



Foxconn Interconnect Technology

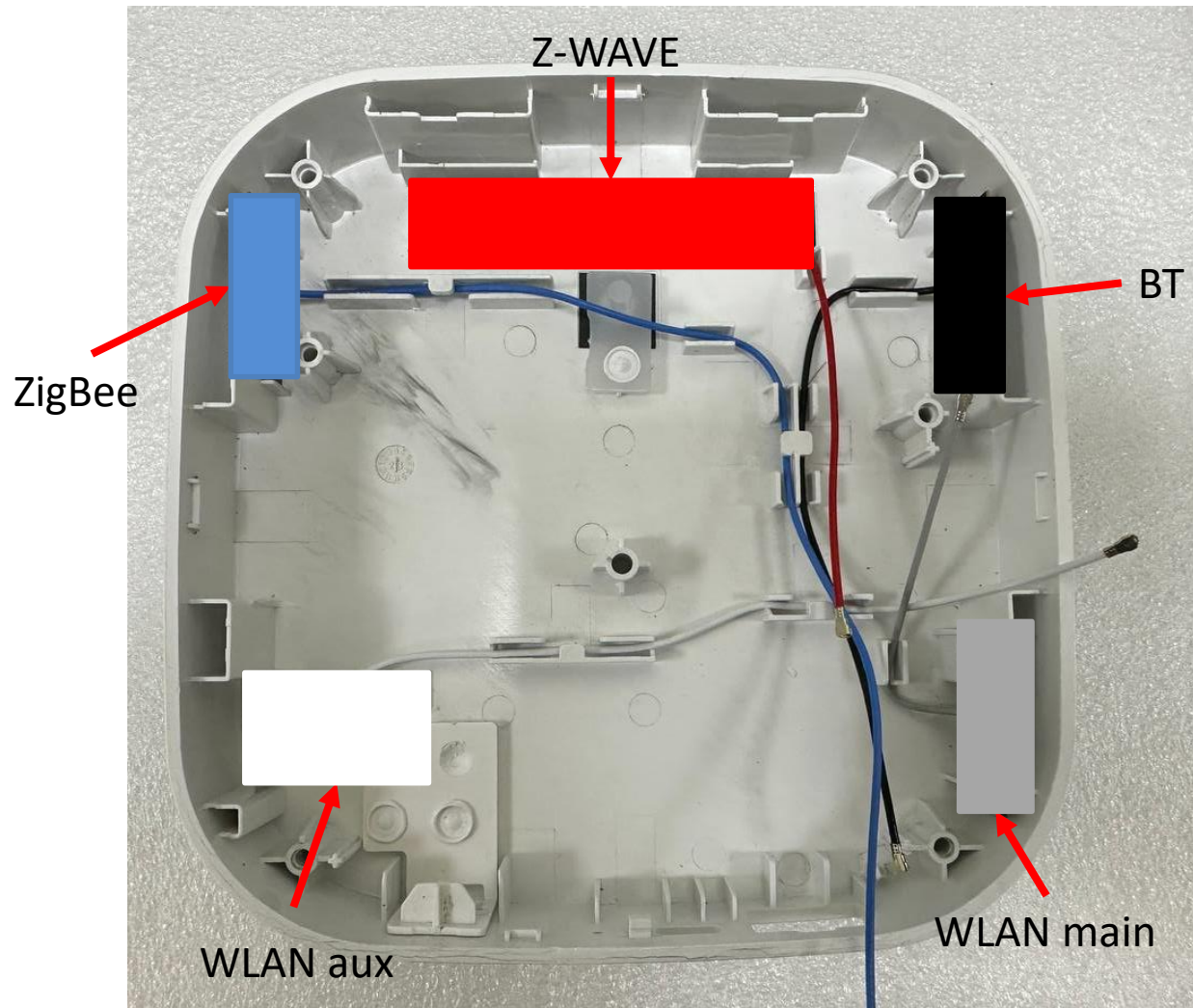
Provide Interconnect to Enhance Communication for a Better Life.

