

## Appendix Test Data for BT(BDR/EDR) (Conducted Measurement)

Product Name: True Wireless Earbuds

Trade Mark: /

Test Model: NS18

FCC ID: 2BKHB-NS18

### Environmental Conditions

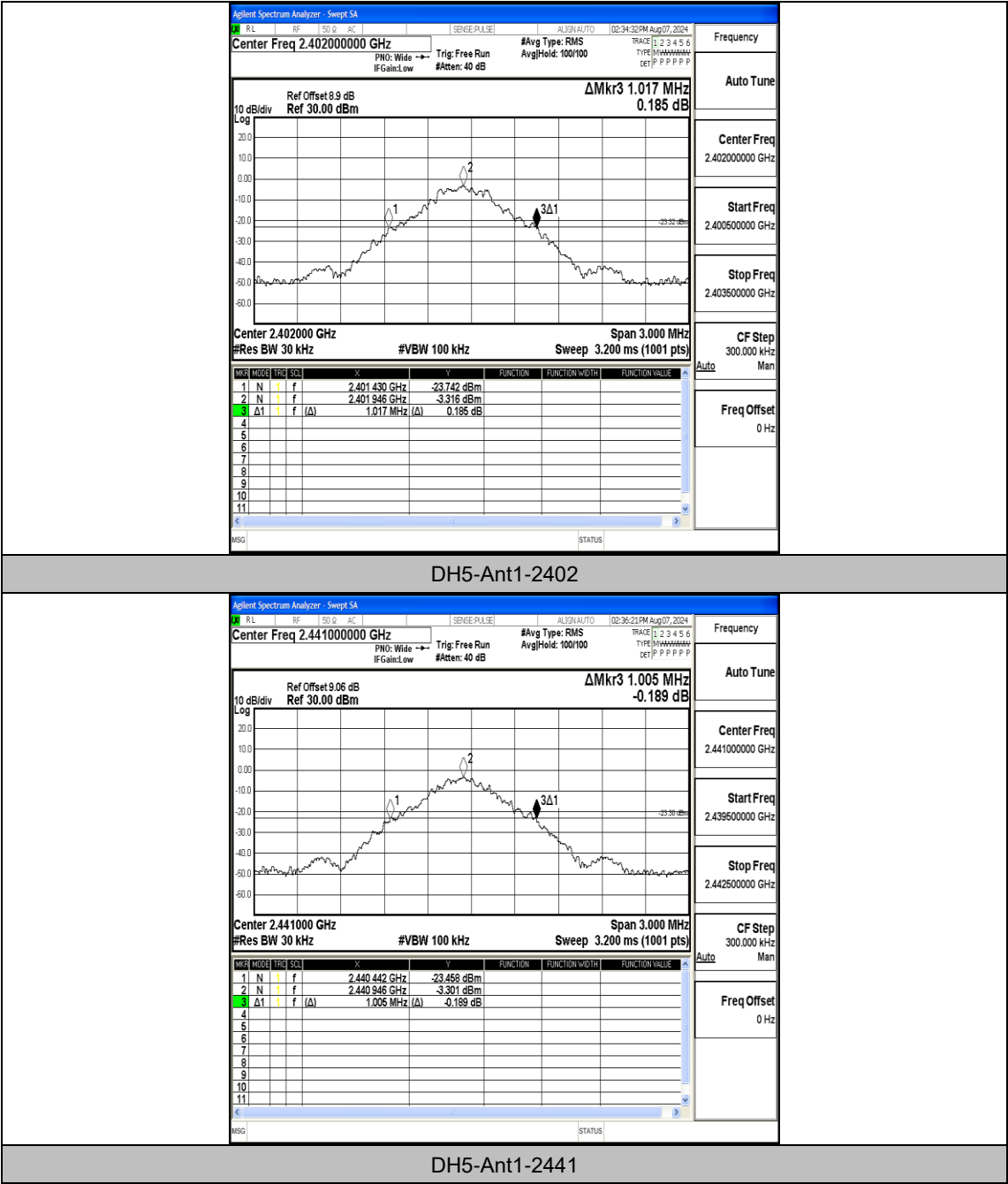
|                    |           |
|--------------------|-----------|
| Temperature:       | 23.8℃     |
| Relative Humidity: | 58%       |
| ATM Pressure:      | 100.0 kPa |
| Test Engineer:     | Allen Lai |
| Supervised by:     | Hugo Chen |
| NOTE               | N/A       |

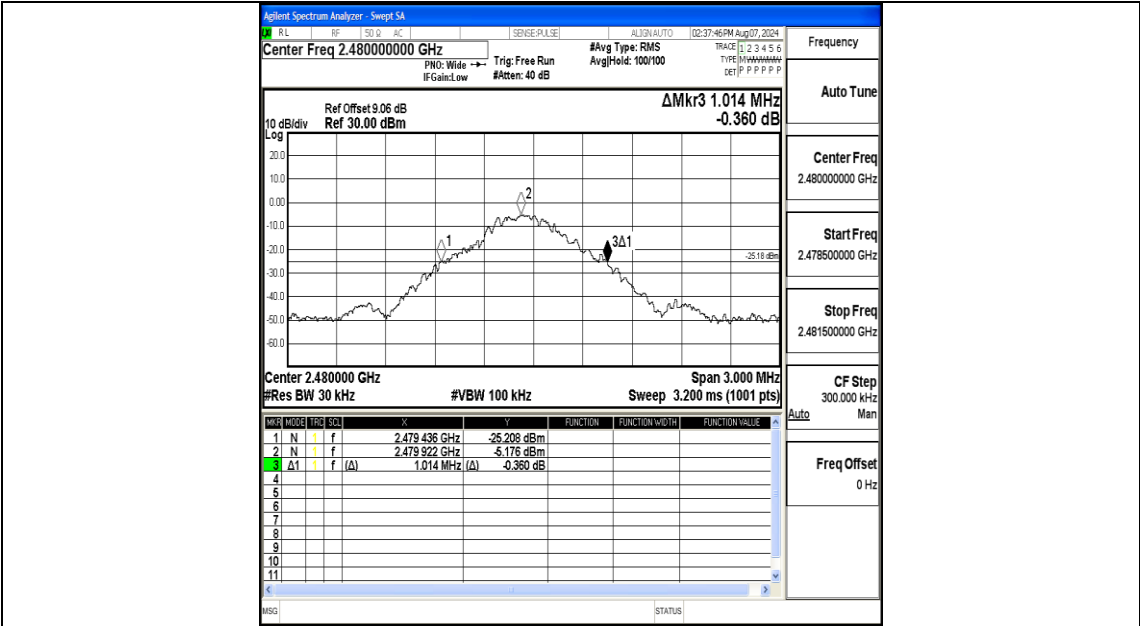
## Appendix A: 20dB Emission Bandwidth

### Test Result

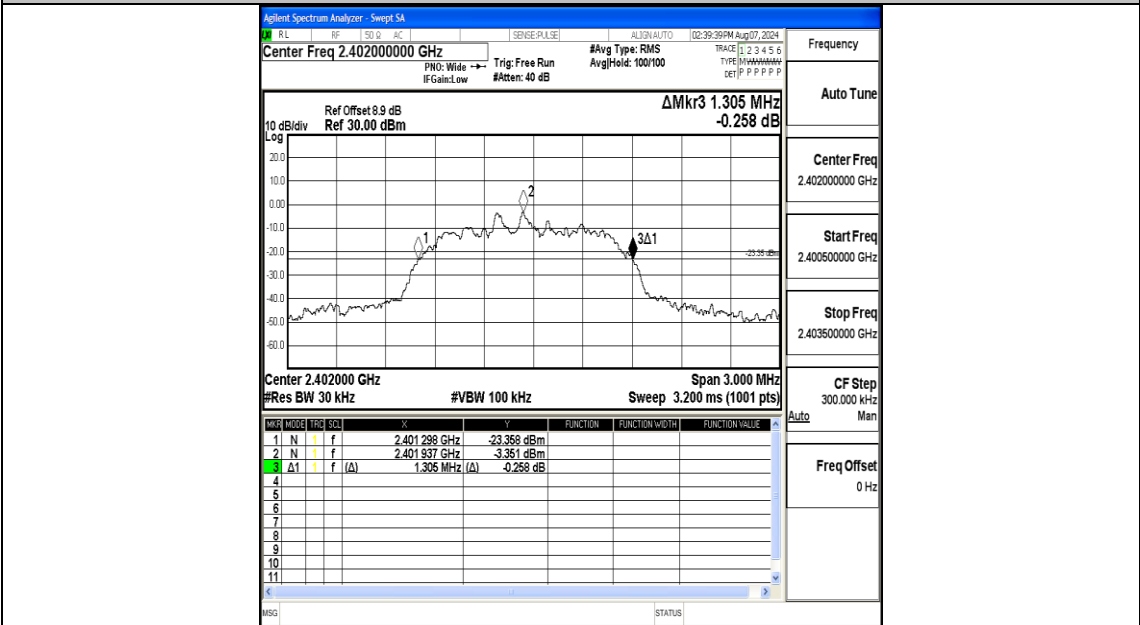
| TestMode | Antenna | Frequency[MHz] | 20db<br>EBW[MHz] | FL[MHz]  | FH[MHz]  | Limit[MHz] | Verdict |
|----------|---------|----------------|------------------|----------|----------|------------|---------|
| DH5      | Ant1    | 2402           | 1.017            | 2401.430 | 2402.447 | ---        | ---     |
| DH5      | Ant1    | 2441           | 1.005            | 2440.442 | 2441.447 | ---        | ---     |
| DH5      | Ant1    | 2480           | 1.014            | 2479.436 | 2480.450 | ---        | ---     |
| 2DH5     | Ant1    | 2402           | 1.305            | 2401.298 | 2402.603 | ---        | ---     |
| 2DH5     | Ant1    | 2441           | 1.293            | 2440.307 | 2441.600 | ---        | ---     |
| 2DH5     | Ant1    | 2480           | 1.341            | 2479.280 | 2480.621 | ---        | ---     |

