

APPENDIX E RETURN LOSS&IMPEDANCE MEASUREMENT

Equipment Details:

Description: Dipole
 Manufacturer: Speag
 Model Number: D2450V2
 Serial Number: 1103
 Calibration Date: 2024/03/26
 Calibrated By: Bob Lu
 Signature: *Bob Lu*

All Calibration have been conducted in the closed laboratory facility: Lab Temperature 18°C-25°C and humidity < 70%

The calibration methods and procedures used were as detailed in:

KDB Publication Number: “KDB865664 D01 SAR Measurement 100 MHz to 6 GHz”

- 1.The return-loss does not deviate more than 20% from the previous measurement and meets the required 20dB minimum return-loss requirement.
- 2.The measurement of real or imaginary parts of impedance does not deviate more than 5Ω from the previous measurement.

Calibrated Equipment:

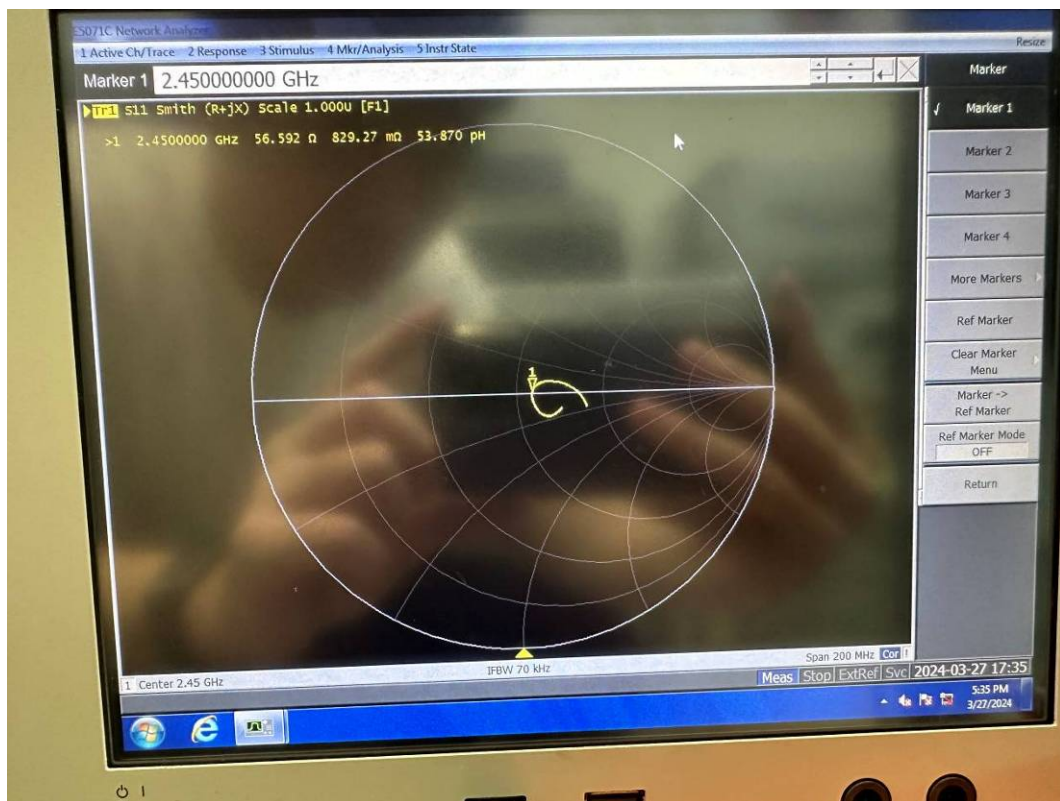
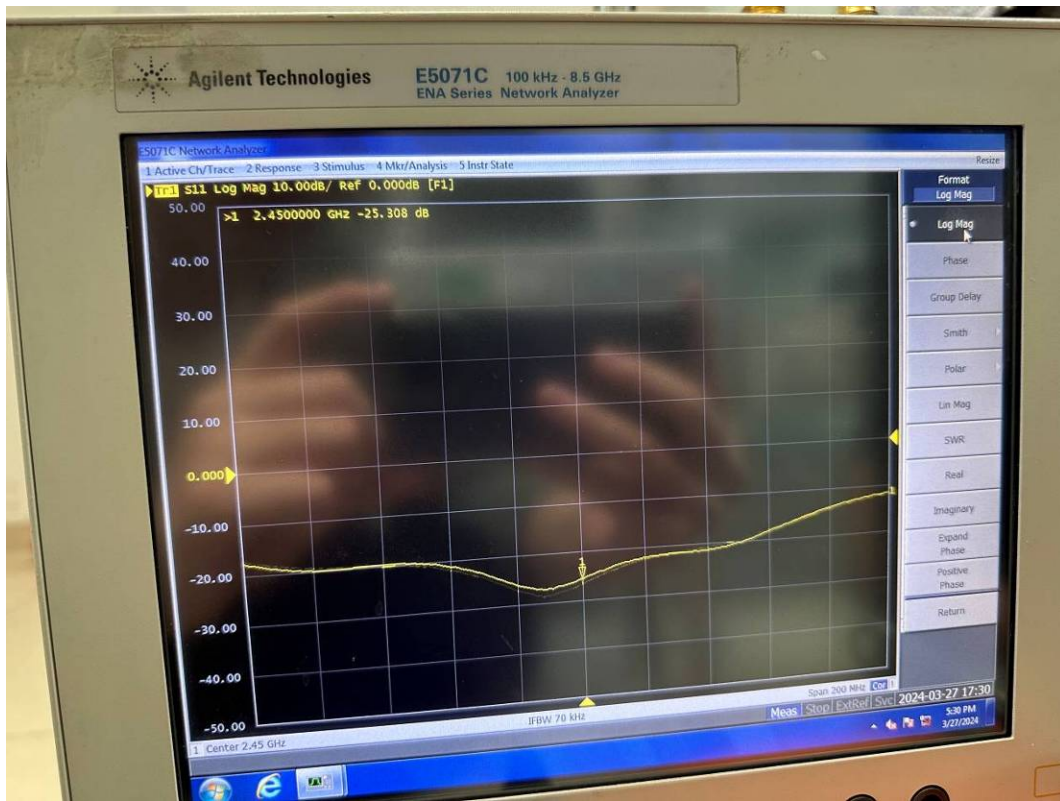
| Equipment | Model | S/N | Calibration Date | Calibration Due Date |
|----------------------------------|-----------------|----------------|------------------|----------------------|
| Simulated Tissue Liquid Head | HBBL600-10000V6 | 2200808-2 | Each Time | |
| SAM Twin Phantom | SAM-Twin V8.0 | 1962 | NCR | NCR |
| Network Analyzer | E5071C | SER MY46519680 | 2023/06/08 | 2024/06/07 |
| Network Analyzer Calibration Kit | 50 Ω | 51026 | NCR | NCR |