Smart Hub Antenna Evaluation Report

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FIT, 2024/ 01/04

Antenna Placement



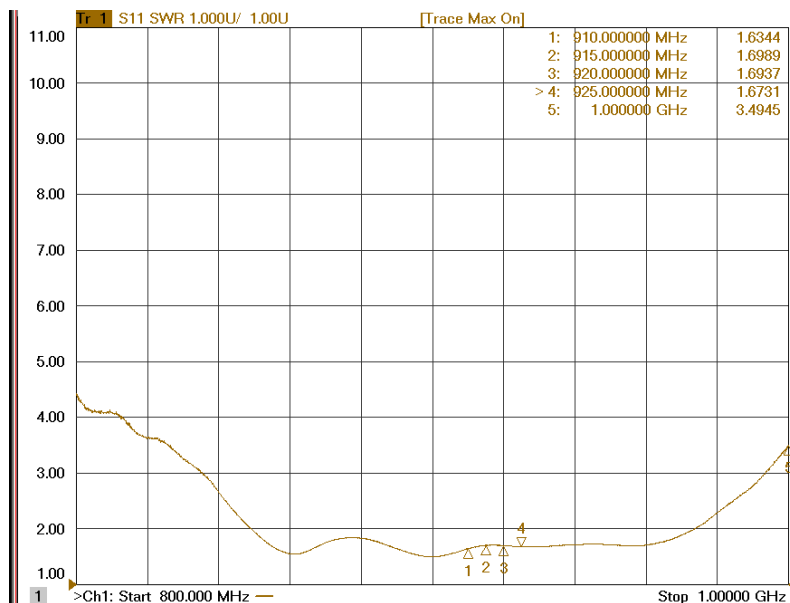
Antenna Specification

Antenna Electrical Properties				
Frequency Range	Z-Wave	ZigBee	BT	WLAN
	910-920 MHz	2400-2500 MHz	2400-2500 MHz	2.4+5GHz
Efficiency(%)	30%	30%	30%	30%
Peak Gain(dBi)	3	3	3	4
Average Gain(dB)	-5	-5	-5	-5
VSWR	3	3	3	3
Polarization	Linear			
Impedance	50 Ω			

