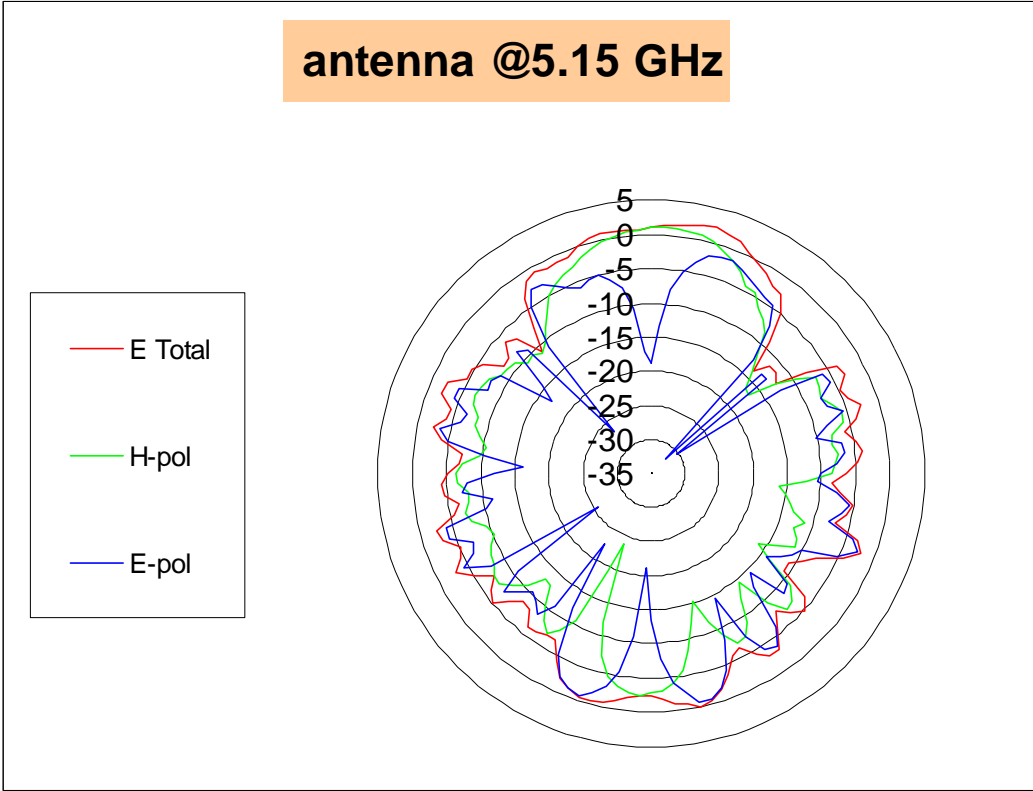
	H-pol	V-pol	Total
Peak Gain	-3.09	-2.24	-1.34