Test Graphs

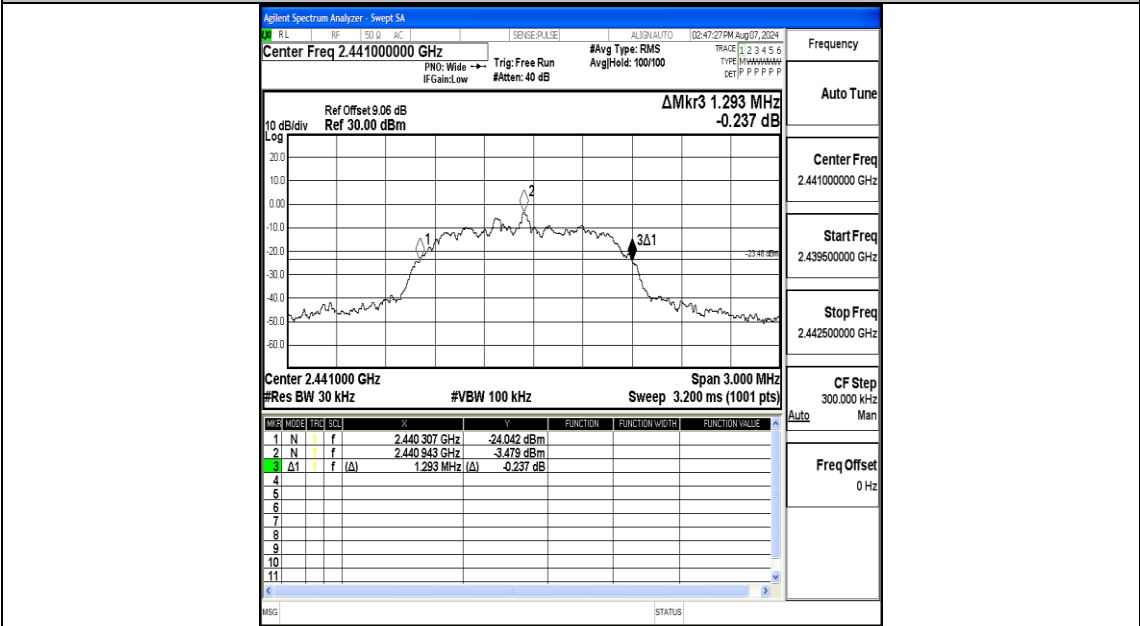




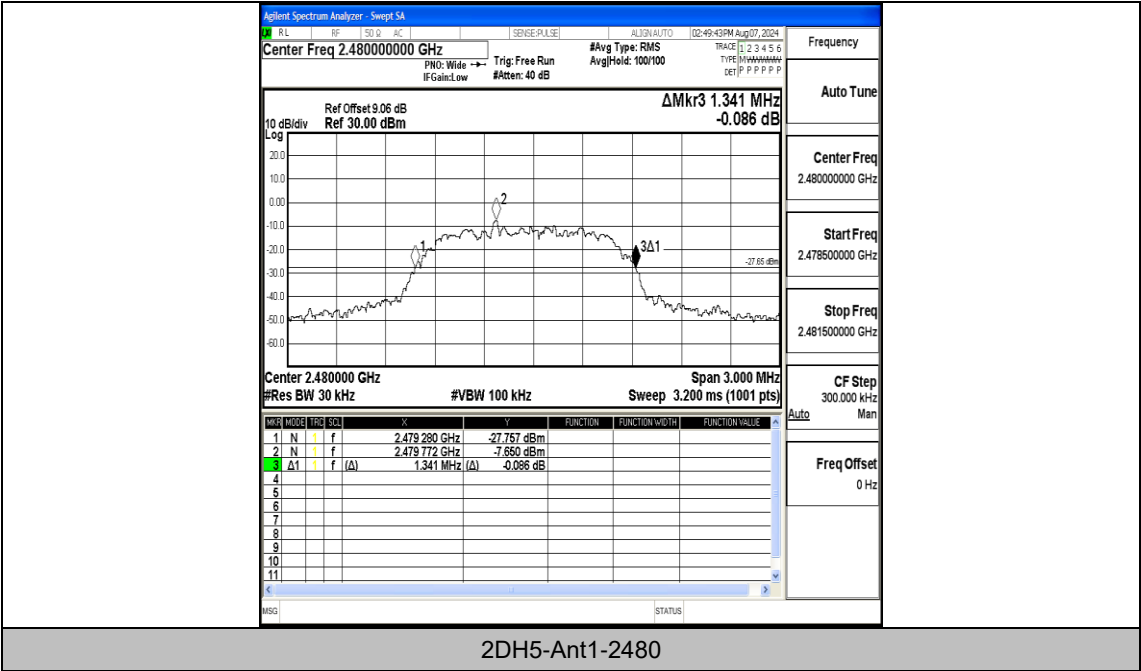
DH5-Ant1-2480



2DH5-Ant1-2402



2DH5-Ant1-2441

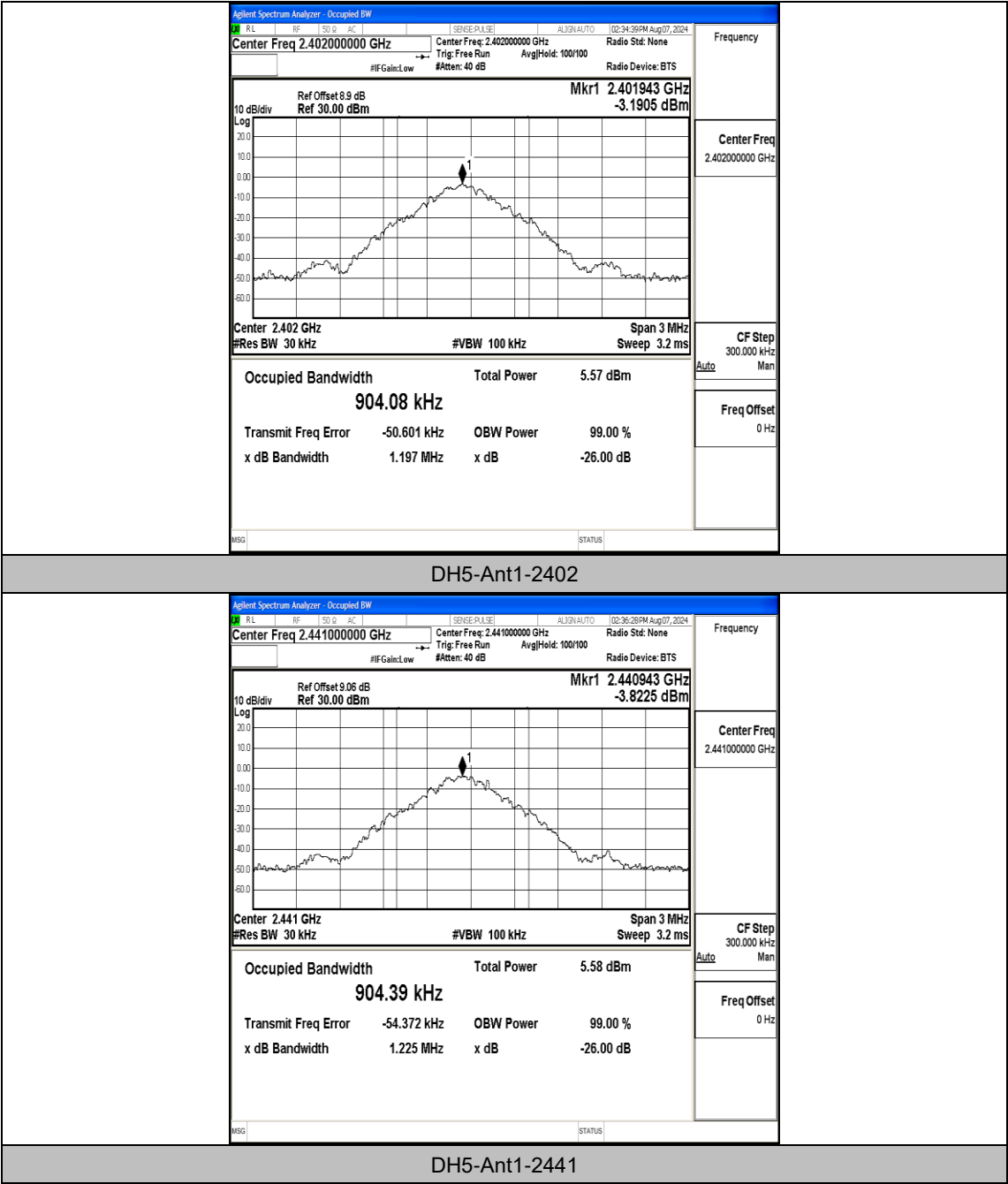


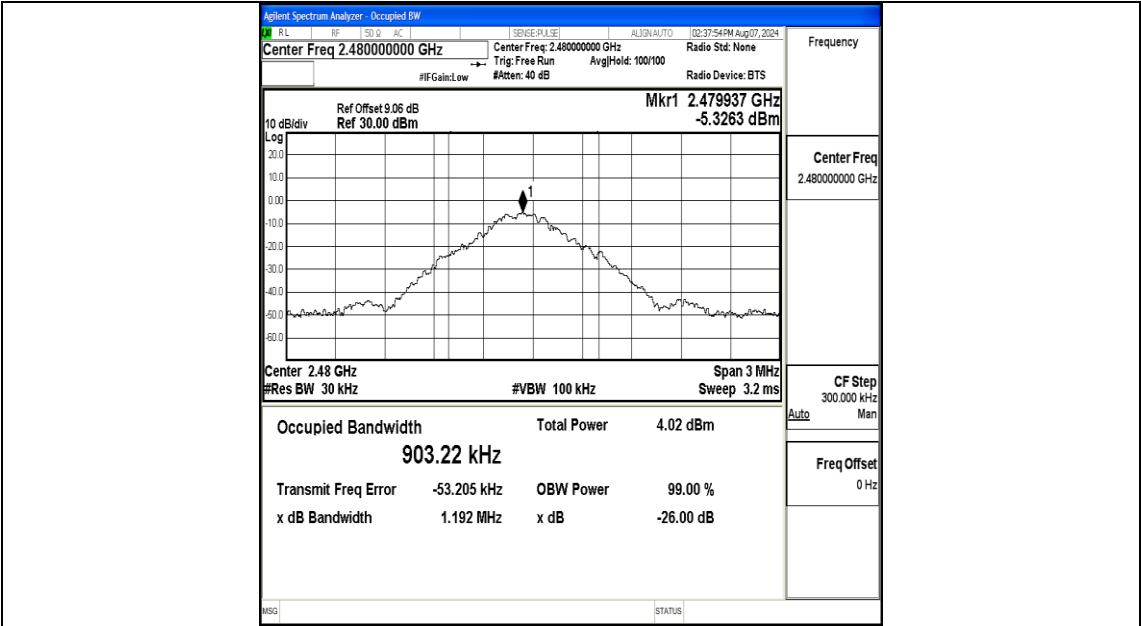
## Appendix B: Occupied Channel Bandwidth

### Test Result

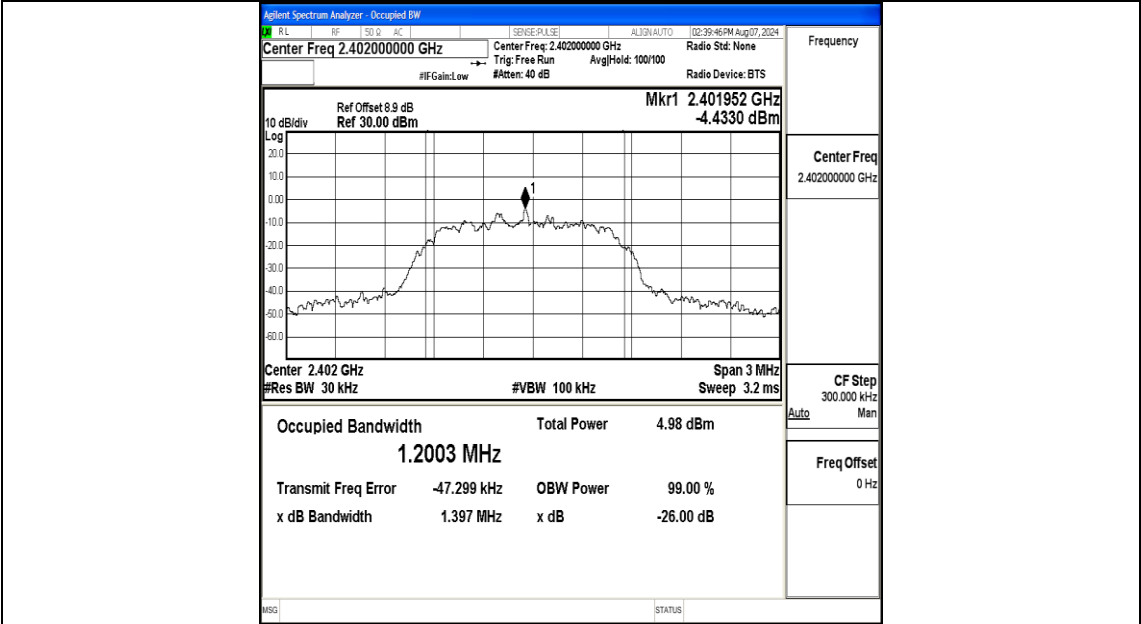
| TestMode | Antenna | Frequency[MHz] | OCB [MHz] | FL[MHz]   | FH[MHz]   | Limit[MHz] | Verdict |
|----------|---------|----------------|-----------|-----------|-----------|------------|---------|
| DH5      | Ant1    | 2402           | 0.90408   | 2401.4974 | 2402.4014 | ---        | ---     |
| DH5      | Ant1    | 2441           | 0.90439   | 2440.4934 | 2441.3978 | ---        | ---     |
| DH5      | Ant1    | 2480           | 0.90322   | 2479.4952 | 2480.3984 | ---        | ---     |
| 2DH5     | Ant1    | 2402           | 1.2003    | 2401.3526 | 2402.5529 | ---        | ---     |
| 2DH5     | Ant1    | 2441           | 1.2213    | 2440.3432 | 2441.5645 | ---        | ---     |
| 2DH5     | Ant1    | 2480           | 1.1892    | 2479.3501 | 2480.5393 | ---        | ---     |