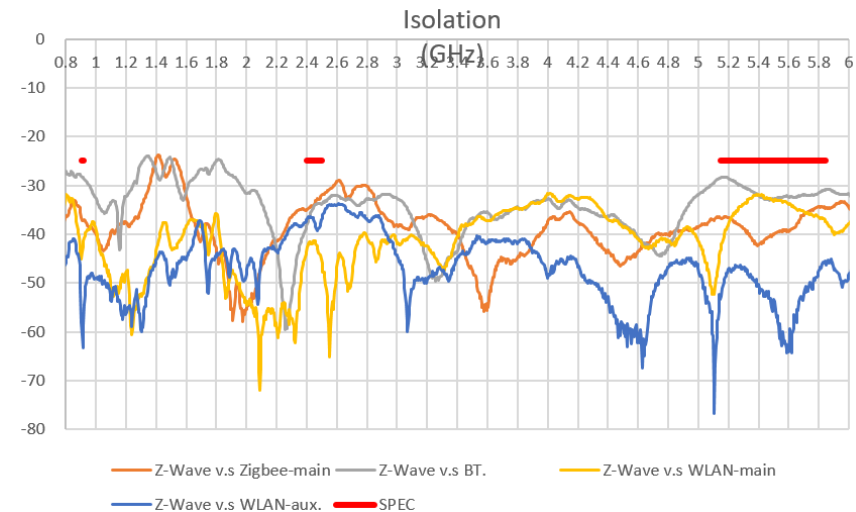
Z-Wave Antenna

Antenna Test Result _Z Wave

VSWR



Isolation



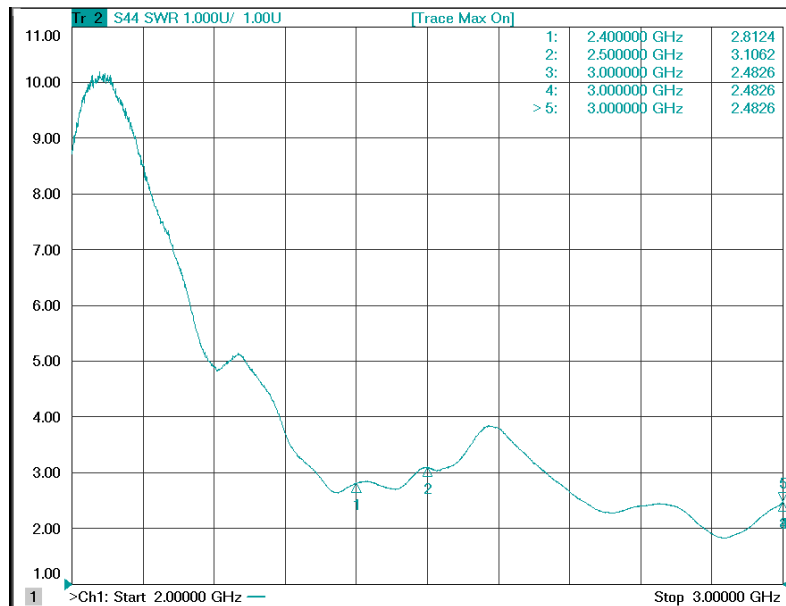
Efficiency

Frequency	910	915	920	925	930
Peak EIRP (dBm)	1.90	1.74	1.68	1.62	1.57
Efficiency (%)	54.64	52.92	52.18	51.55	51.02
Average Gain (dB)	-2.62	-2.76	-2.83	-2.88	-2.92

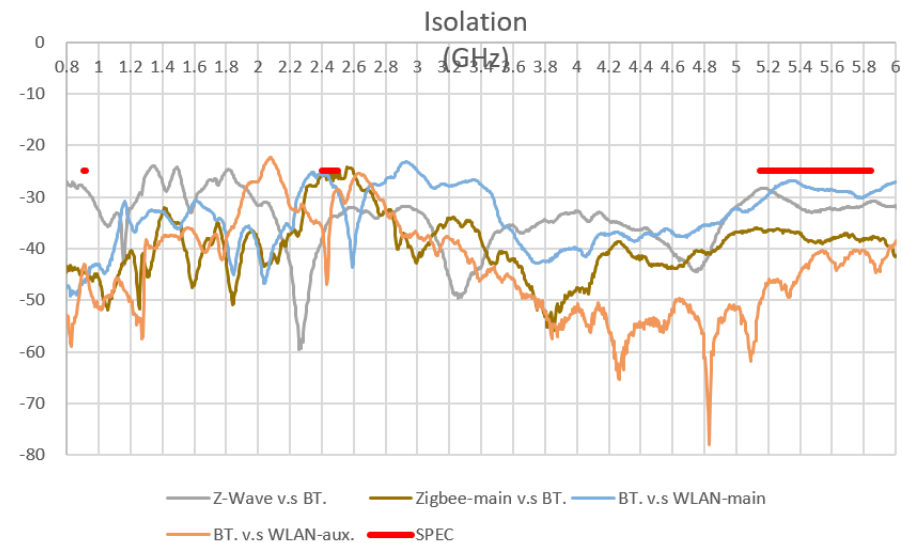
BT Antenna

Antenna Test Result_BT

VSWR



Isolation



Efficiency

Frequency	2400	2450	2500
Peak EIRP (dBm)	2.74	2.24	2.68
Efficiency (%)	49.49	60.77	59.27
Average Gain (dB)	-3.05	-2.16	-2.27