	H-pol	V-pol	Total
<b>Peak Gain</b>	<b>-3.43</b>	<b>-3.00</b>	<b>-1.02</b>

5150-5350 MHz radiation characteristic

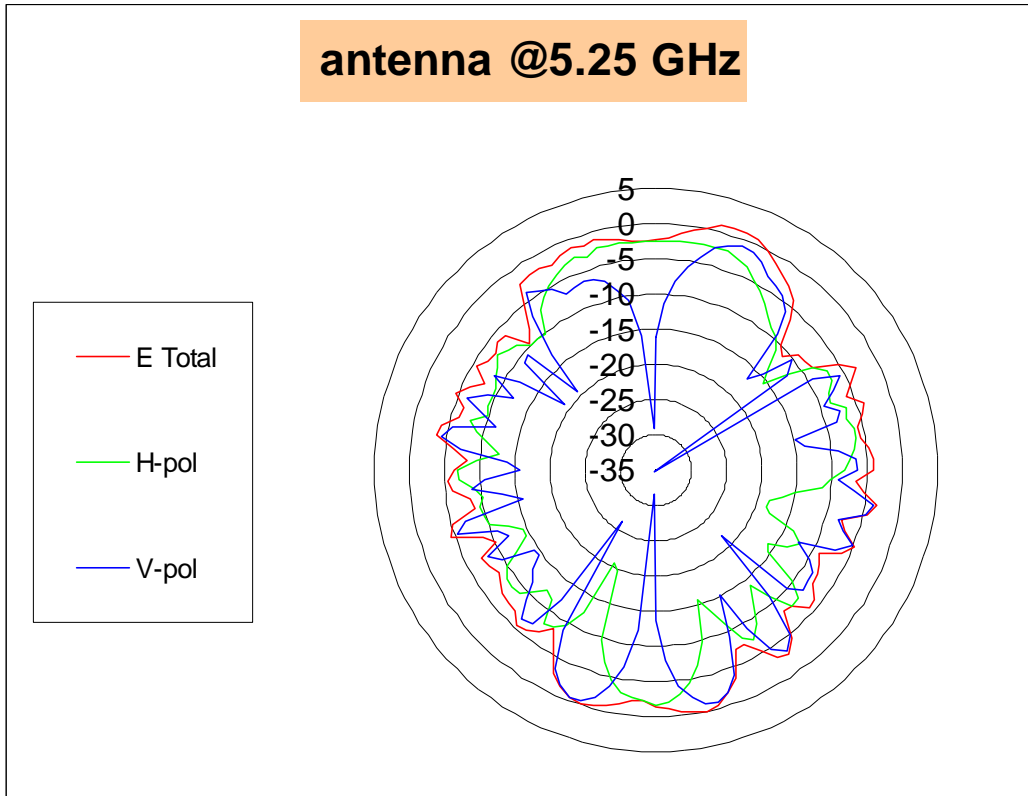
Main antenna: 5150 MHz