Test Graphs

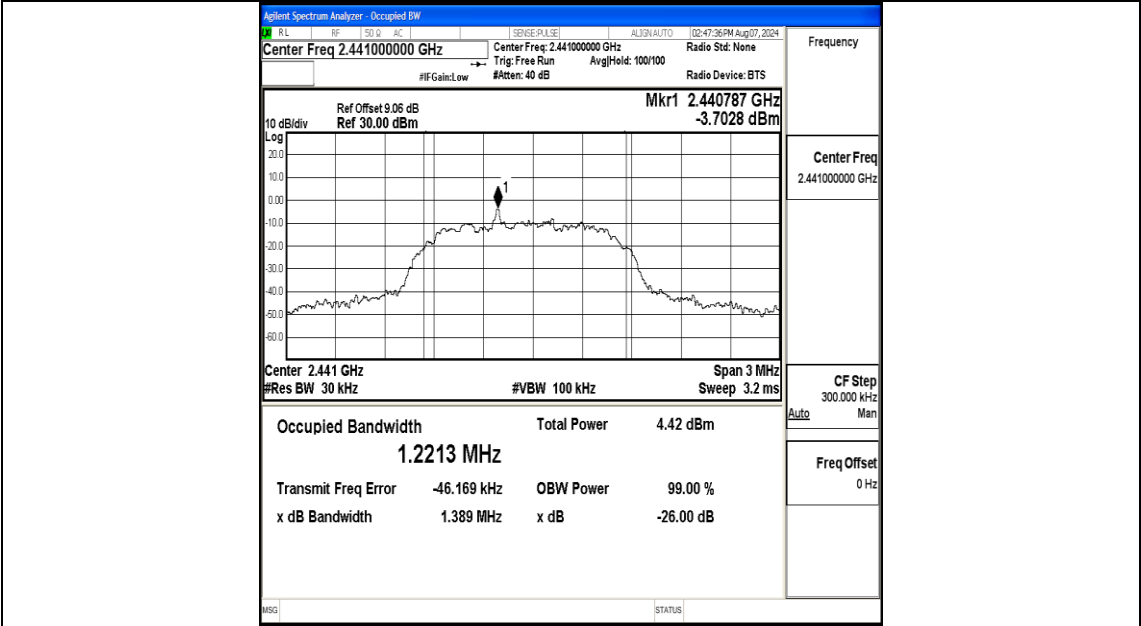




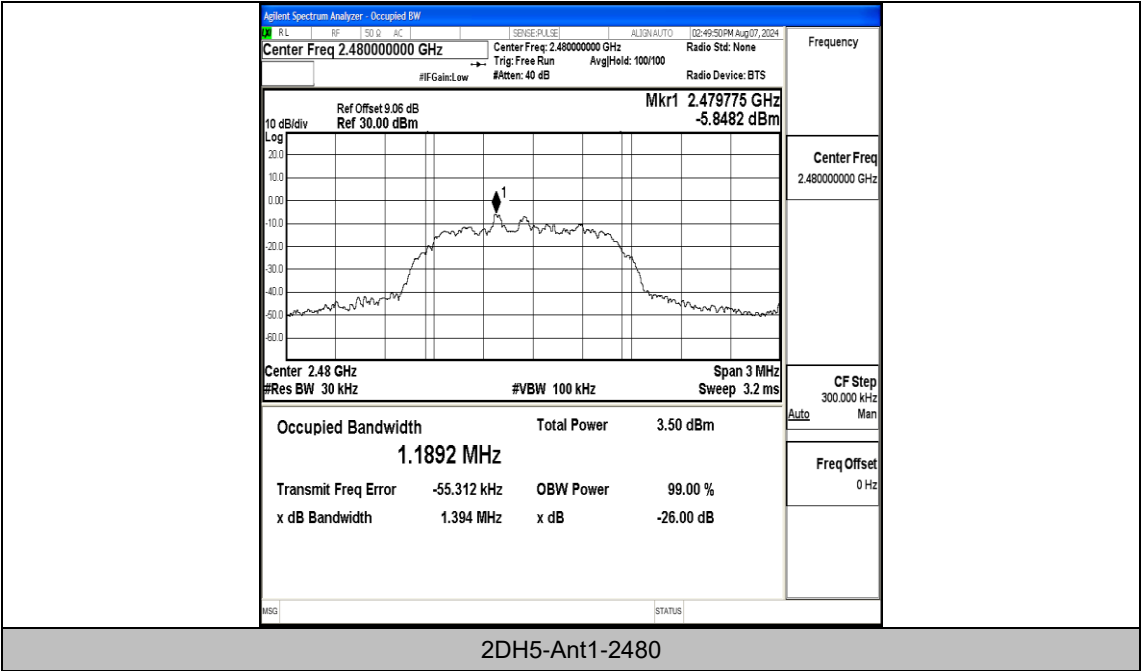
DH5-Ant1-2480



2DH5-Ant1-2402



2DH5-Ant1-2441



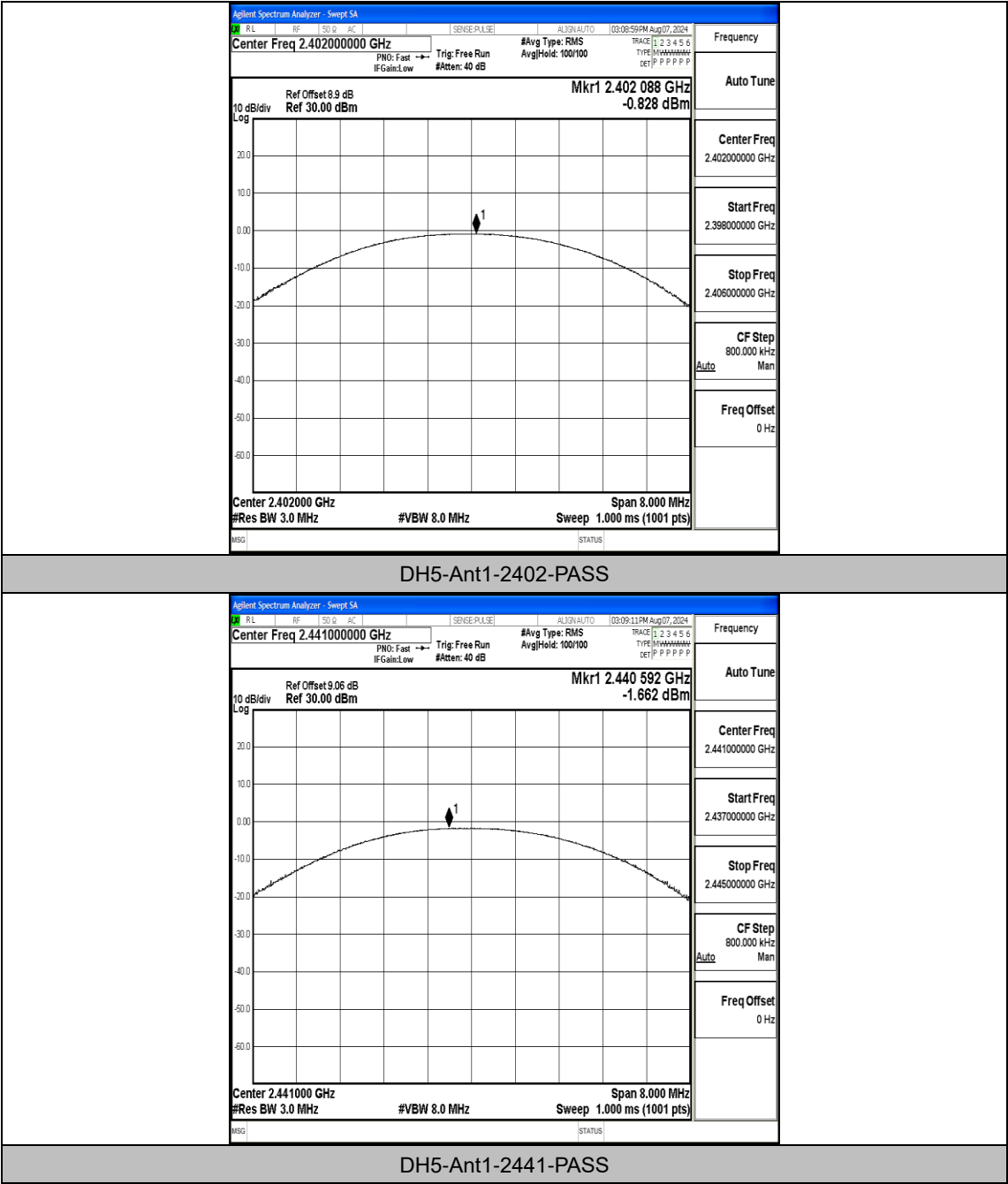


## Appendix C: Maximum peak conducted output power

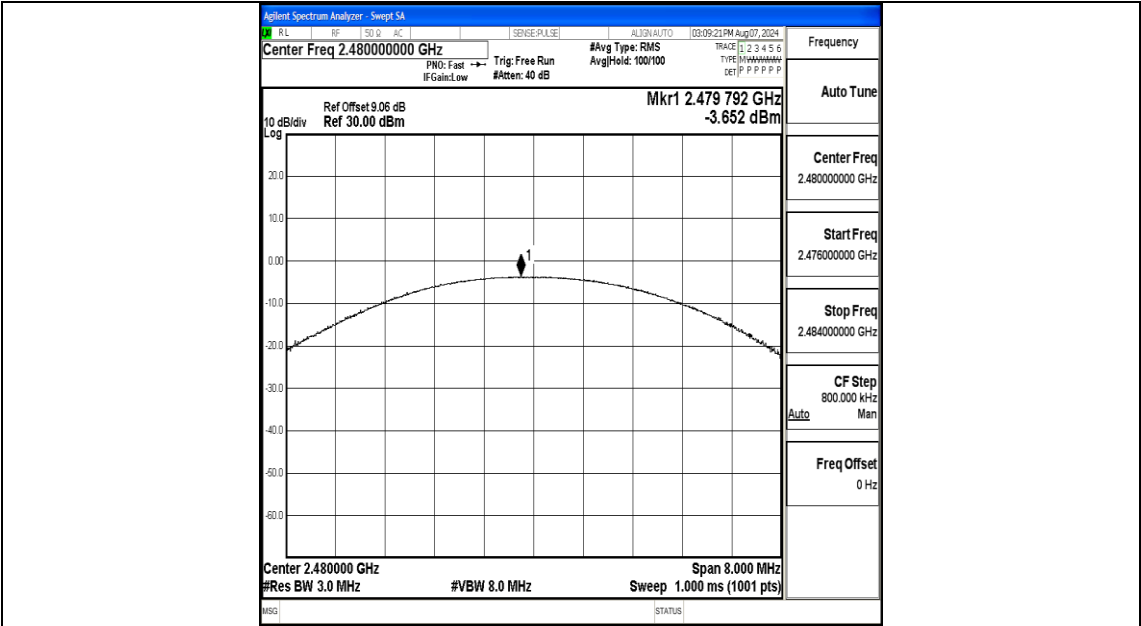
### Test Result

| Test Mode | Antenna | Frequency[MHz] | Conducted Peak Power[dBm] | Conducted Limit[dBm] | Verdict |
|-----------|---------|----------------|---------------------------|----------------------|---------|
| DH5       | Ant1    | 2402           | -0.83                     | ≤20.97               | PASS    |
| DH5       | Ant1    | 2441           | -1.66                     | ≤20.97               | PASS    |
| DH5       | Ant1    | 2480           | -3.65                     | ≤20.97               | PASS    |
| 2DH5      | Ant1    | 2402           | -0.13                     | ≤20.97               | PASS    |
| 2DH5      | Ant1    | 2441           | -0.83                     | ≤20.97               | PASS    |
| 2DH5      | Ant1    | 2480           | -3.09                     | ≤20.97               | PASS    |

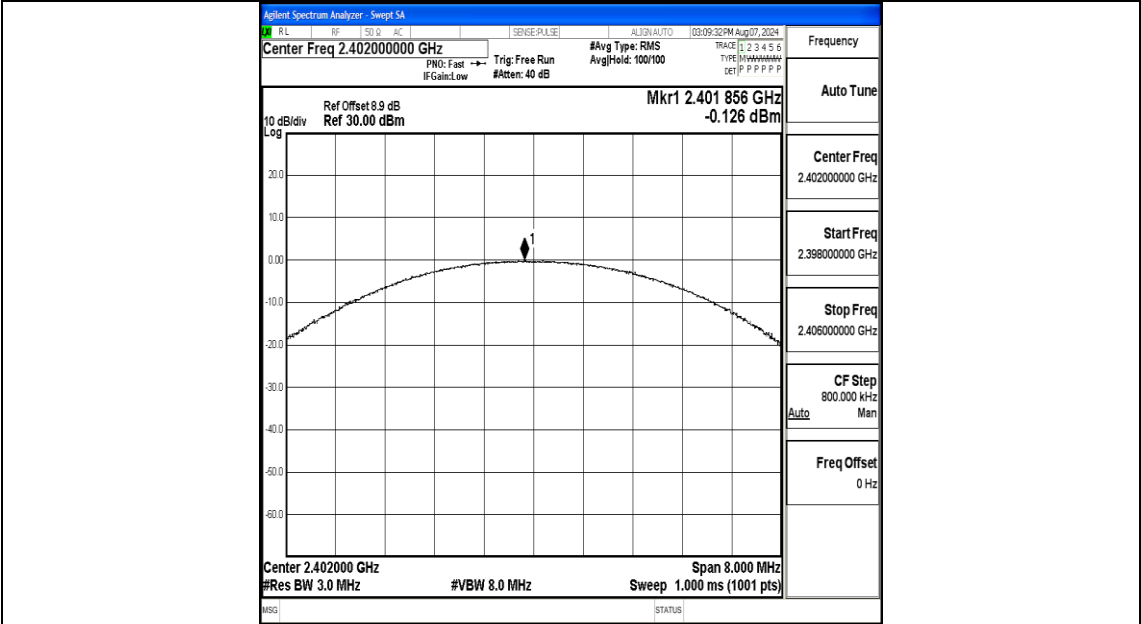
Test Graphs



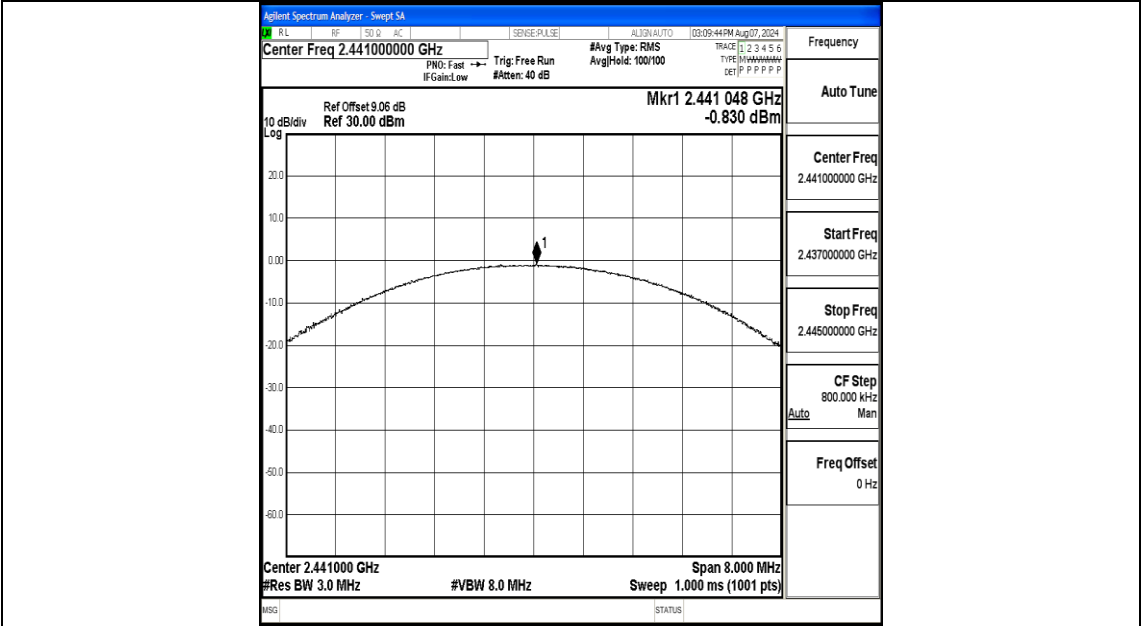
DH5-Ant1-2441-PASS



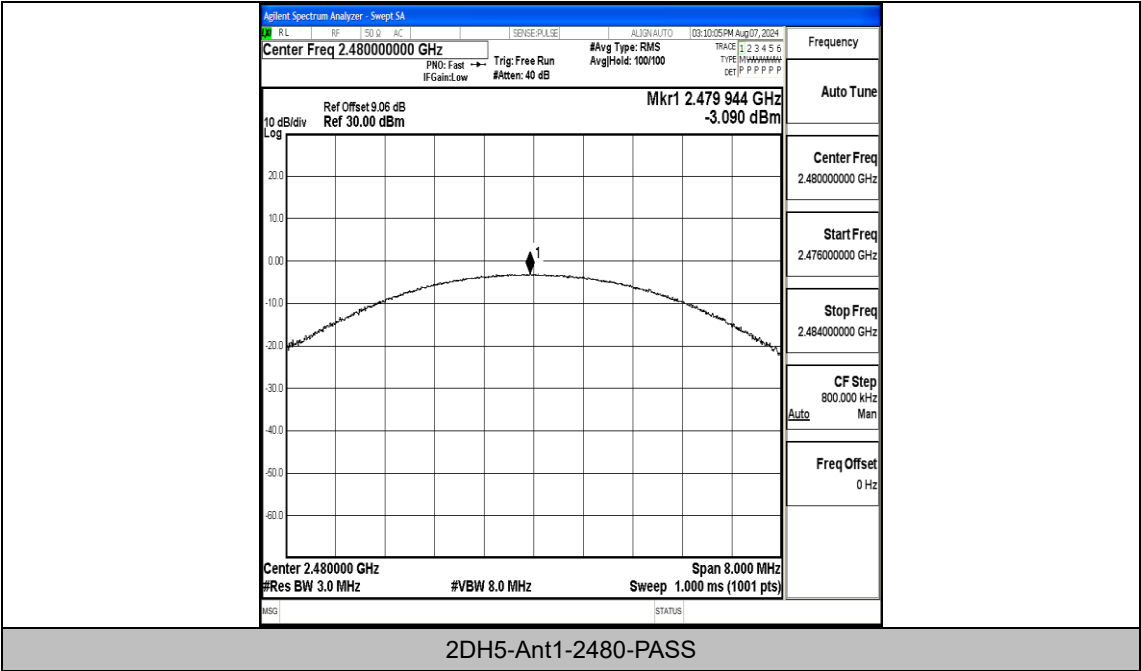
DH5-Ant1-2480-PASS



2DH5-Ant1-2402-PASS



2DH5-Ant1-2441-PASS

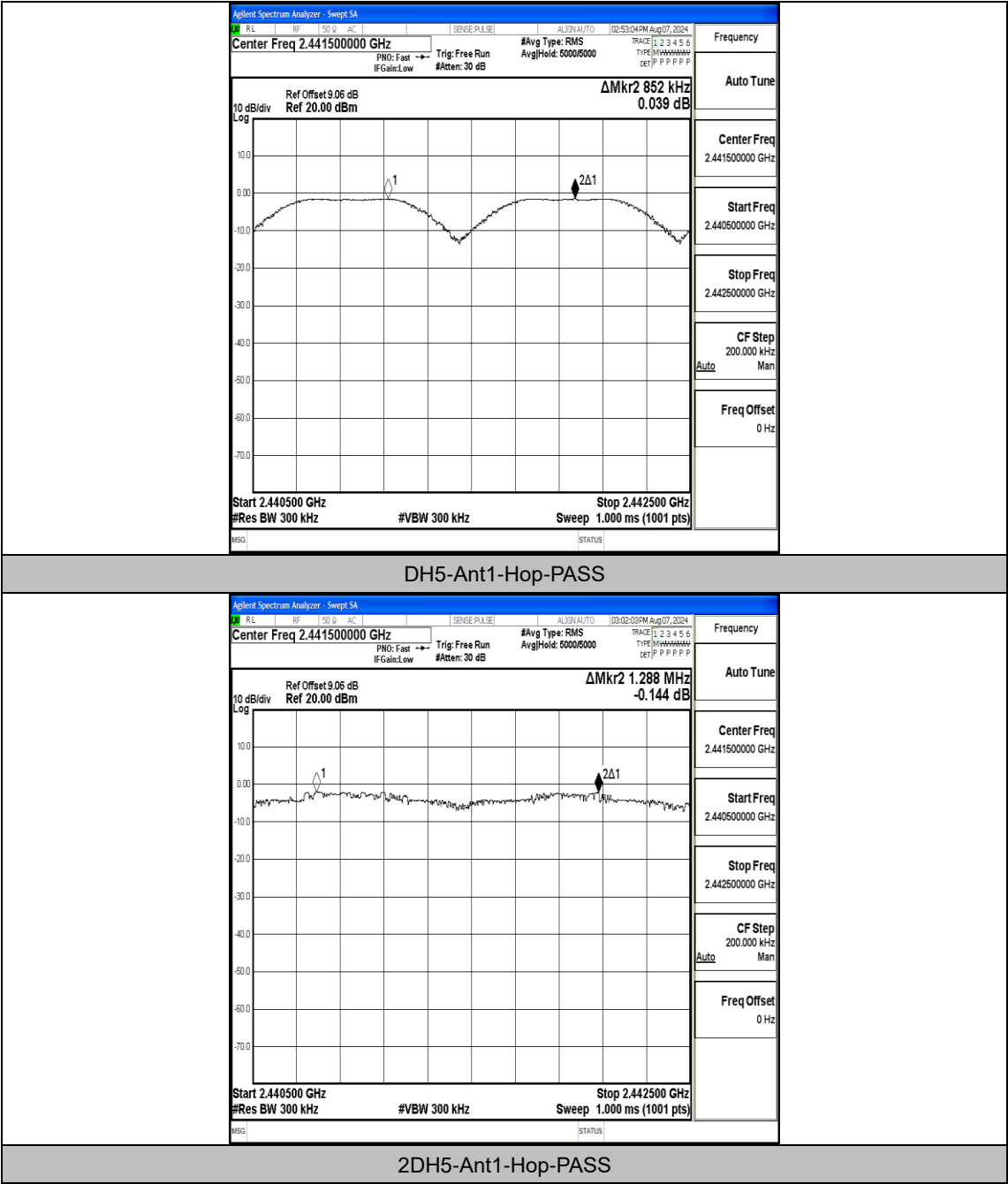


## Appendix D: Carrier frequency separation

### Test Result

| TestMode | Antenna | Frequency[MHz] | Result[MHz] | Limit[MHz]   | Verdict |
|----------|---------|----------------|-------------|--------------|---------|
| DH5      | Ant1    | Hop            | 0.852       | $\geq 0.678$ | PASS    |
| 2DH5     | Ant1    | Hop            | 1.288       | $\geq 0.894$ | PASS    |