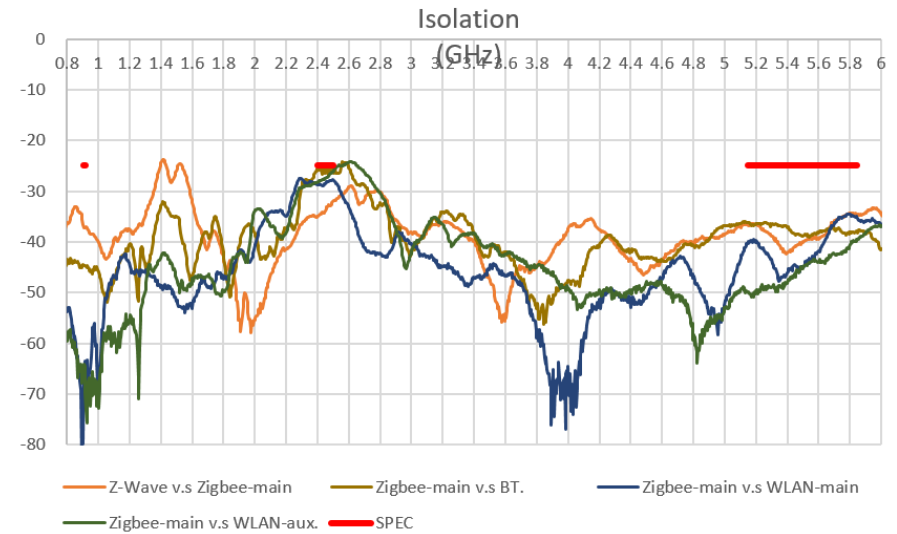
ZigBee Antenna

Antenna Test Result _ZigBee

VSWR



Isolation



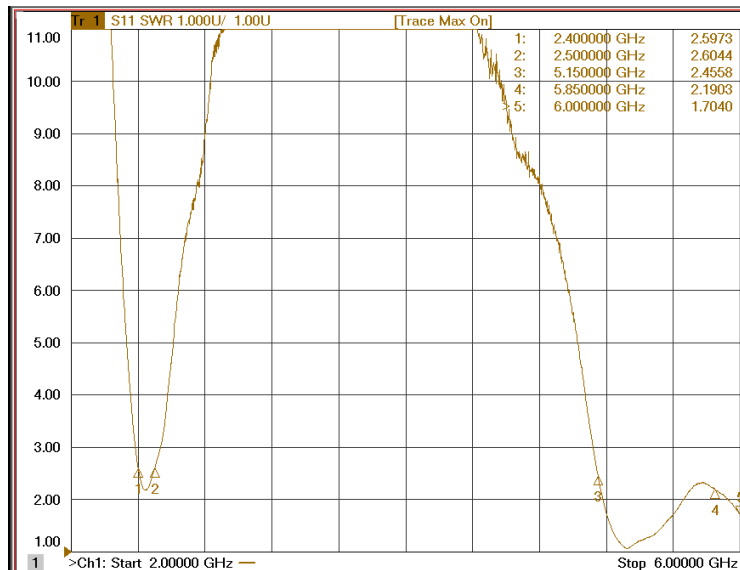
Efficiency

Frequency	2400	2450	2500
Peak EIRP (dBm)	2.63	2.49	2.73
Efficiency (%)	61.56	61.93	54.27
Average Gain (dB)	-2.11	-2.08	-2.65

