



EUT Antenna Specification

Product Type: Wireless Headphones (SN C1B002HDT6660F061)

Product Model Number(s): 440108
Name/Number: FCC ID: A94440108
IC: 3232A-440108

Prepared For: Product Assurance Engineering Department,
Bose Corporation

Postal Address of manufacturing Agency: The Mountain
Framingham, MA 01701
USA

Measurement method: Maximum radiated E-Field was measured in the normal upright EUT orientation which showed the highest E-Field compared to other orientations measured. EUT was commanded to transmit at the maximum power setting for basic rate using Qualcomm's BlueTest3 application program on each of the three frequencies.

E-Field measurements taken every 10 degrees on the turn table.

The measurement antenna height was adjusted for maximum E-Field from EUT. Measurement antenna was set to vertical and horizontal polarizations for each set of measurements.

EUT was sitting on foam platform 1.5 meters off ground plane. See setup photo on page 5.

The following equation was used to calculate the antenna gain:

Antenna gain (dBi) = E-Field(dBuV/m) – Conducted output power (dBm) – 95.23 dB.

The measurement distance is 3 meters.

Radiated E-Field measurements taken manually; no automatic software was used.

For conducted output power the EUT was connectorized using short 8" cable (0.8 dB) and a 10 dB pad. The reference level offset on the spectrum analyzer was set to 10.8 dB. The measurement method used for conducted output power is the same as used on the FCC 15.247 report (EMC 440108_FCC_ISED_BT_Report.pdf)



PRODUCT ASSURANCE ENGINEERING

A94440108 Antenna Specification



Antenna Gain (dBi)		
Frequency (MHz)	V-Pol.	H-Pol.
2402	0.5	-4.0
2441	1.1	-3.1
2480	0.6	-4.7

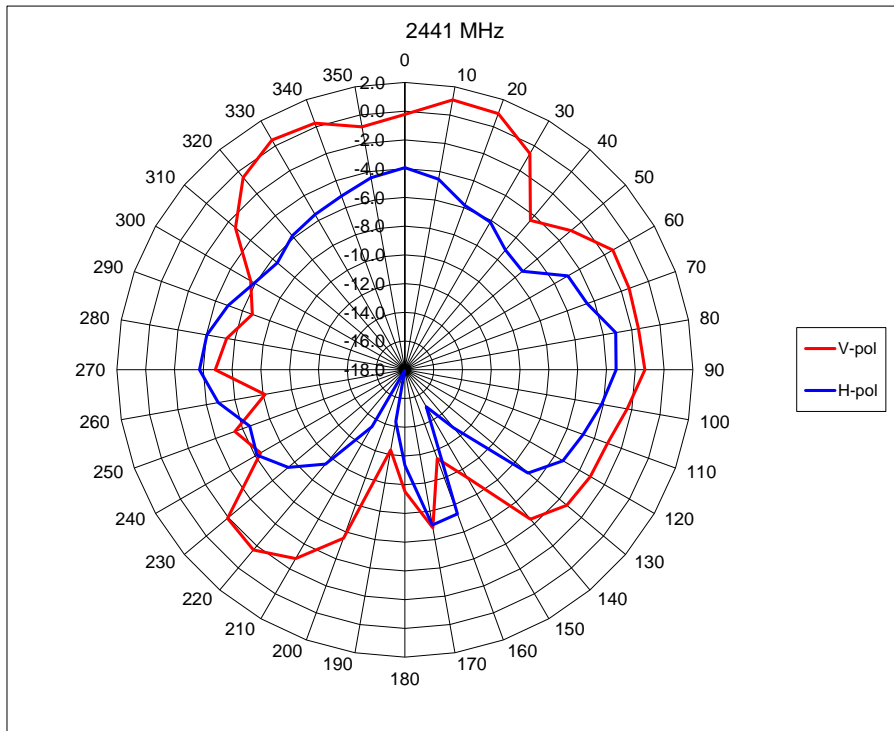
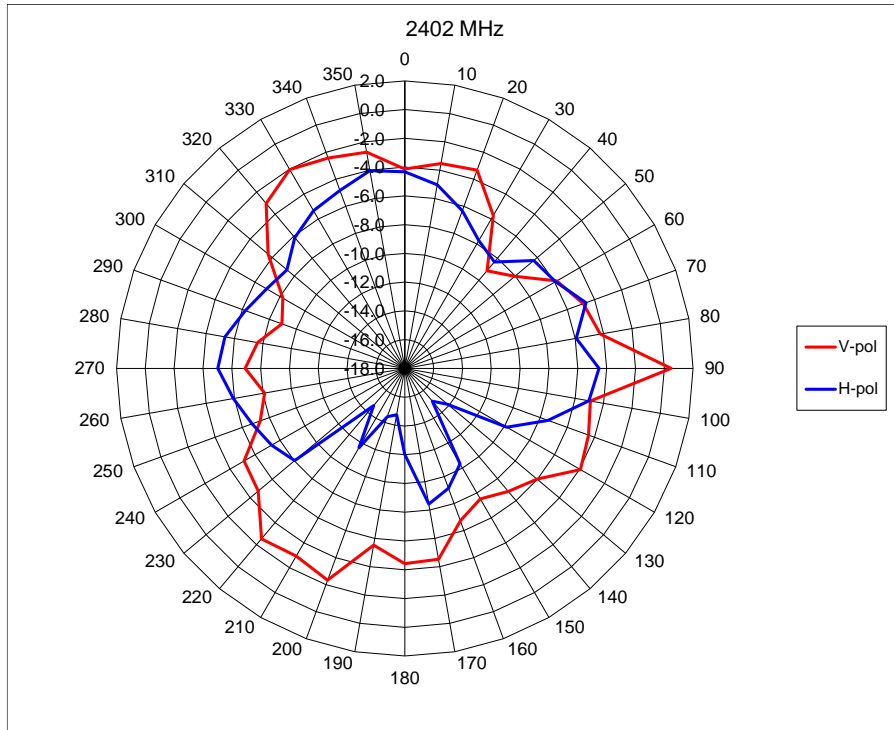
Maximum Antenna Gain = 1.1 dBi