Test Data:

| Frequency (MHz) | Simulated Liquid | Parameter | Measured Value | Target Value | Deviation | Reference Range | Results |
|-----------------|------------------|---------------------|----------------|--------------|-----------|-----------------|---------|
| 2450 | Head | Return Loss | 25.308 dB | 24.161 dB | 4.747 % | ±20%; > 20dB | Pass |
| | | Real Impedance | 56.592 Ω | 53.467 Ω | 3.125 Ω | ≤ 5 Ω | Pass |
| | | Imaginary Impedance | 0.829 Ω | 5.400 Ω | -4.571 Ω | ≤ 5 Ω | Pass |

Note: Return Loss Deviation = (Measured-Target)/Target×100%

Dipole, 2450MHz, 1103



Equipment Details:

Description: Dipole
 Manufacturer: Speag
 Model Number: D5GHzV2
 Serial Number: 1374
 Calibration Date: 2024/03/26
 Calibrated By: Bob Lu
 Signature: *Bob Lu*

All Calibration have been conducted in the closed laboratory facility: Lab Temperature 18°C-25°C and humidity < 70%

The calibration methods and procedures used were as detailed in:

KDB Publication Number: “KDB865664 D01 SAR Measurement 100 MHz to 6 GHz”

- 1.The return-loss does not deviate more than 20% from the previous measurement and meets the required 20dB minimum return-loss requirement.
- 2.The measurement of real or imaginary parts of impedance does not deviate more than 5Ω from the previous measurement.