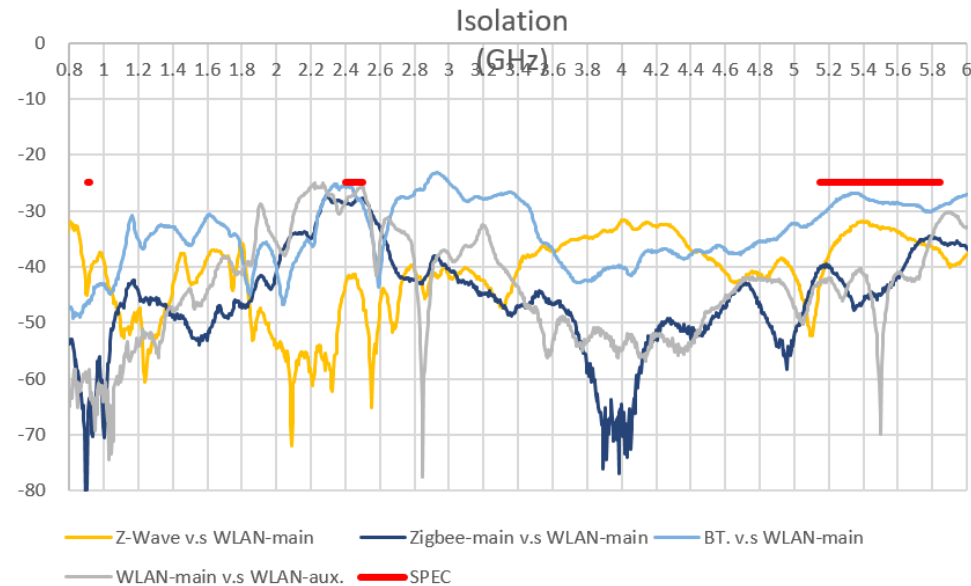
WLAN-main Antenna

Antenna Test Result _WLAN-main

VSWR



Isolation



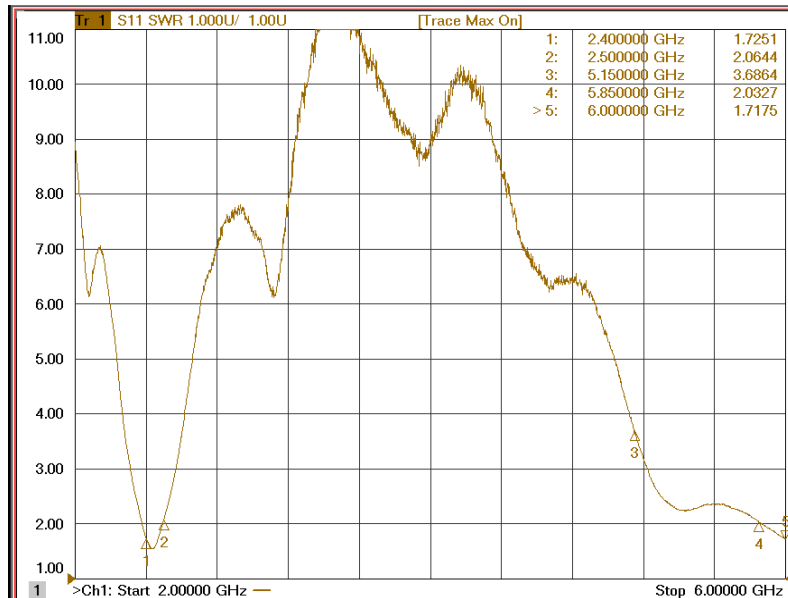
Efficiency

Frequency	2400	2450	2500	5150	5250	5350	5470	5600	5725	5785	5850
Peak EIRP (dBm)	3.26	3.19	3.45	3.46	2.52	2.88	3.81	3.65	3.42	3.40	3.86
Efficiency (%)	67.30	70.93	57.27	56.43	64.45	68.20	71.35	68.14	61.73	65.75	66.77
Average Gain (dB)	-1.72	-1.49	-2.42	-2.49	-1.91	-1.66	-1.47	-1.67	-2.10	-1.82	-1.75

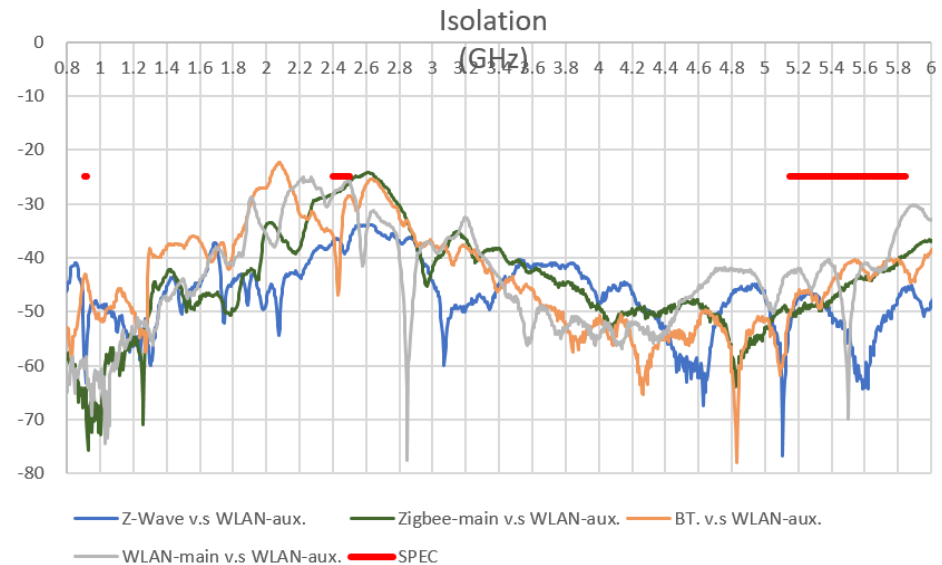
WLAN-aux. Antenna

Antenna Test Result _WLAN-aux.

VSWR



Isolation



Efficiency

Frequency	2400	2450	2500	5150	5250	5350	5470	5600	5725	5785	5850
Peak EIRP (dBm)	3.47	3.74	2.41	3.94	3.08	3.72	3.72	3.14	3.36	3.65	3.82
Efficiency (%)	60.26	56.06	44.40	45.51	49.97	52.68	55.90	60.03	56.31	55.91	55.31
Average Gain (dB)	-2.20	-2.51	-3.53	-3.42	-3.01	-2.78	-2.53	-2.22	-2.49	-2.53	-2.57



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THANK YOU!