	H-pol	V-pol	Total
<b>Peak Gain</b>	<b>1.02</b>	<b>-0.84</b>	<b>2.21</b>

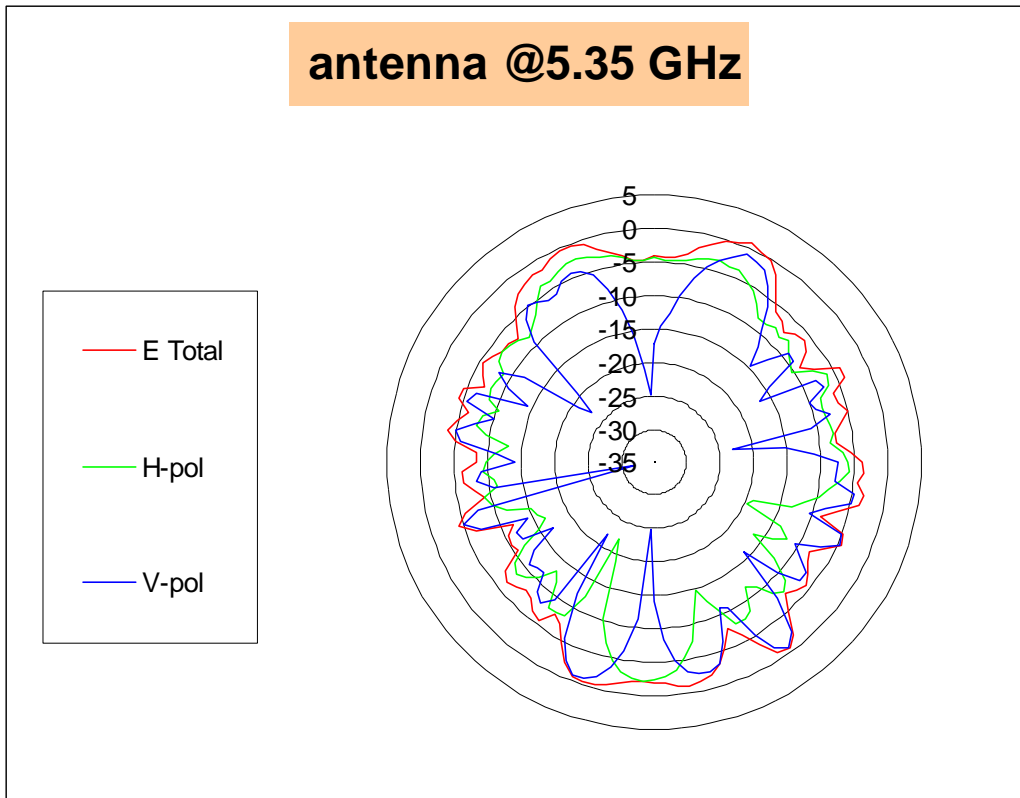


Main antenna: 5250 MHz



	H-pol	V-pol	Total