Test Graphs

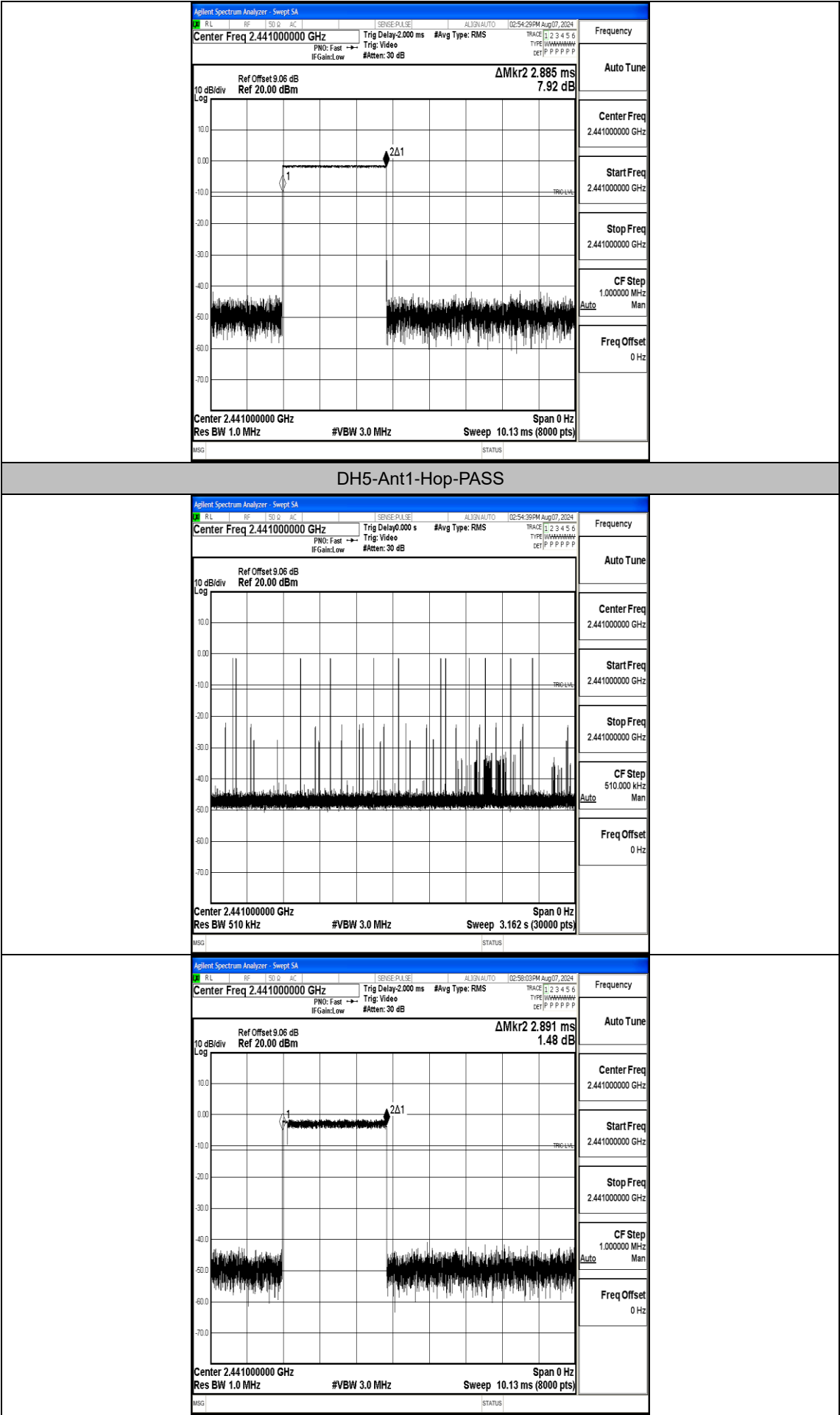


## Appendix E: Time of occupancy

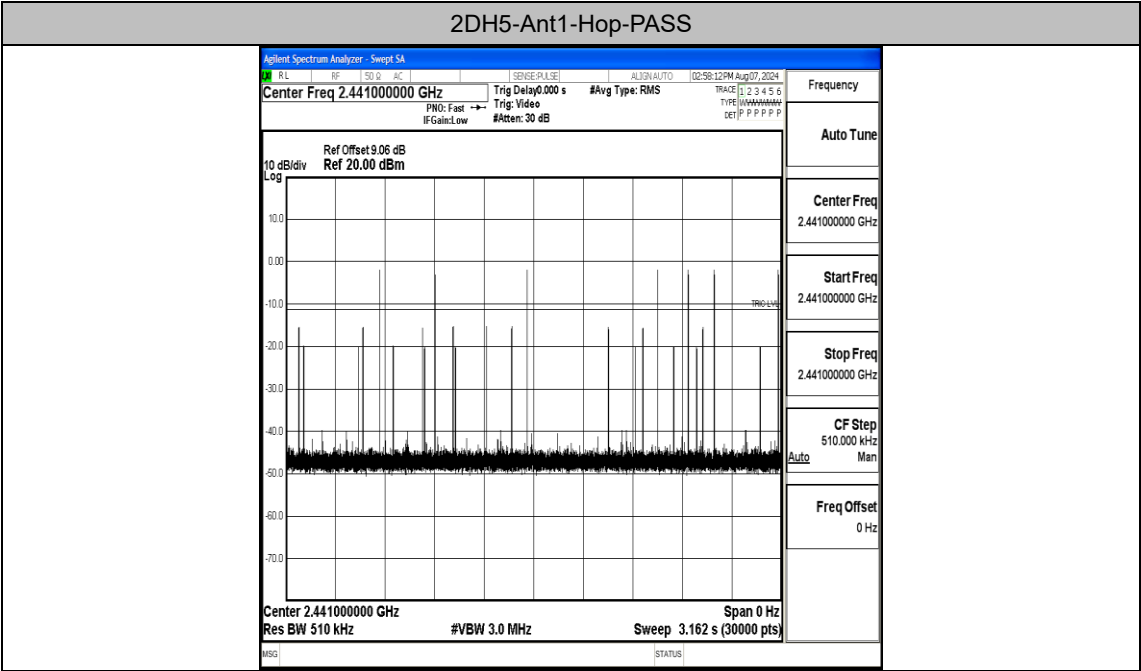
### Test Result

| TestMode | Antenna | Frequency[MHz] | BurstWidth<br>[ms] | TotalHops<br>[Num] | Result[s] | Limit[s] | Verdict |
|----------|---------|----------------|--------------------|--------------------|-----------|----------|---------|
| DH5      | Ant1    | Hop            | 2.885              | 130                | 0.375     | ≤0.4     | PASS    |
| 2DH5     | Ant1    | Hop            | 2.891              | 80                 | 0.231     | ≤0.4     | PASS    |

Test Graphs





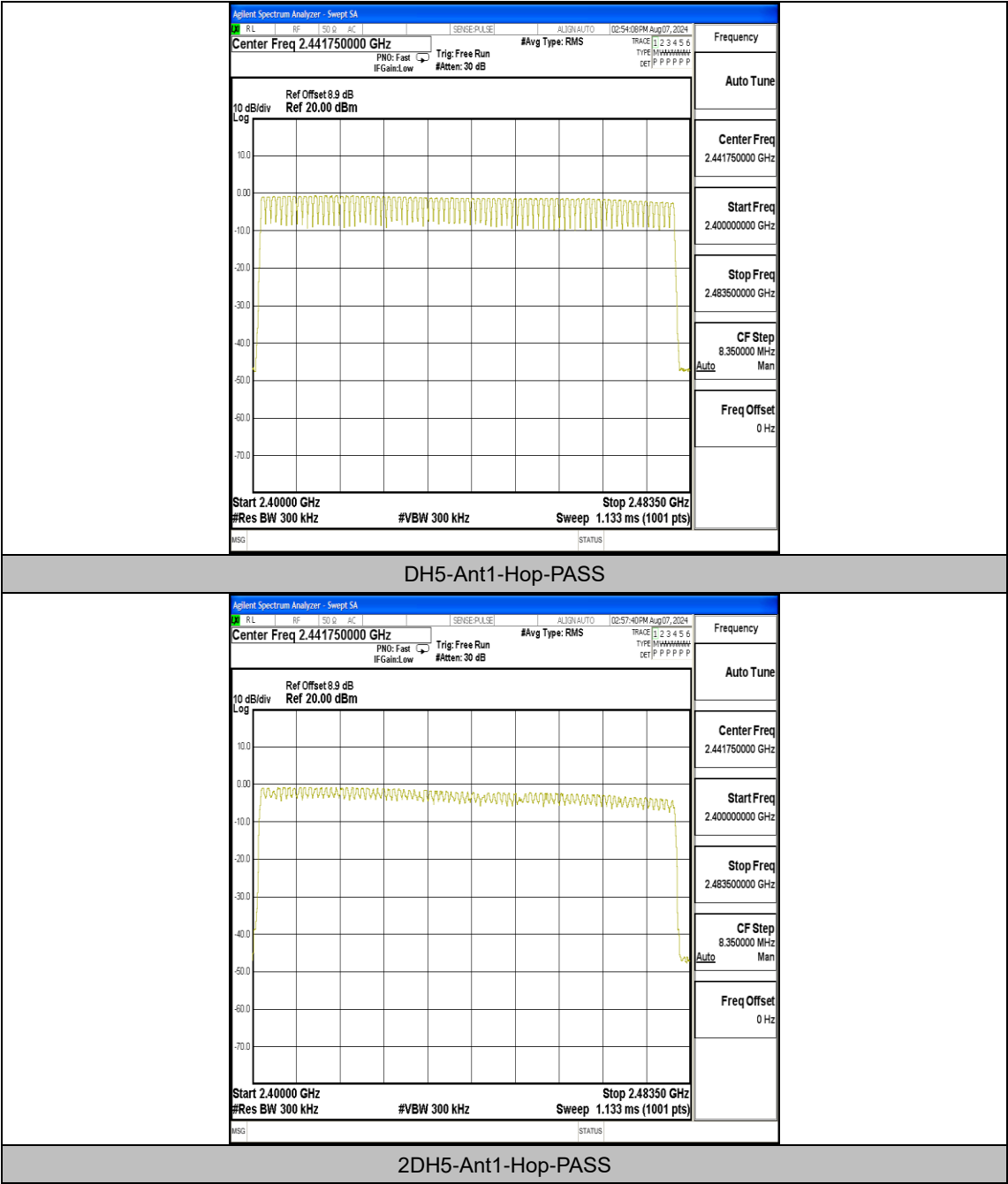


## Appendix F: Number of hopping channels

### Test Result

| TestMode | Antenna | Frequency[MHz] | Result[Num] | Limit[Num] | Verdict |
|----------|---------|----------------|-------------|------------|---------|
| DH5      | Ant1    | Hop            | 79          | ≥15        | PASS    |
| 2DH5     | Ant1    | Hop            | 79          | ≥15        | PASS    |