Calibrated Equipment:

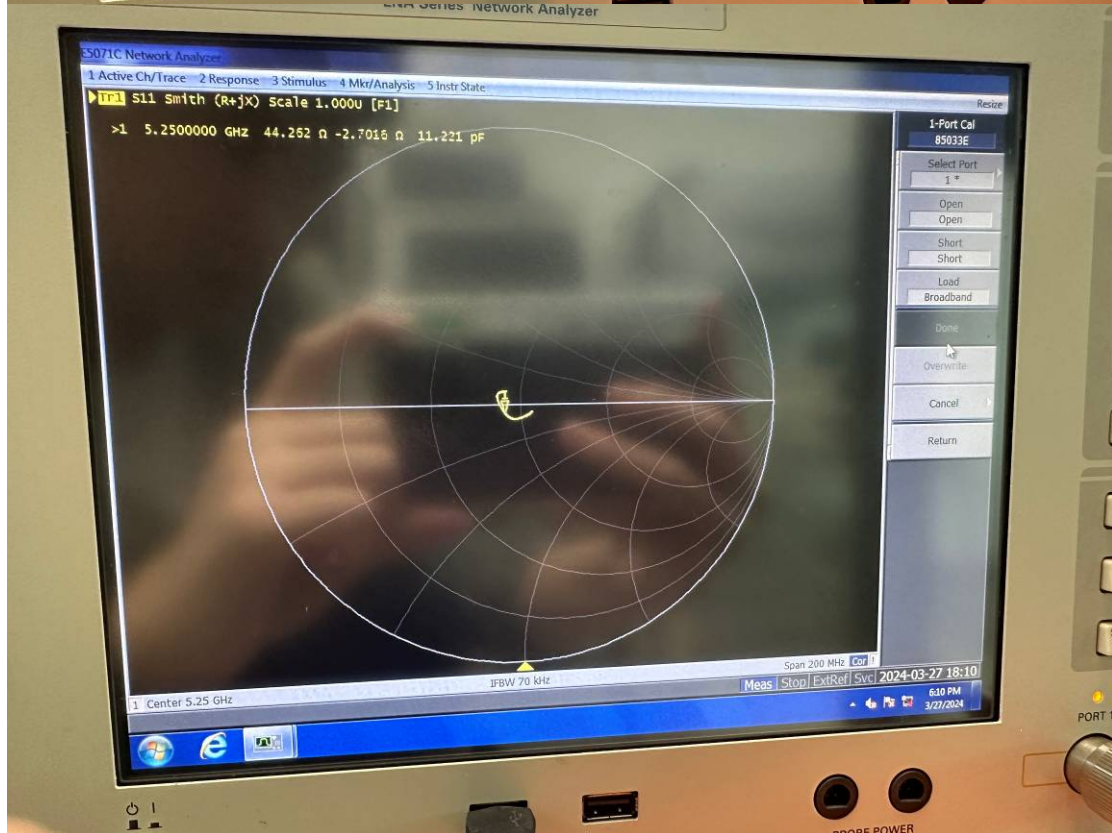
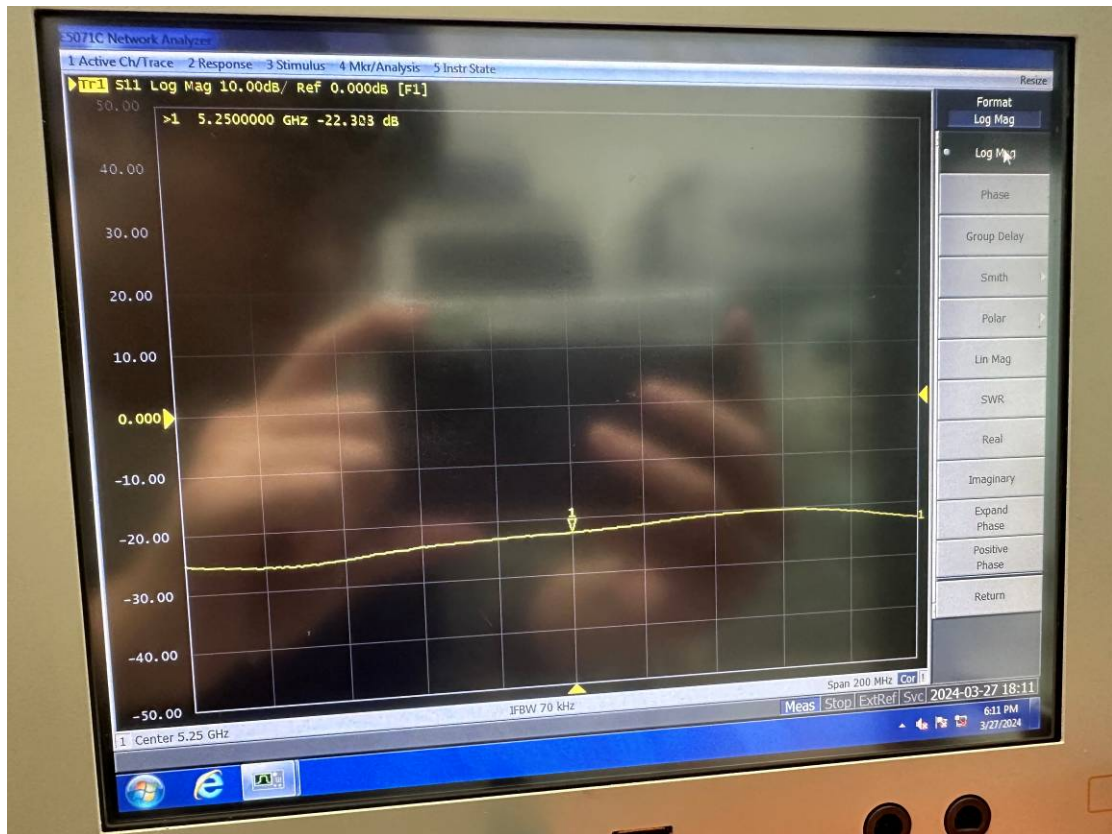
| Equipment | Model | S/N | Calibration Date | Calibration Due Date |
|----------------------------------|-----------------|----------------|------------------|----------------------|
| Simulated Tissue Liquid Head | HBBL600-10000V6 | 2200808-2 | Each Time | |
| SAM Twin Phantom | SAM-Twin V8.0 | 1962 | NCR | NCR |
| Network Analyzer | E5071C | SER MY46519680 | 2023/06/08 | 2024/06/07 |
| Network Analyzer Calibration Kit | 50 Ω | 51026 | NCR | NCR |

Test Data:

| Frequency (MHz) | Simulated Liquid | Parameter | Measured Value | Target Value | Deviation | Reference Range | Results |
|-----------------|------------------|---------------------|----------------|--------------|-----------|-----------------|---------|
| 5250 | Head | Return Loss | 22.303 dB | 23.781 dB | -6.215 % | ±20%; > 20dB | Pass |
| | | Real Impedance | 44.252 Ω | 45.776 Ω | 1.524 Ω | ≤ 5 Ω | Pass |
| | | Imaginary Impedance | -2.702 Ω | -4.545 Ω | 1.843 Ω | ≤ 5 Ω | Pass |
| 5800 | Head | Return Loss | 29.943 dB | 27.331 dB | 9.557 % | ±20%; > 20dB | Pass |
| | | Real Impedance | 50.363 Ω | 54.232 Ω | -3.869 Ω | ≤ 5 Ω | Pass |
| | | Imaginary Impedance | -2.534 Ω | 1.475 Ω | -4.009 Ω | ≤ 5 Ω | Pass |

Note: Return Loss Deviation = (Measured-Target)/Target×100%

Dipole, 5250MHz, 1374



Dipole, 5800MHz, 1374