Peak Gain	-1.67	-0.43	1.18

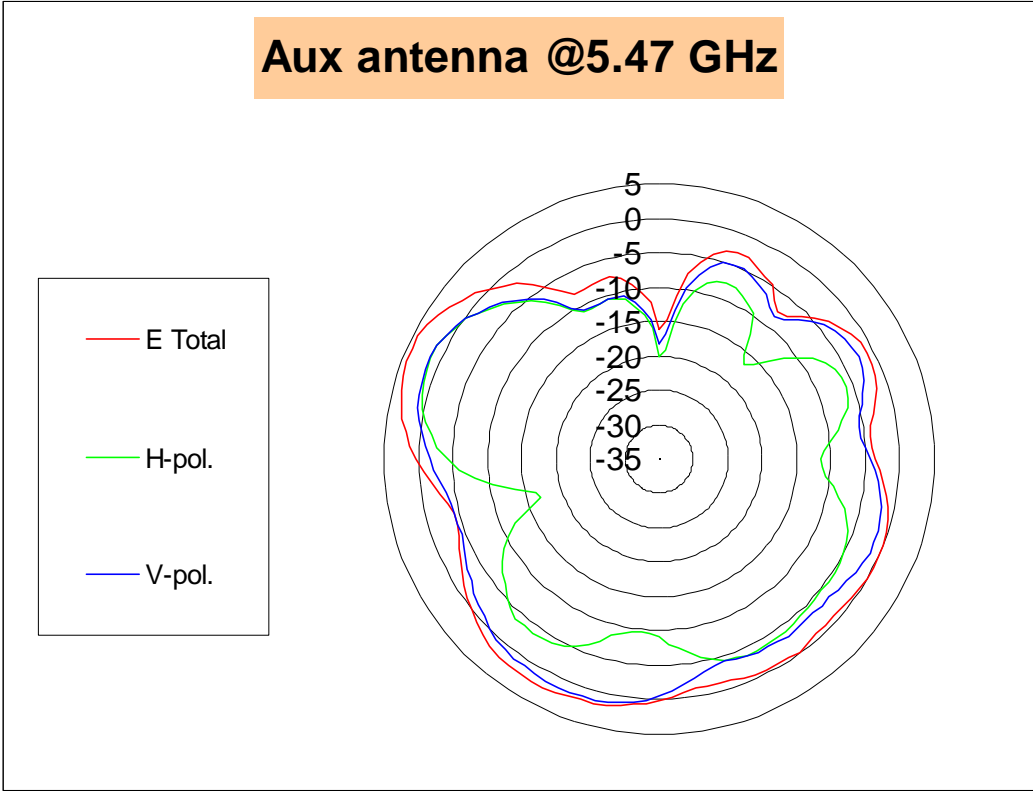
Main antenna: 5350 MHz



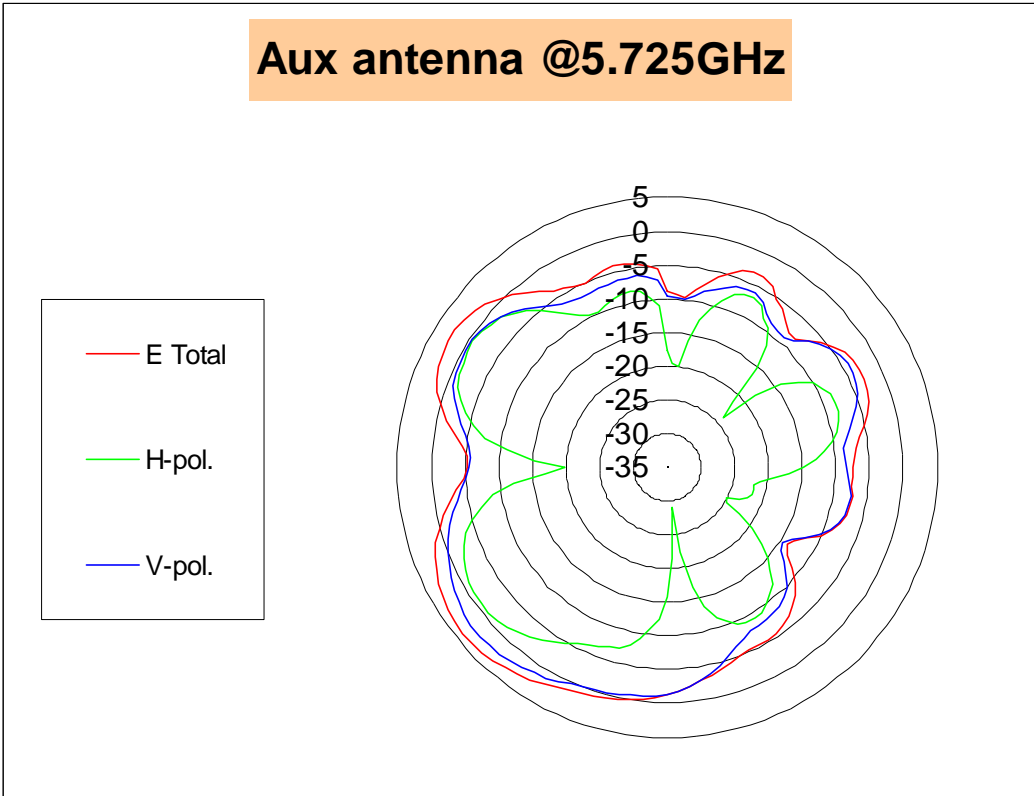
	H-pol	V-pol	Total
Peak Gain	-2.20	-0.85	0.86