Test Graphs

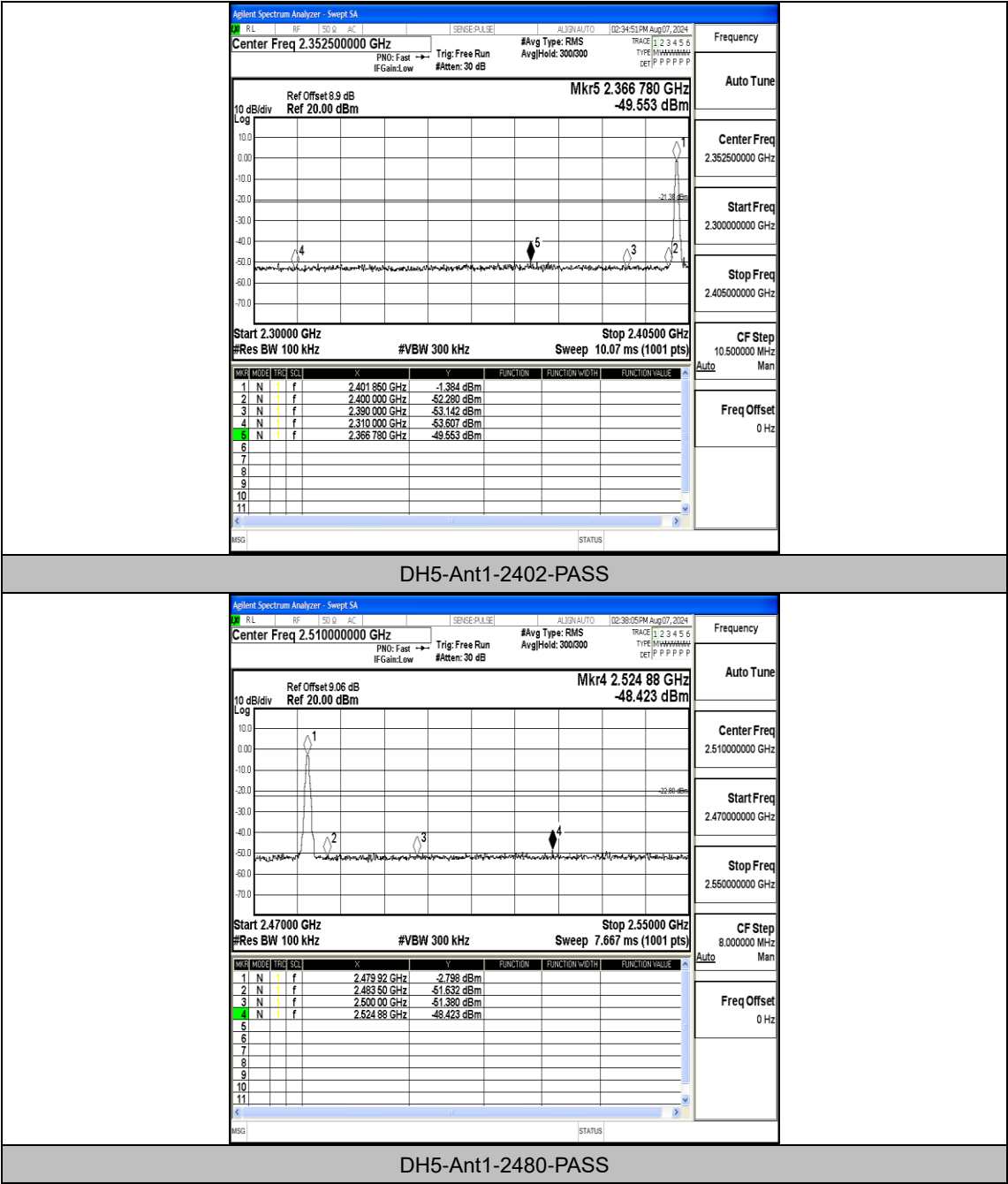


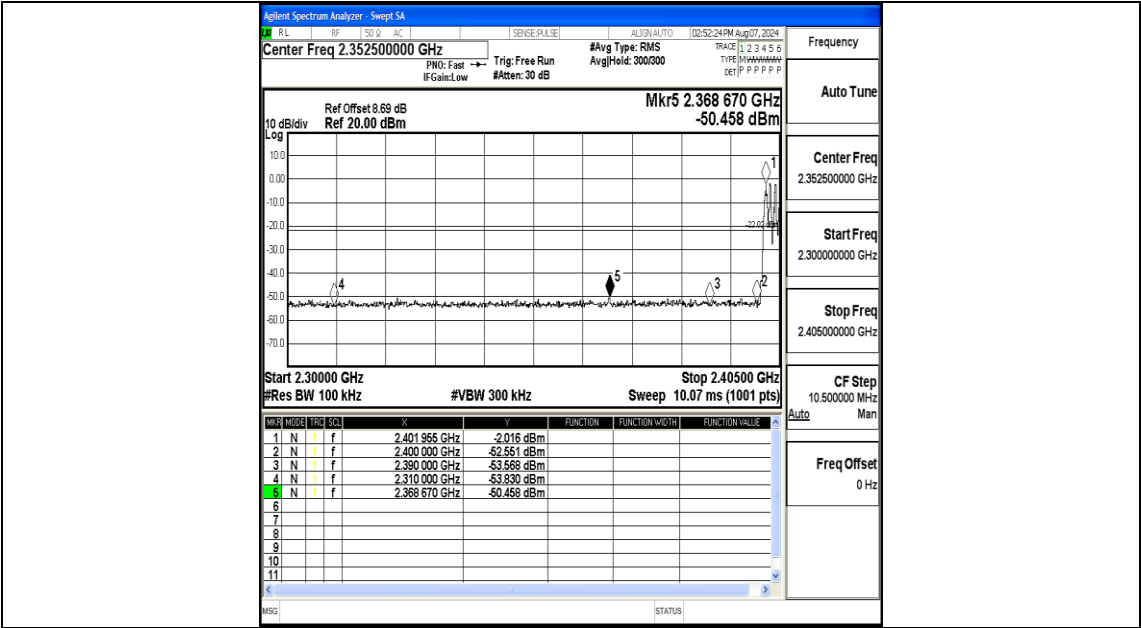
## Appendix G: Band edge measurements

### Test Result

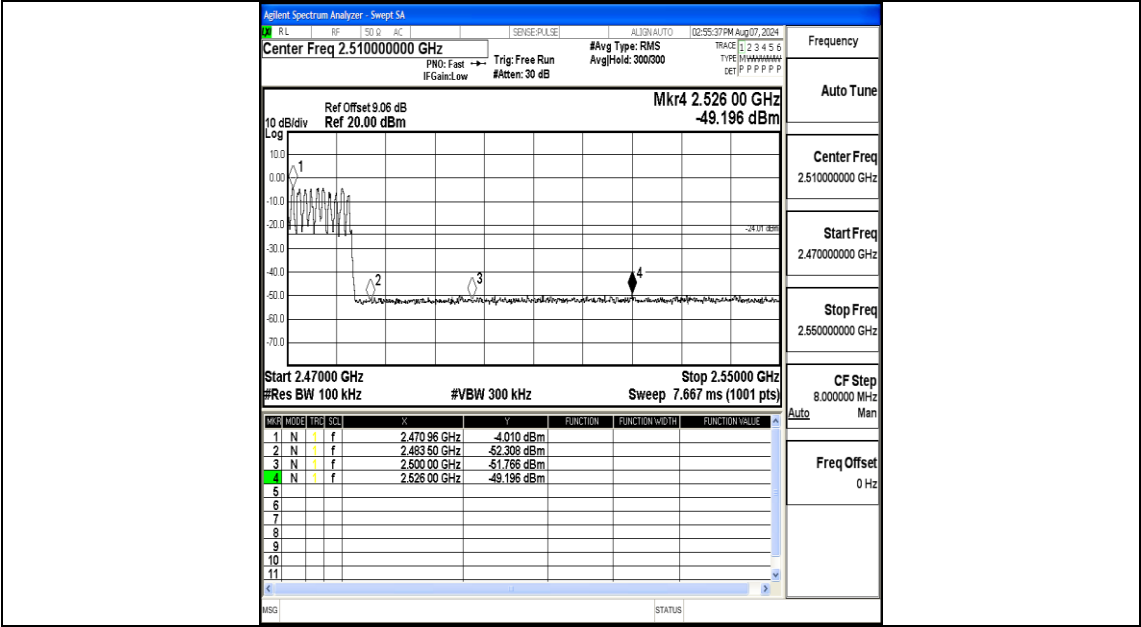
| TestMode | Antenna | ChName | Frequency[MHz] | RefLevel [dBm] | Result [dBm] | Limit [dBm]   | Verdict |
|----------|---------|--------|----------------|----------------|--------------|---------------|---------|
| DH5      | Ant1    | Low    | 2402           | -1.38          | -49.55       | $\leq -21.38$ | PASS    |
| DH5      | Ant1    | High   | 2480           | -2.80          | -48.42       | $\leq -22.8$  | PASS    |
| DH5      | Ant1    | Low    | Hop_2402       | -2.02          | -50.46       | $\leq -22.02$ | PASS    |
| DH5      | Ant1    | High   | Hop_2480       | -4.01          | -49.2        | $\leq -24.01$ | PASS    |
| 2DH5     | Ant1    | Low    | 2402           | -1.09          | -49.96       | $\leq -21.09$ | PASS    |
| 2DH5     | Ant1    | High   | 2480           | -3.89          | -49.5        | $\leq -23.89$ | PASS    |
| 2DH5     | Ant1    | Low    | Hop_2402       | -3.38          | -49.92       | $\leq -23.38$ | PASS    |
| 2DH5     | Ant1    | High   | Hop_2480       | -4.10          | -49.08       | $\leq -24.1$  | PASS    |