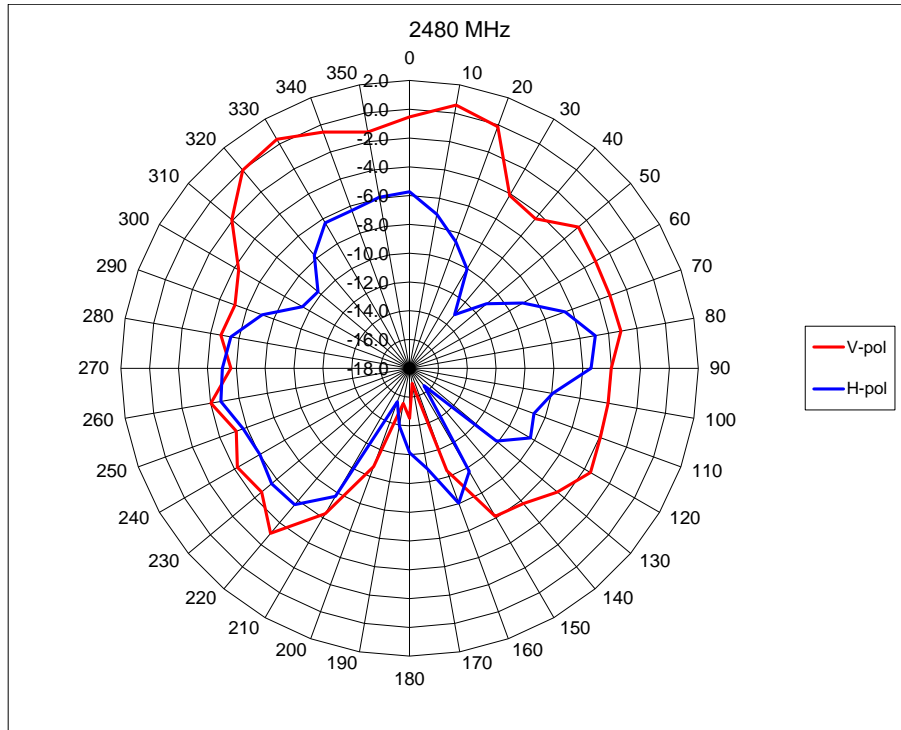
Test equipment used for making antenna plots:

Used For	Tracking Number	Description	Model	Make	Serial Number	Most recent calibration	Calibration Due Date	Most Recent Verification	Verification Due Date
Antenna Plots	1663	EMI Analyzer	ESU40	Rohde & Schwarz	100098	3/20/2022	3/19/2024		
Antenna Plots	2385	Chamber	3 Meter	AP Americas	N/A	10/7/2022	10/7/2023		
Antenna Plots	2349	Horn	3117	ETS Lindgren	00152406	2/24/2023	2/23/2025		
Antenna Plots	2368	Cable	TRU-210	TRU Corporation	TRU-12767-35			3/28/2023	3/27/2024
Antenna Plots	3685	Cable Set	2373, 2479, 2357	N/A	N/A			3/28/2022	3/27/2023
RF Conducted Output Power	2409	EMI Analyzer	FSV40	Rohde & Schwarz	101413	3/21/2023	3/21/2024		

Test Date: 4/12/2023

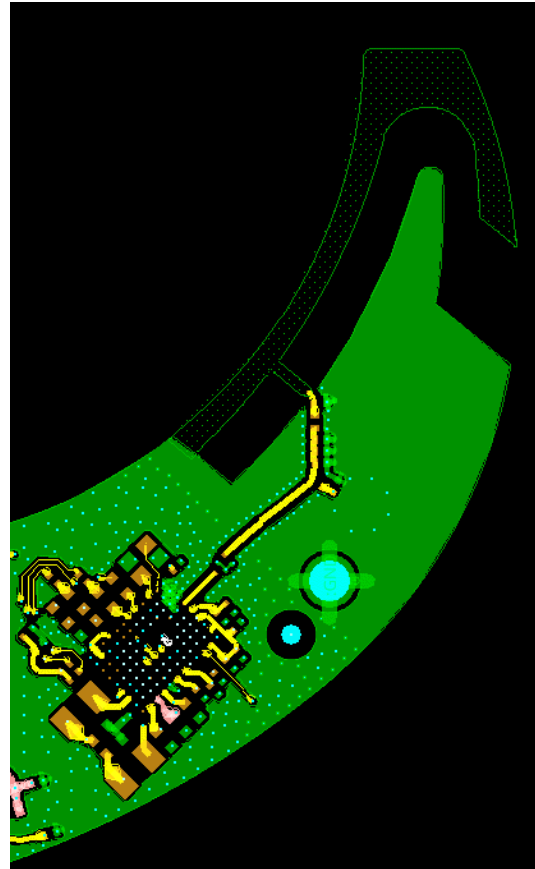
Operator: Bryan Cerqua







Antenna





Antenna gain measurement setup photos.