5470-5875Hz radiation characteristic

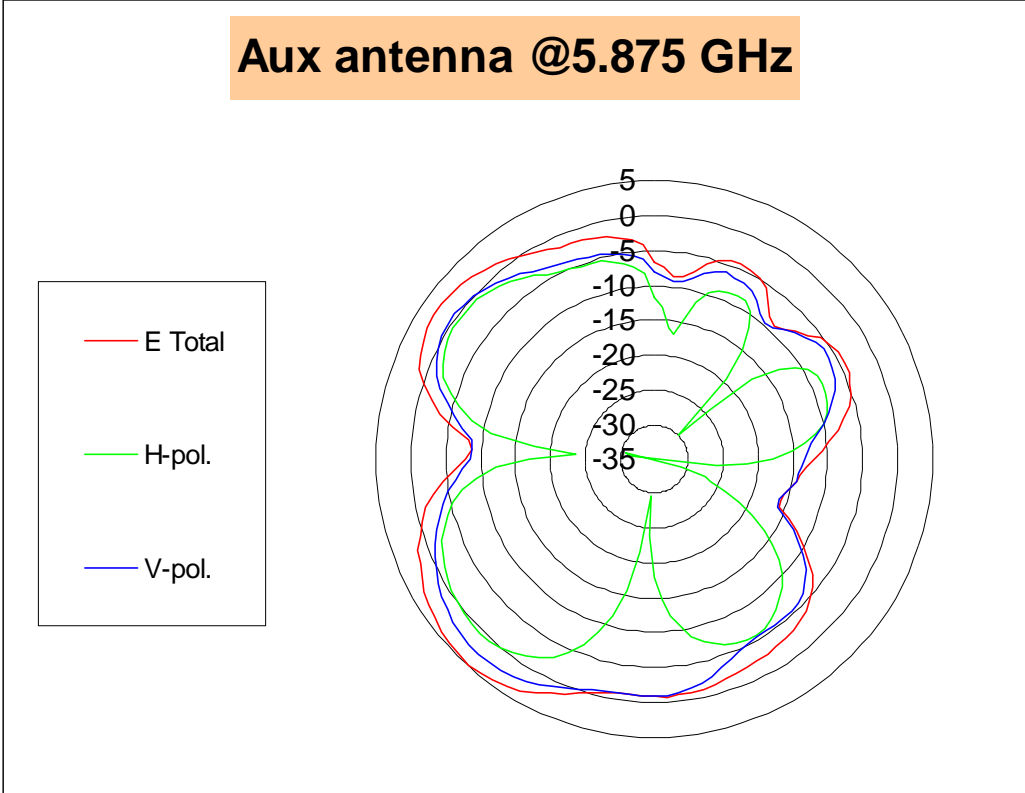
Main antenna: 5470 MHz



	H-pol	V-pol	Total
<b>Peak Gain</b>	<b>1.29</b>	<b>1.44</b>	<b>4.38</b>



	H-pol	V-pol	Total
<b>Peak Gain</b>	<b>-0.77</b>	<b>2.34</b>	<b>3.99</b>



	H-pol	V-pol	Total
<b>Peak Gain</b>	<b>0.44</b>	<b>2.74</b>	<b>4.72</b>

## Section 4. Host Platform Information

OEM / ODM Host platform: (XXXXXXX) platform correlated to antenna data  
Rating Label Photo:

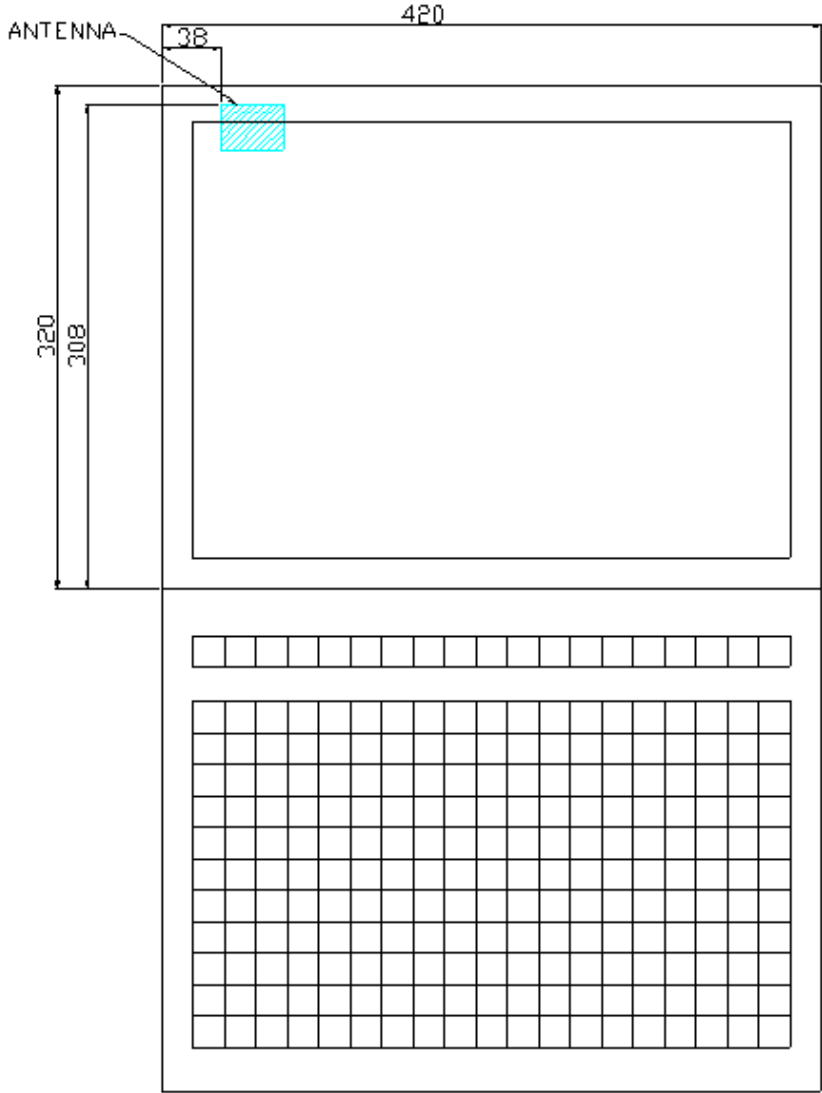


Module Location Photo: (if Singapore required)



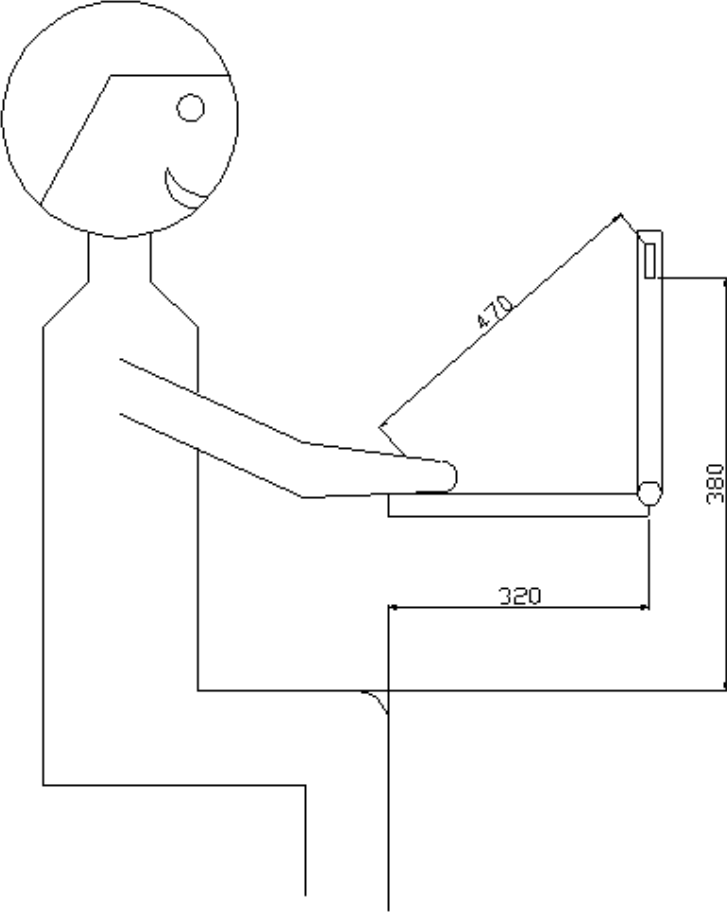
# Section 5. Antenna Host Platform Location Information

Include a dimensioned photos or dimensioned drawings of main and auxiliary antenna placements.



**Section 6. Antenna dimensional information for SAR evaluation**

Include a dimensioned photos or dimensioned drawings showing the distance (mm) between the transmit (main) antenna and the user (excluding hands, wrist, feet, and ankle)