Test Graphs

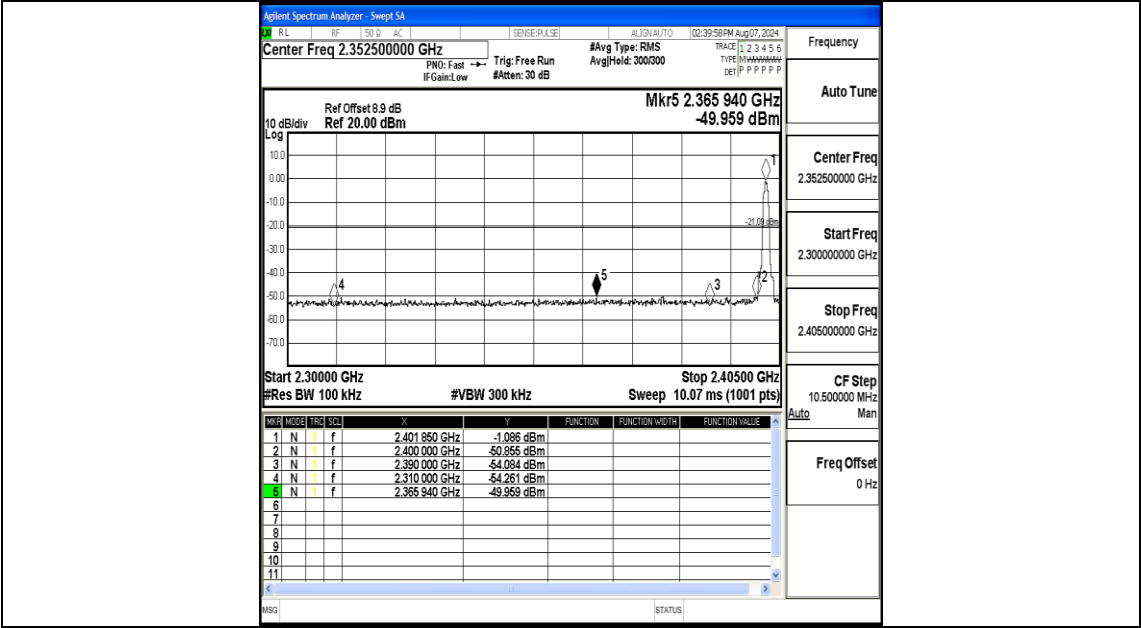




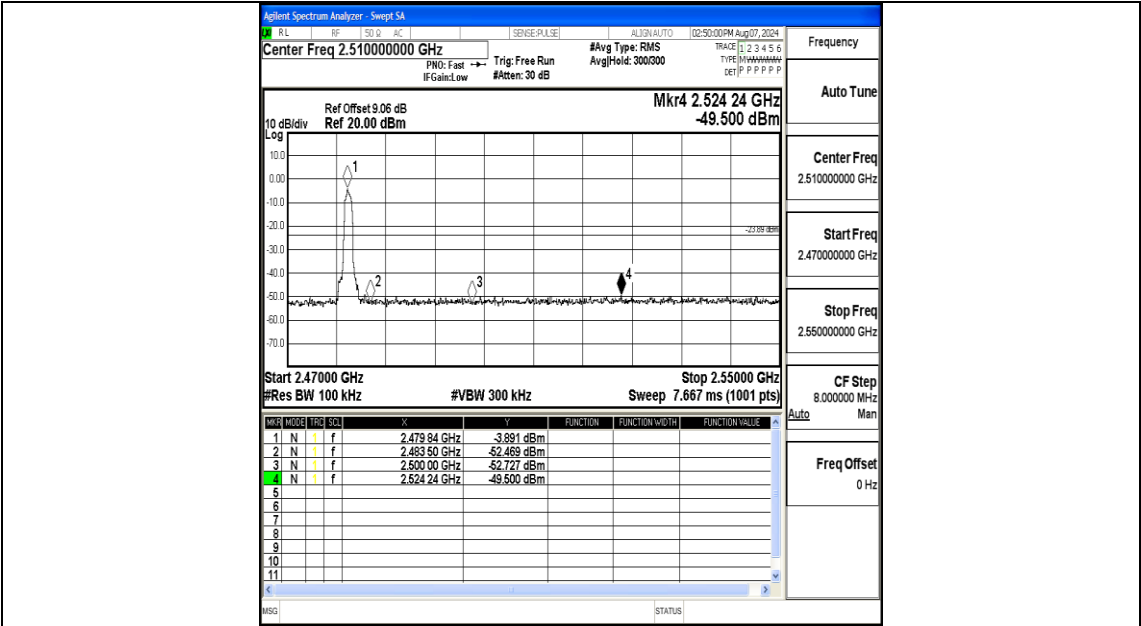
DH5-Ant1-Hop\_2402-PASS



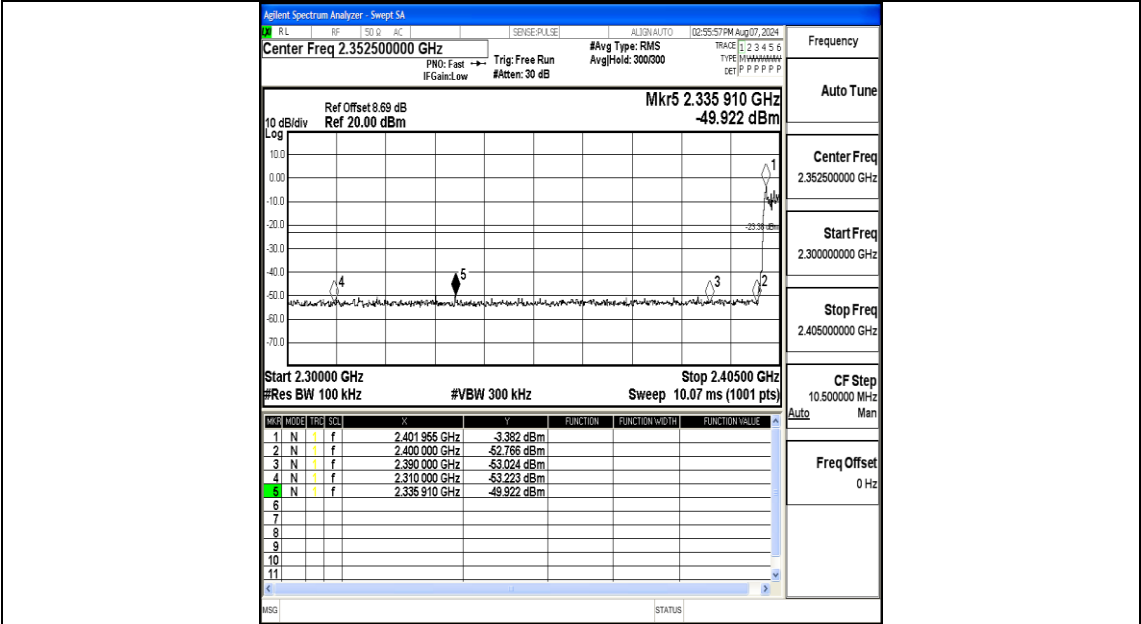
DH5-Ant1-Hop\_2480-PASS



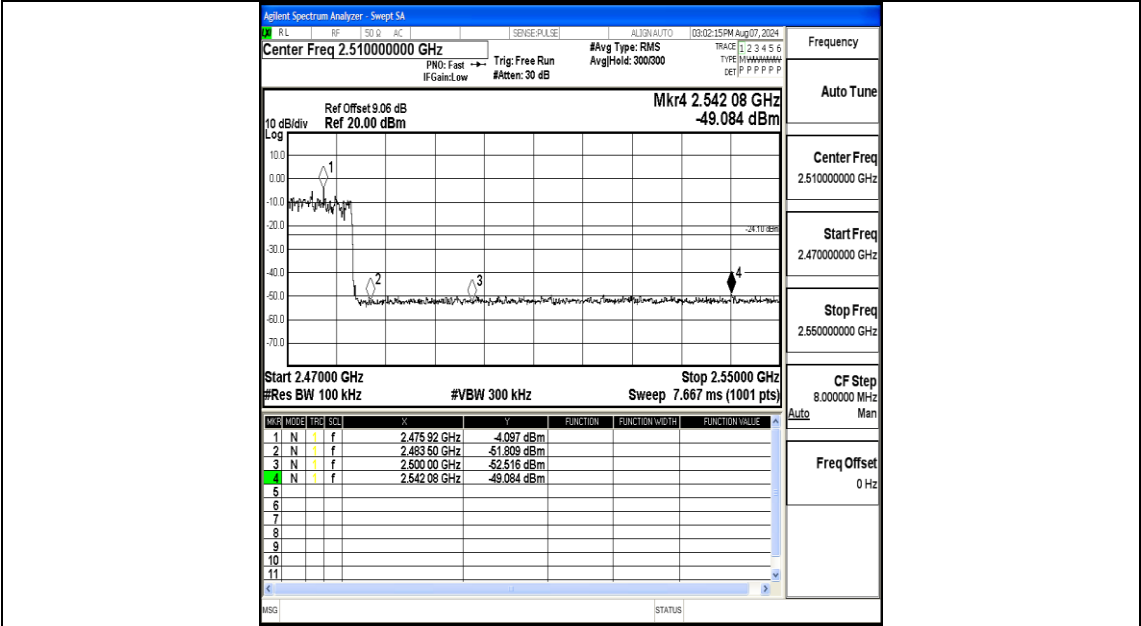
2DH5-Ant1-2402-PASS



2DH5-Ant1-2480-PASS



2DH5-Ant1-Hop\_2402-PASS



2DH5-Ant1-Hop\_2480-PASS

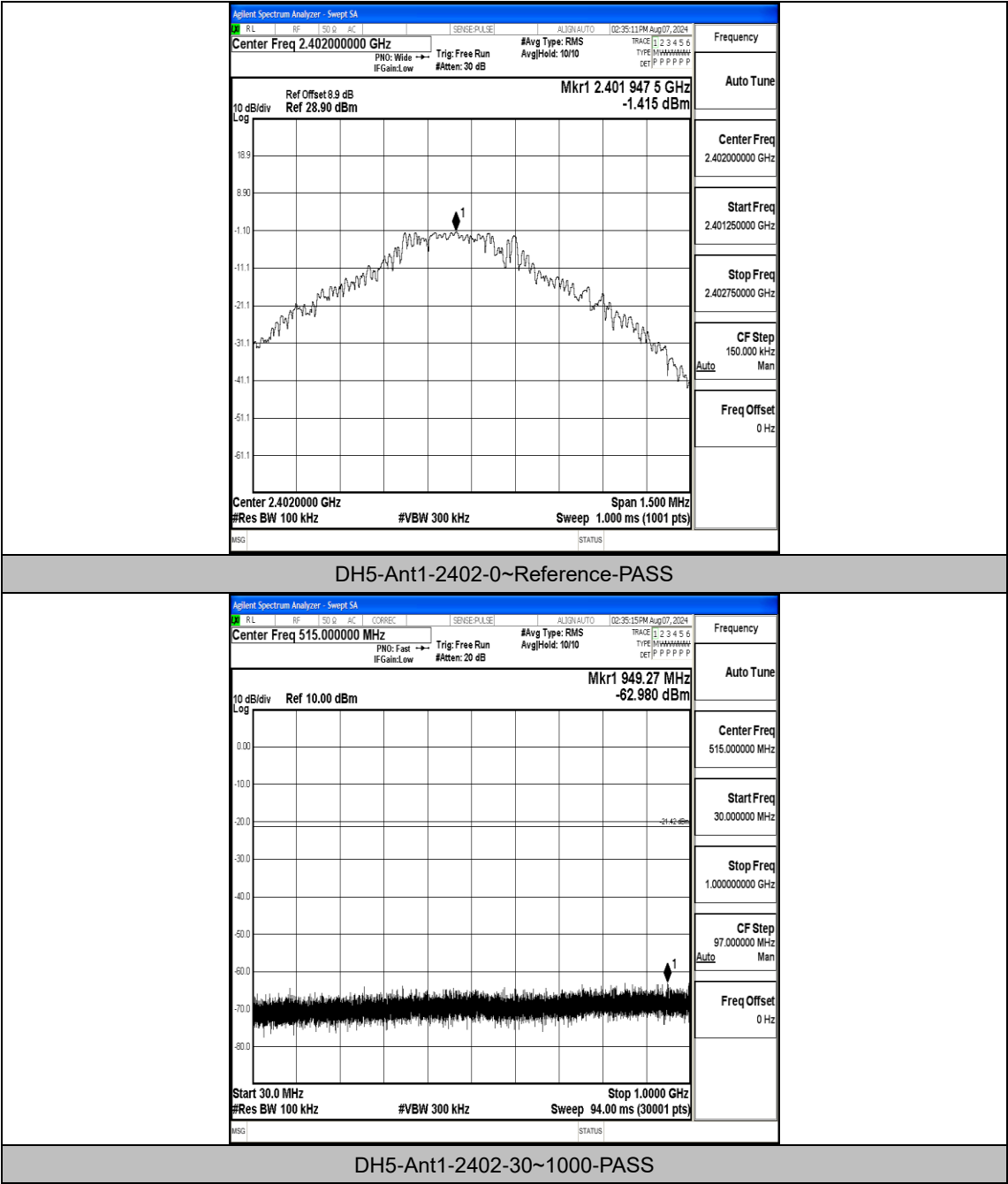
## Appendix H: Conducted Spurious Emission

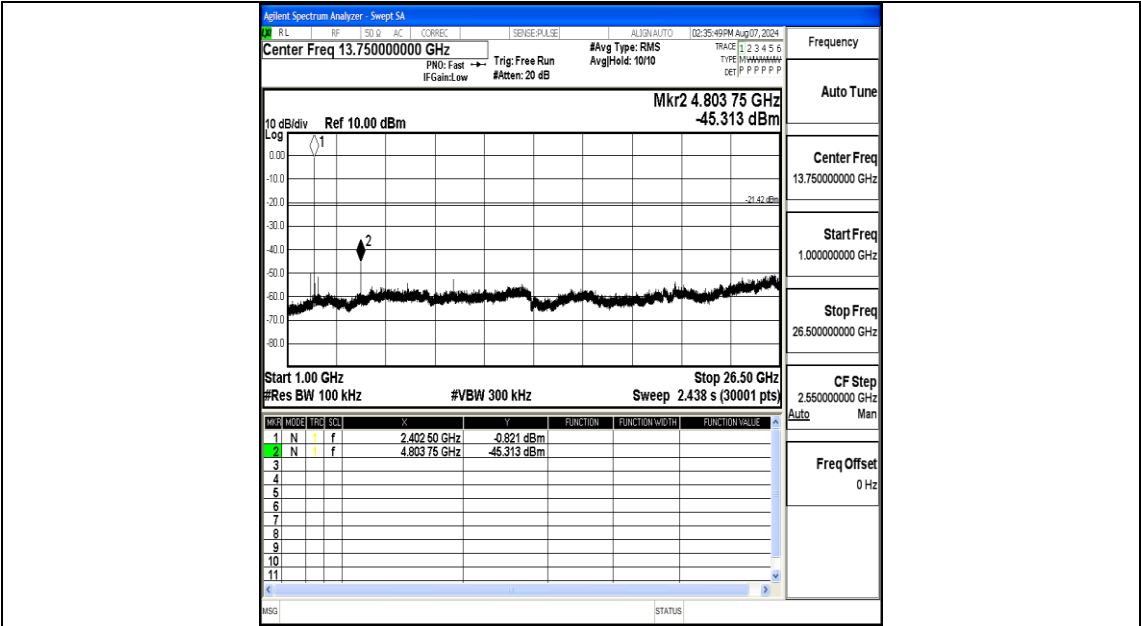
### Test Result

| TestMode | Antenna | Frequency[MHz] | FreqRange [MHz] | RefLevel [dBm] | Result [dBm] | Limit [dBm] | Verdict |
|----------|---------|----------------|-----------------|----------------|--------------|-------------|---------|
| DH5      | Ant1    | 2402           | 0~Reference     | -1.42          | -1.42        | ---         | PASS    |
| DH5      | Ant1    | 2402           | 30~1000         | -1.42          | -62.98       | ≤-21.42     | PASS    |
| DH5      | Ant1    | 2402           | 1000~26500      | -1.42          | -45.31       | ≤-21.42     | PASS    |
| DH5      | Ant1    | 2441           | 0~Reference     | -2.14          | -2.14        | ---         | PASS    |
| DH5      | Ant1    | 2441           | 30~1000         | -2.14          | -62.48       | ≤-22.14     | PASS    |
| DH5      | Ant1    | 2441           | 1000~26500      | -2.14          | -44.31       | ≤-22.14     | PASS    |
| DH5      | Ant1    | 2480           | 0~Reference     | -3.43          | -3.43        | ---         | PASS    |
| DH5      | Ant1    | 2480           | 30~1000         | -3.43          | -62.5        | ≤-23.43     | PASS    |
| DH5      | Ant1    | 2480           | 1000~26500      | -3.43          | -45.79       | ≤-23.43     | PASS    |
| 2DH5     | Ant1    | 2402           | 0~Reference     | -4.69          | -4.69        | ---         | PASS    |
| 2DH5     | Ant1    | 2402           | 30~1000         | -4.69          | -62.21       | ≤-24.69     | PASS    |
| 2DH5     | Ant1    | 2402           | 1000~26500      | -4.69          | -45.88       | ≤-24.69     | PASS    |
| 2DH5     | Ant1    | 2441           | 0~Reference     | -1.56          | -1.56        | ---         | PASS    |
| 2DH5     | Ant1    | 2441           | 30~1000         | -1.56          | -62.15       | ≤-21.56     | PASS    |
| 2DH5     | Ant1    | 2441           | 1000~26500      | -1.56          | -46.24       | ≤-21.56     | PASS    |
| 2DH5     | Ant1    | 2480           | 0~Reference     | -2.75          | -2.75        | ---         | PASS    |
| 2DH5     | Ant1    | 2480           | 30~1000         | -2.75          | -62.86       | ≤-22.75     | PASS    |
| 2DH5     | Ant1    | 2480           | 1000~26500      | -2.75          | -47.5        | ≤-22.75     | PASS    |

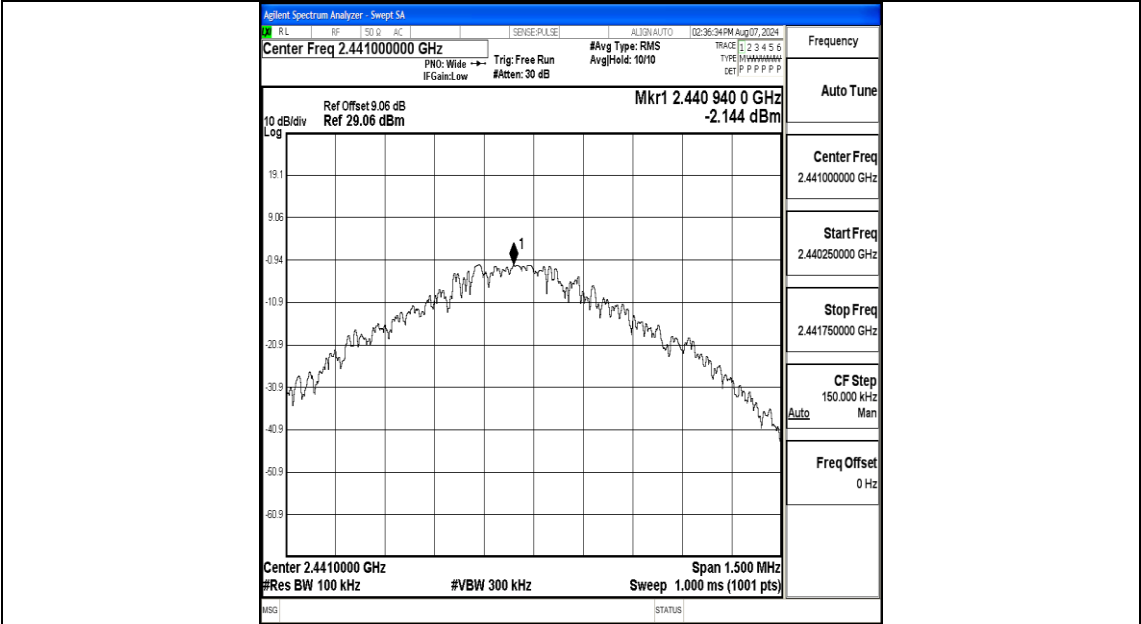


Test Graphs

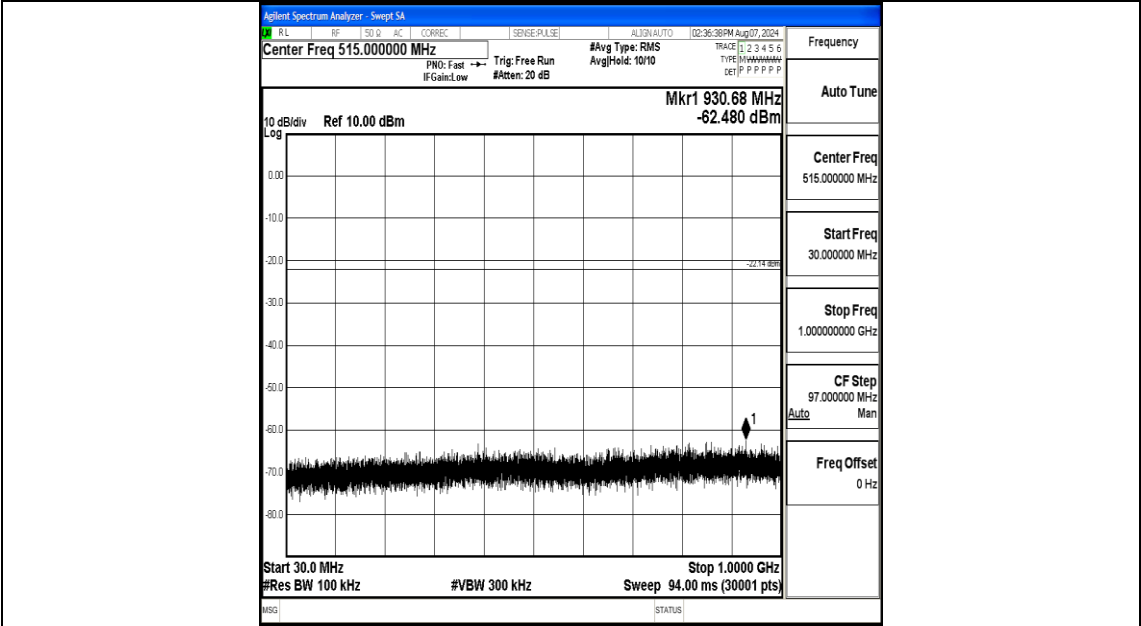




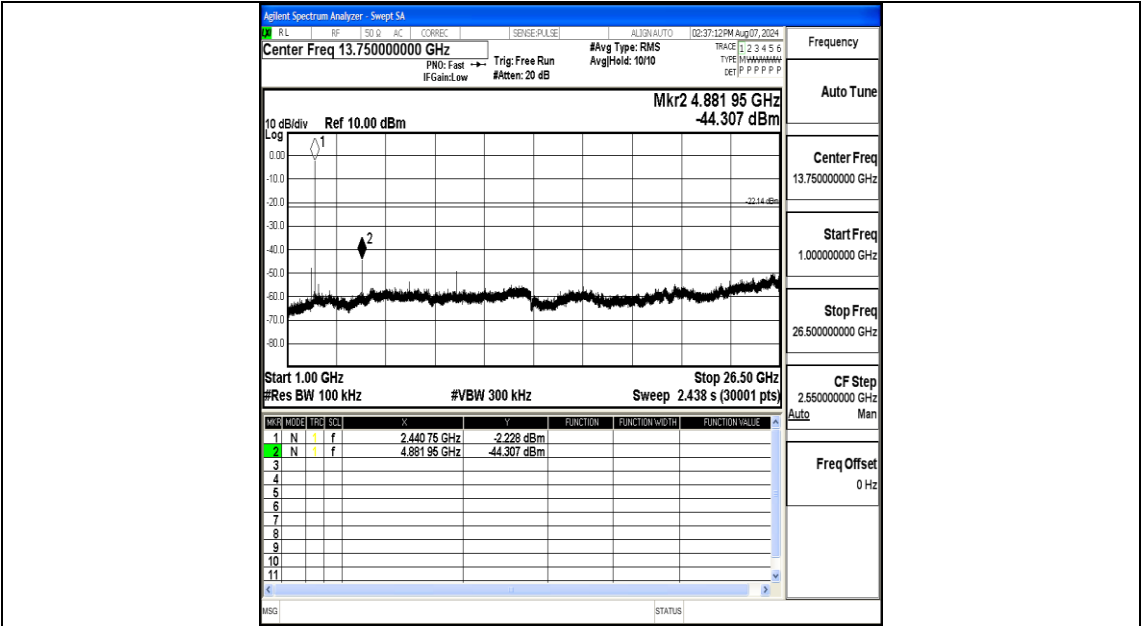
DH5-Ant1-2402-1000~26500-PASS



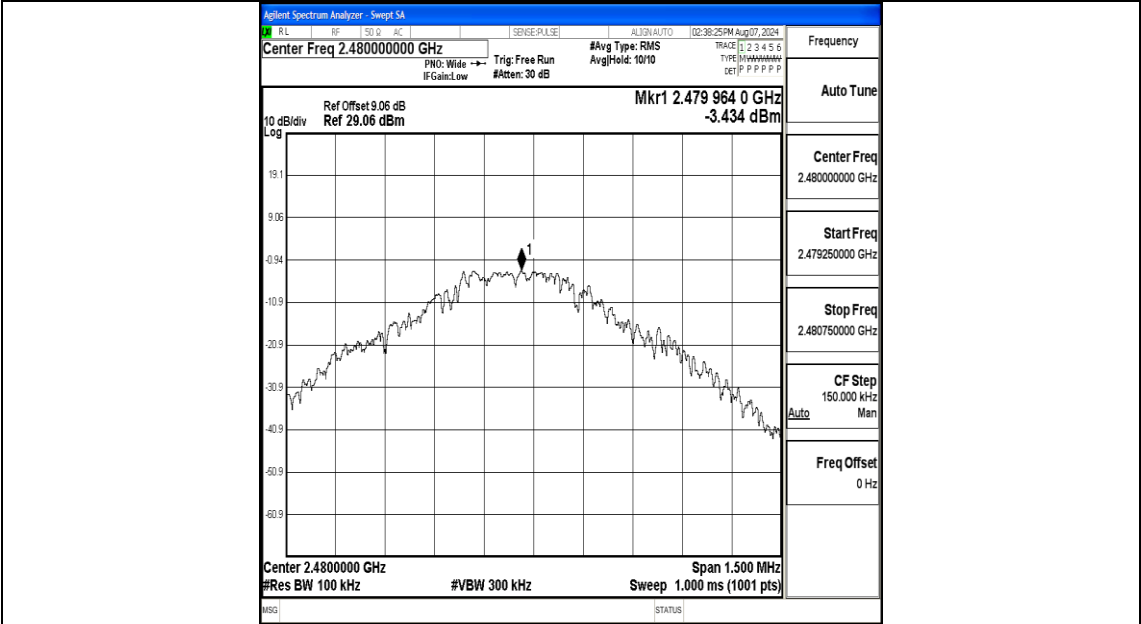
DH5-Ant1-2441-0~Reference-PASS



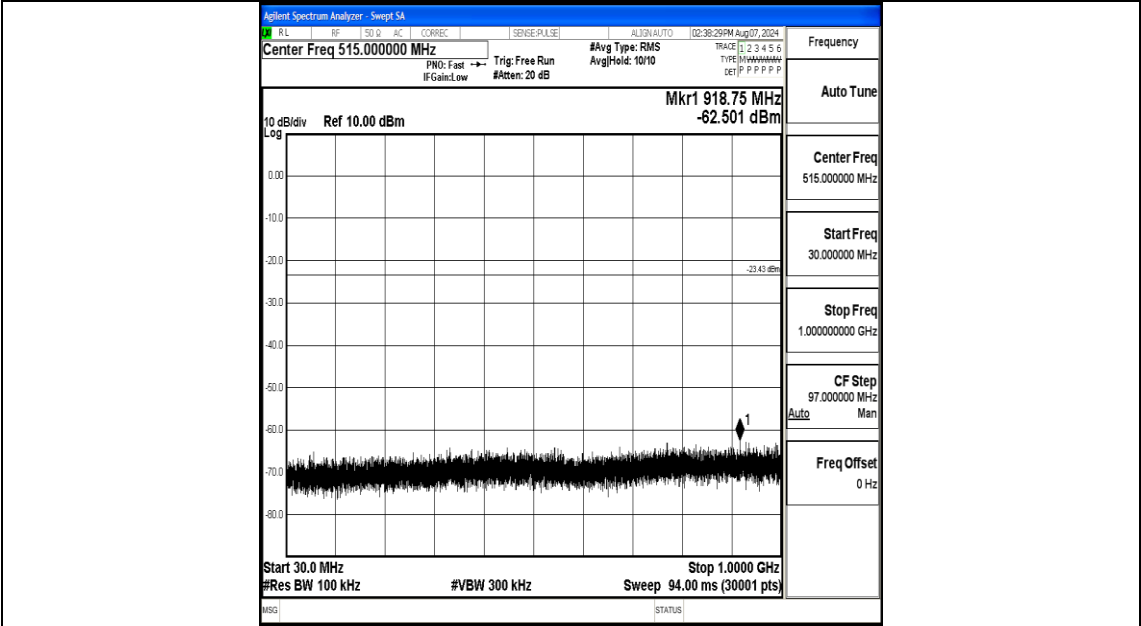
DH5-Ant1-2441-30~1000-PASS



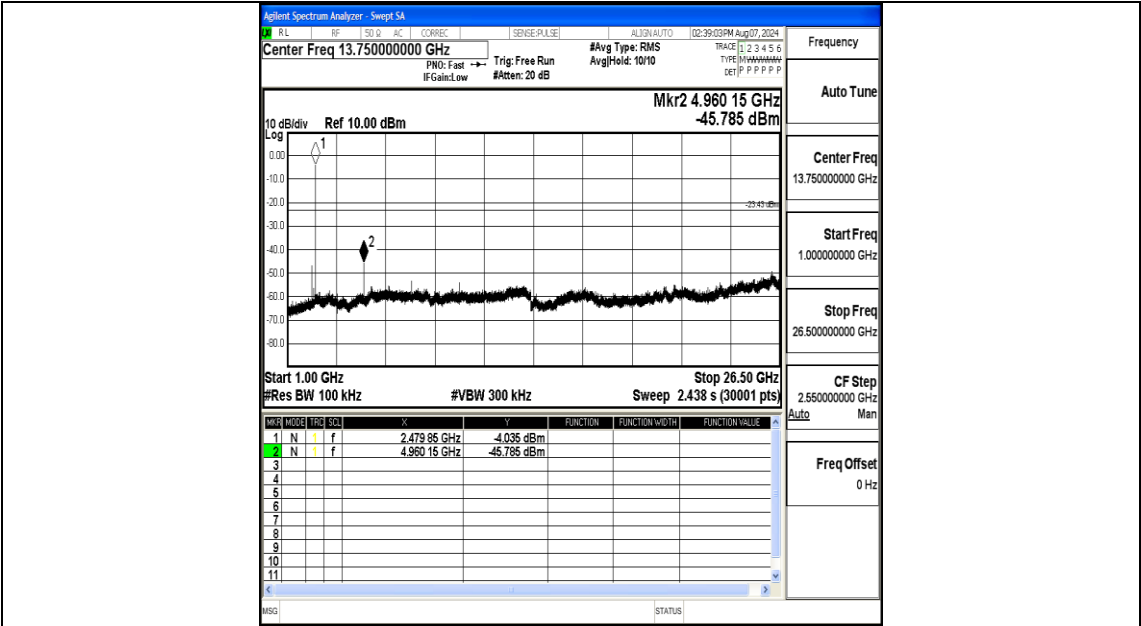
DH5-Ant1-2441-1000~26500-PASS



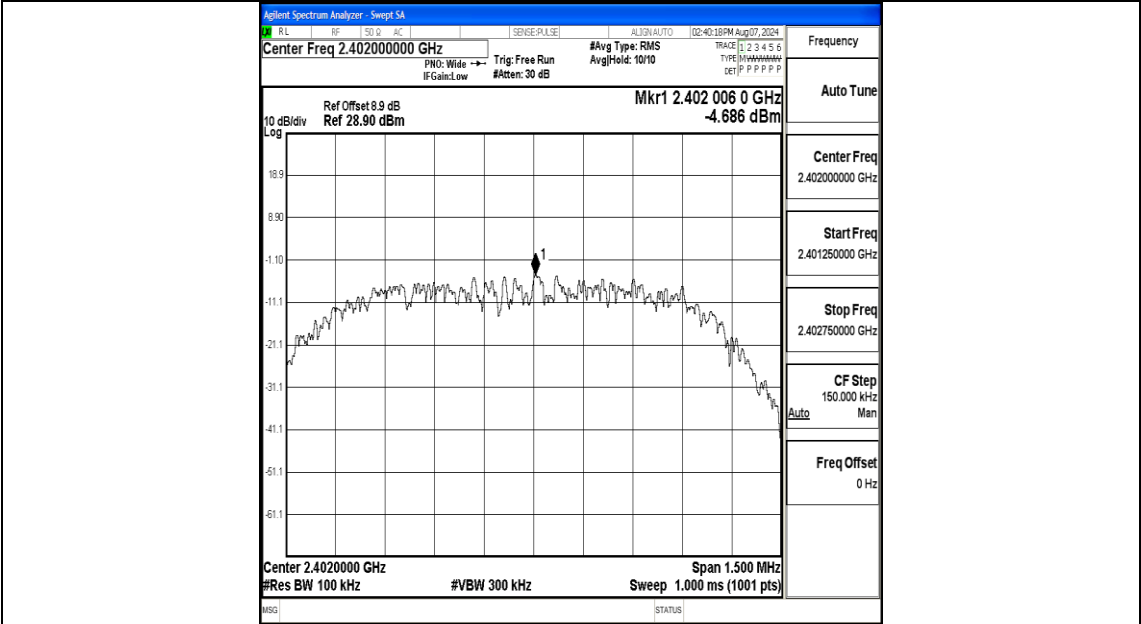
DH5-Ant1-2480-0~Reference-PASS



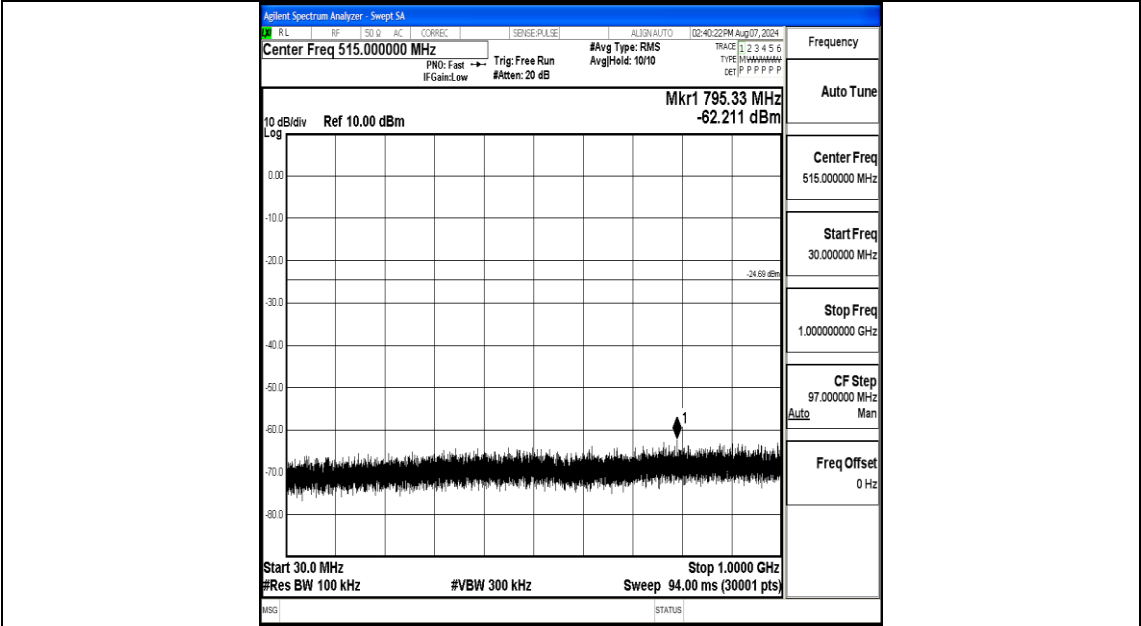
DH5-Ant1-2480-30~1000-PASS



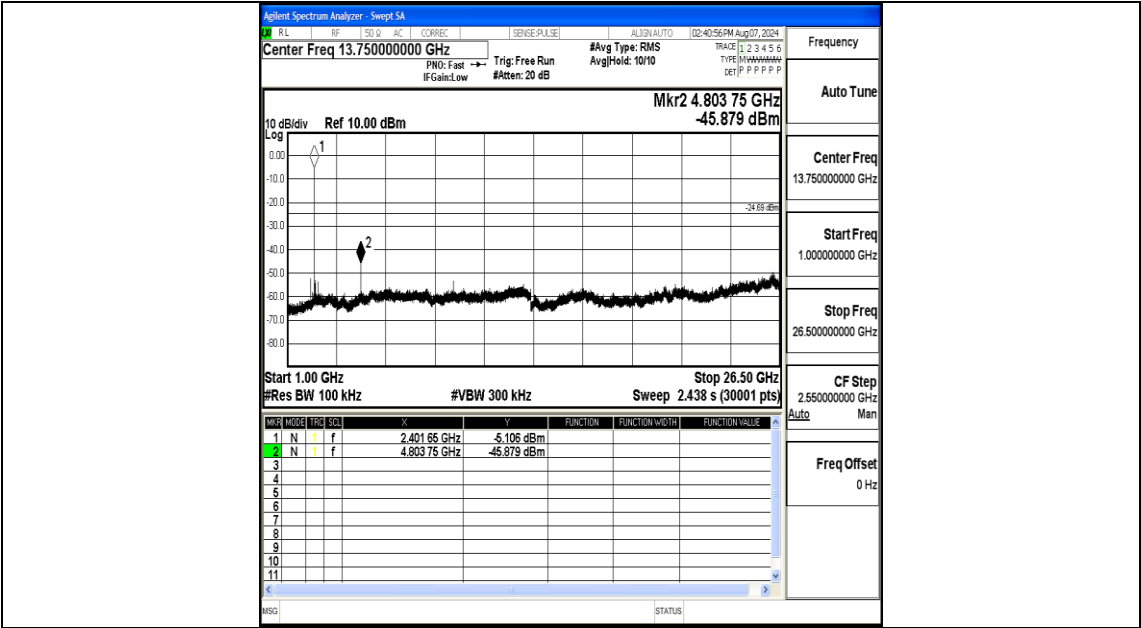
DH5-Ant1-2480-1000~26500-PASS



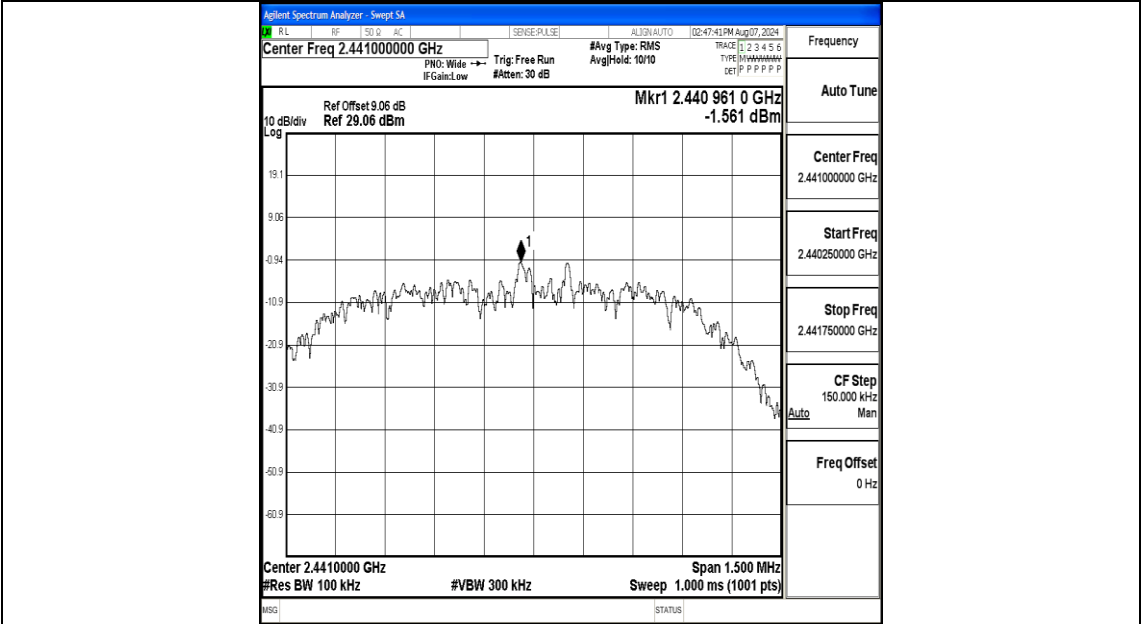
2DH5-Ant1-2402-0~Reference-PASS



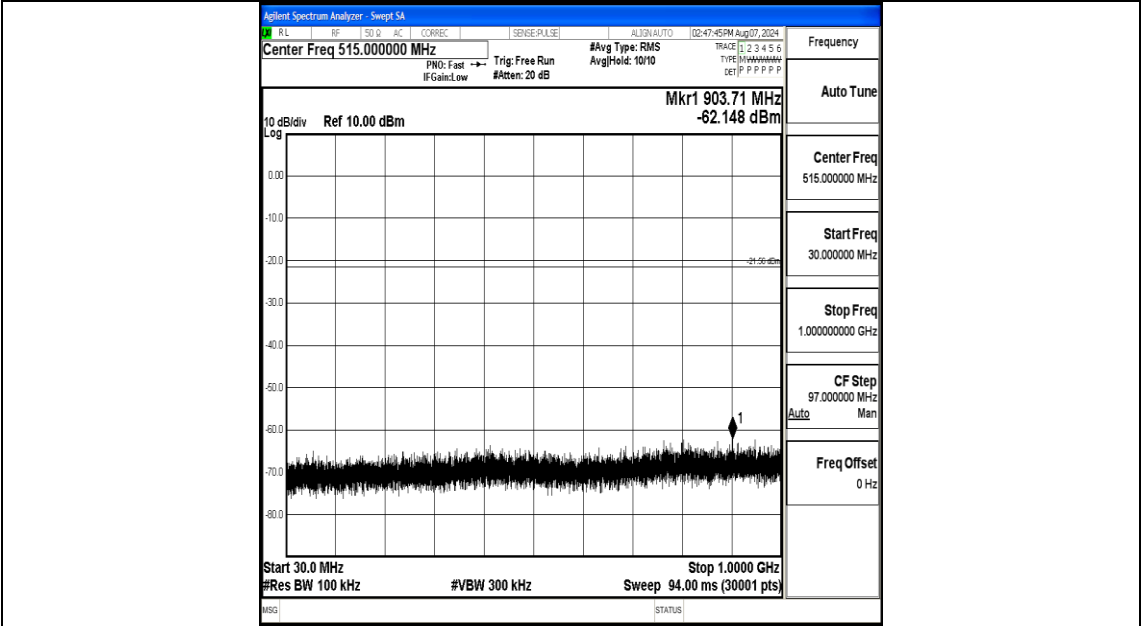
2DH5-Ant1-2402-30~1000-PASS



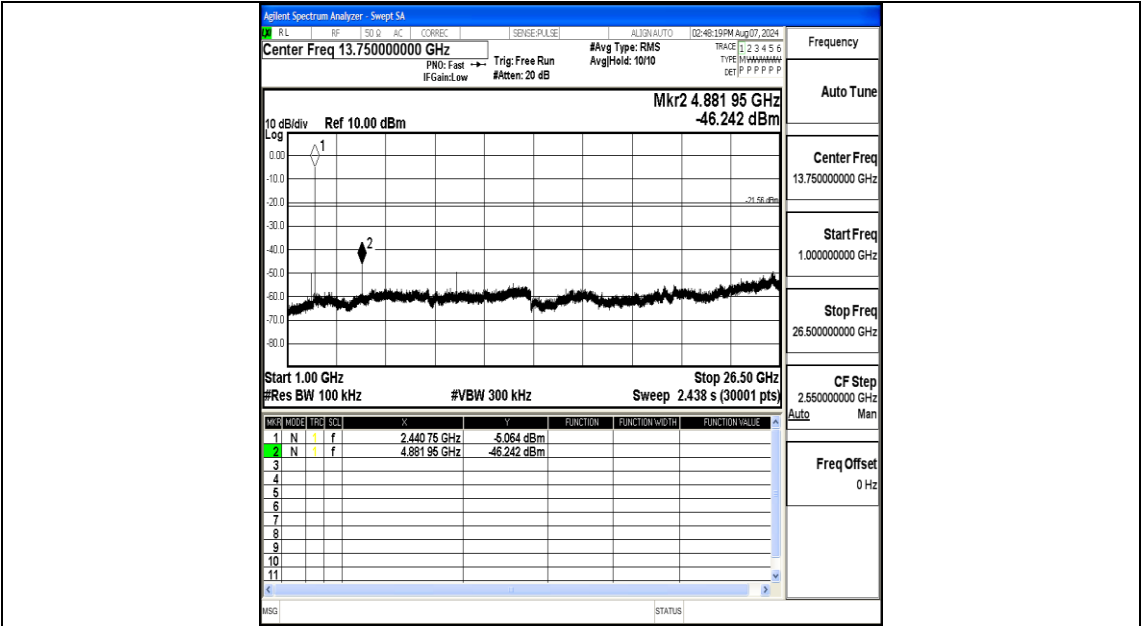
2DH5-Ant1-2402-1000~26500-PASS



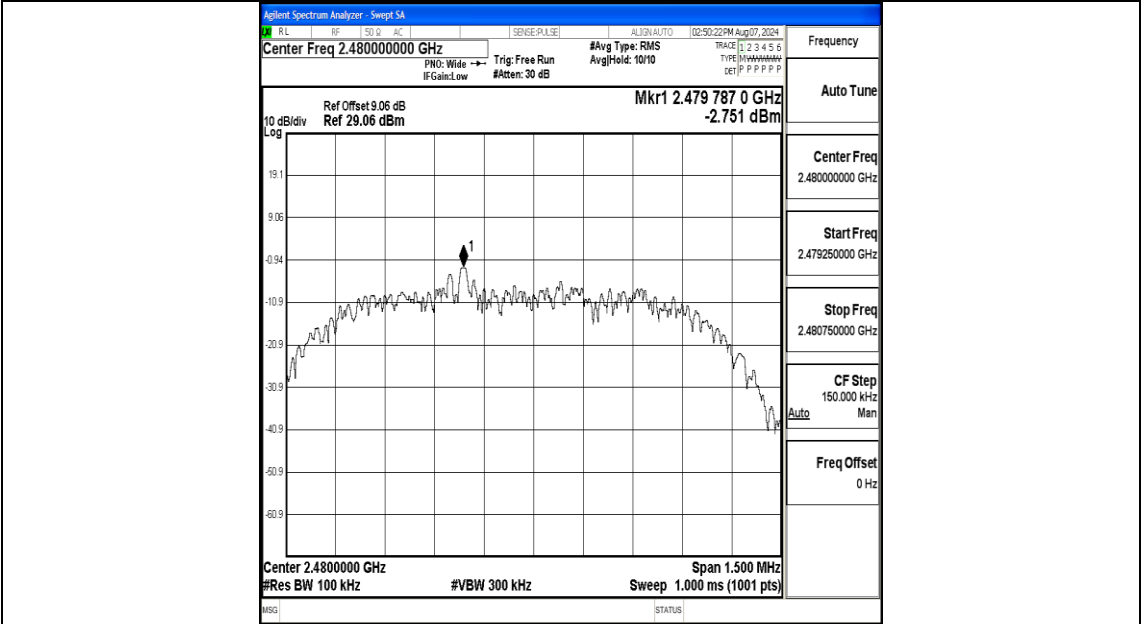
2DH5-Ant1-2441-0~Reference-PASS



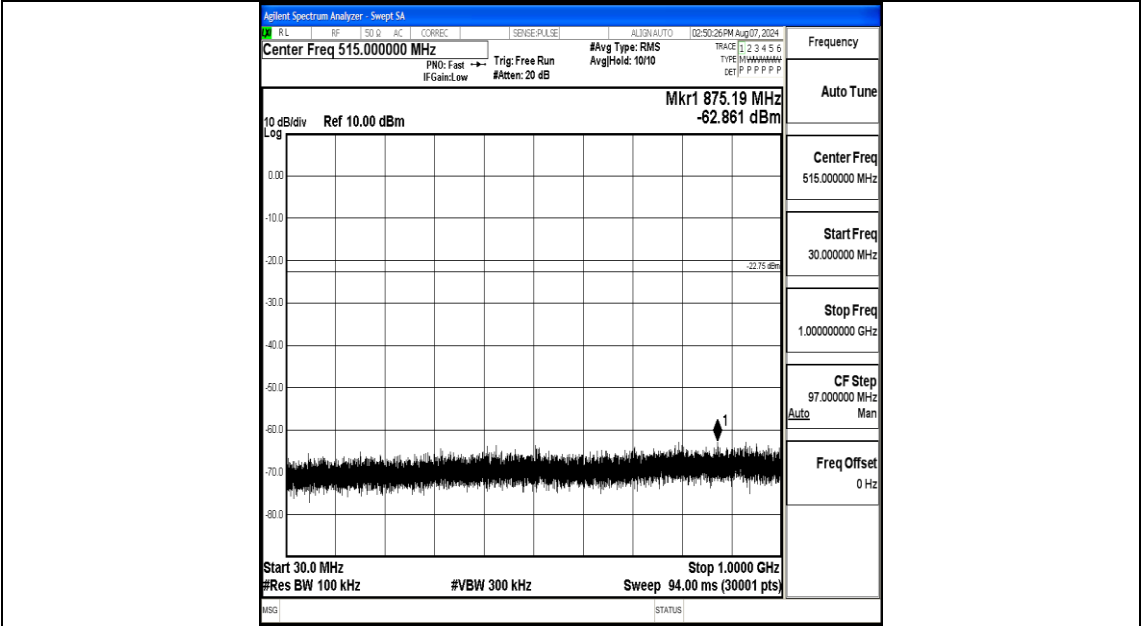
2DH5-Ant1-2441-30~1000-PASS



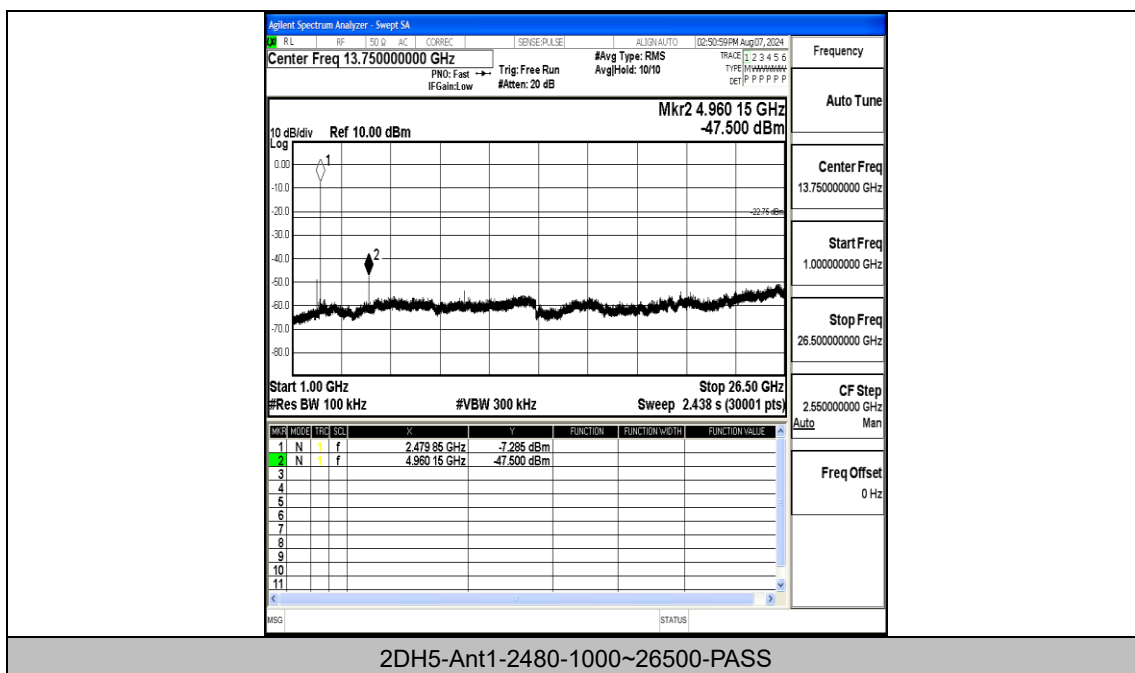
2DH5-Ant1-2441-1000~26500-PASS



2DH5-Ant1-2480-0~Reference-PASS



2DH5-Ant1-2480-30~1000-PASS



## Appendix I: Duty Cycle

### Test Result

| TestMode | Antenna | Frequency[MHz] | ON Time[ms] | Period[ms] | Duty Cycle[%] | Duty Cycle Factor[dB] |
|----------|---------|----------------|-------------|------------|---------------|-----------------------|
| DH5      | Ant1    | 2402           | 2.89        | 3.75       | 77.07         | 1.13                  |
| DH5      | Ant1    | 2441           | 2.89        | 3.75       | 77.07         | 1.13                  |
| DH5      | Ant1    | 2480           | 2.88        | 3.75       | 76.80         | 1.15                  |
| 2DH5     | Ant1    | 2402           | 2.89        | 3.75       | 77.07         | 1.13                  |
| 2DH5     | Ant1    | 2441           | 2.89        | 3.75       | 77.07         | 1.13                  |
| 2DH5     | Ant1    | 2480           | 2.89        | 3.75       | 77.07         | 1.13                  |



Test Graphs