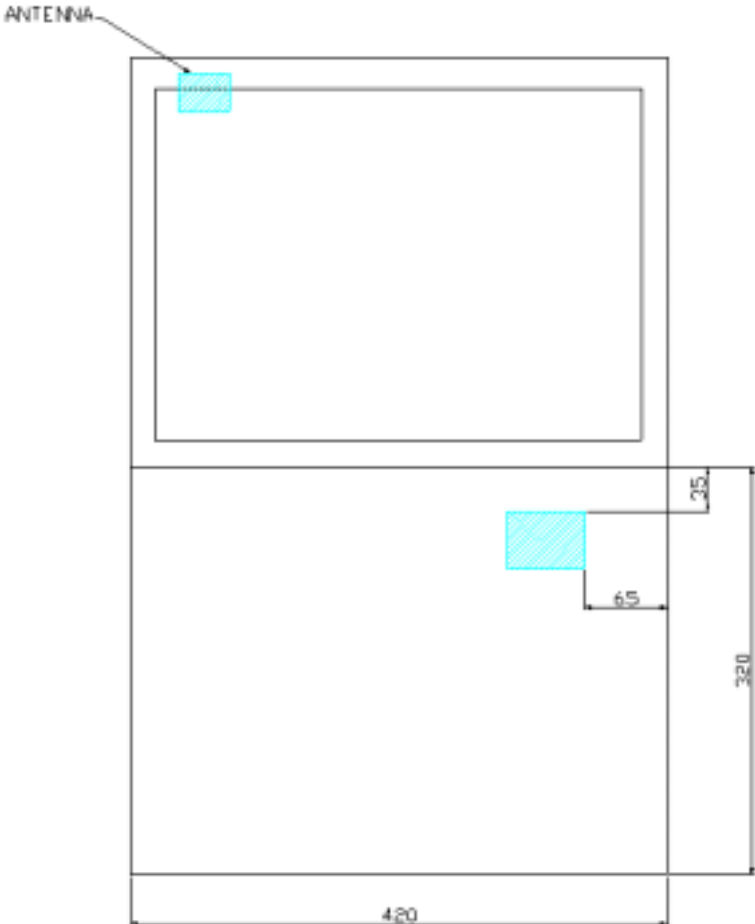




# Section 7. Diagram Example of Co-Location Antenna Separation

Indicate distance between WLAN module antennas and Bluetooth/other radio antenna element.

(Note: Due to the evolving rules regarding co-location, each platform will need to be reviewed on a case by case basis)



## Section 8. Local representative contact information

Local representative contact information is required for regulatory support for target countries below.

	Local company name	Contact name	Phone number	FAX Number	e-Mail Address	Notes
<b>Argentina, Brazil Mexico</b>	Asus Computer International	MARGARET CHEN	510-872-4098	510-608-4555	Margaret_chen@asus.com.tw	
<b>Indonesia</b>	No	Willy Halim	+628-187-067-33	+62-21-453-2925	Willy_halim@asus.com.tw	Proscos is the disti carrying WLAN
<b>Israel</b>	Currently no need. Will do by local if needed					
<b>Malaysia</b>	No	Jacky Lim	+601-260-105-58	603-2145-8379	Jacky_lim@asus.com.tw	Build tech , the disti , is helping us in WLAN certification now.
<b>Singapore</b>	Asustek Computer (S) Pte Ltd	Ernest Chng	(65) 6720-3835	(65) 6720-3836	Ernest_chng@asus.com.tw	Telecommunication Dealer's License No: DB101867
<b>USA, Canada</b>	Asus Computer International	MARGARET CHEN	510-872-4098	510-608-4555	Margaret_chen@asus.com.tw	
<b>Germany</b>	ACG	Eric Chen	+49-2102-5609-310		Eric_chen@asus.com.tw	
<b>Italy, Greece, Malta</b>	ACIT	Leo	+39-02-2023-1027		Leo_chen@asus.com.tw	
<b>Russia</b>	No	Angela	+7095-231-4670		Angela_hsu@asus.com.tw	
<b>Austria</b>	No	Shawn	7460		Shawn_chang@asus.com.tw	
<b>UK</b>	No	Allen	+44-1908-51-8001		Allen_yen@asus.com.tw	
<b>France</b>	No	Emilie	+331-647-33043		Emilie_lu@asus.com.tw	
<b>E.E.</b>	No	Jeremin	+7915		Jeremin_hsieh@asus.com.tw	
<b>Swiss, Nordic Benelux, Spain &amp; Other place in Europe</b>	ACIT	Leo	+39-02-2023-1027		Leo_chen@asus.com.tw	
<b>Middle East</b>	No	George	7791		George_Su@asus.com.tw	
<b>ACPC</b>	ACPC	Benson	7888		Benson_lin@asus.com.tw	
<b>JP</b>	No	Yvens	7607		Yvens_tseng@asus.com.tw	