



REPORT No.: SZ21010412S02

## Annex D Plots of Power Density Measurement

Test Laboratory: Morlab Laboratory

5G NR n260\_50MHz\_QPSK\_Right Edge\_2mm\_Frequency 40GHz\_Antenna Module 0

Device under Test Properties

| Name, Manufacturer | Dimensions [mm]     | IMEI | DUT Type |
|--------------------|---------------------|------|----------|
| N/A                | 172.0 x 78.0 x 10.0 |      | Phone    |

Exposure Conditions

| Phantom Section | Position, Test Distance [mm] | Band      | Frequency [MHz], Channel Number | Conversion Factor |
|-----------------|------------------------------|-----------|---------------------------------|-------------------|
| 5G Air          | RIGHT EDGE<br>2.0            | Band n260 | 39975,<br>2254366               | 1.0               |

Hardware Setup

| Phantom | Medium | Probe, Calibration Date                  | DAE, Calibration Date  |
|---------|--------|------------------------------------------|------------------------|
| mmWave  | Air    | EUmmWV4 - SN9512_F1-78GHz,<br>2020-12-02 | DAE4 Sn1643,2020-11-30 |

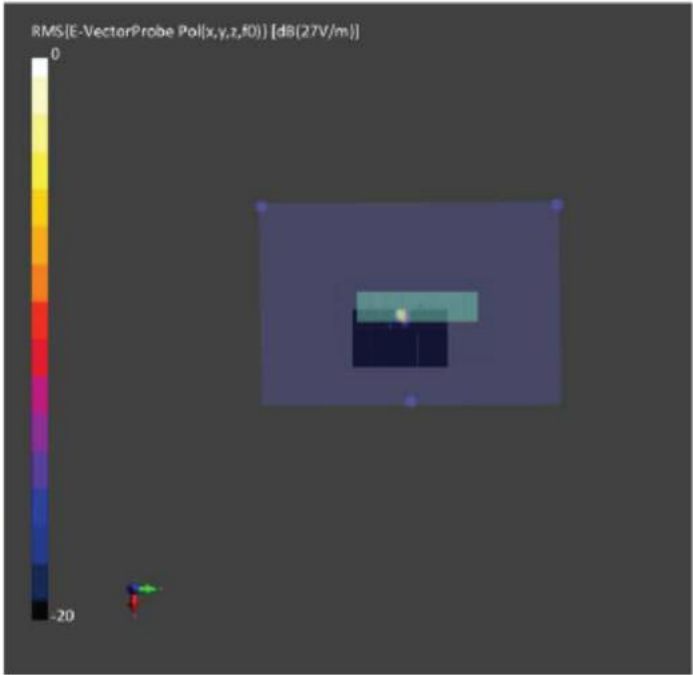
Scan Setup

|                     | 5G Scan    |
|---------------------|------------|
| Grid Extents [mm]   | 25.0x 25.0 |
| Grid Steps [lambda] | 0.25x 0.25 |
| Sensor Surface [mm] | 5.0        |
| MAIA                | N/A        |

Measurement Results

|                                          | 5G Scan            |
|------------------------------------------|--------------------|
| Date                                     | 2021-04-14, 16:042 |
| Avg. Area [cm <sup>2</sup> ]             | 4.00               |
| pS <sub>tot</sub> avg[W/m <sup>2</sup> ] | 1.09               |
| pS <sub>n</sub> avg [W/m <sup>2</sup> ]  | 0.90               |
| E <sub>peak</sub> [V/m]                  | 27.0               |
| H <sub>peak</sub> [A/m]                  | 0.58               |
| Power Drift [dB]                         | -0.04              |

| Details | 5G Scan |
|---------|---------|
|---------|---------|



Test Laboratory: Morlab Laboratory

5G NR n260\_50MHz\_QPSK\_Left Edge\_2mm\_Frequency 40GHz\_Antenna Module 1

Device under Test Properties

| Name, Manufacturer | Dimensions [mm]     | IMEI | DUT Type |
|--------------------|---------------------|------|----------|
| N/A                | 172.0 x 78.0 x 10.0 |      | Phone    |

Exposure Conditions

| Phantom Section | Position, Test Distance [mm] | Band      | Frequency [MHz], Channel Number | Conversion Factor |
|-----------------|------------------------------|-----------|---------------------------------|-------------------|
| 5G Air          | LEFT EDGE<br>2.0             | Band n260 | 39975,2254366                   | 1.0               |

Hardware Setup

| Phantom | Medium | Probe, Calibration Date                  | DAE, Calibration Date  |
|---------|--------|------------------------------------------|------------------------|
| mmWave  | Air    | EUmmWV4 - SN9512_F1-78GHz,<br>2020-12-02 | DAE4 Sn1643,2020-11-30 |

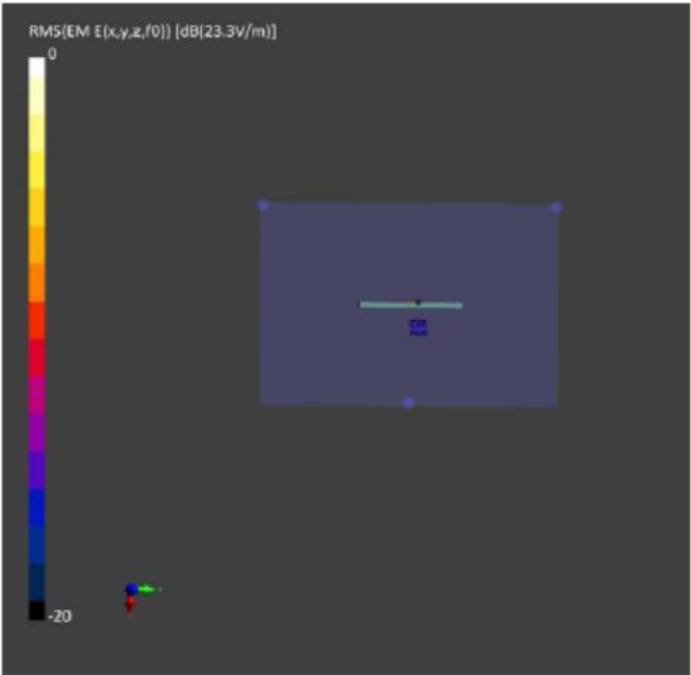
Scan Setup

|                     | 5G Scan    |
|---------------------|------------|
| Grid Extents [mm]   | 25.0x 25.0 |
| Grid Steps [lambda] | 0.25x 0.25 |
| Sensor Surface [mm] | 5.0        |
| MAIA                | N/A        |

Measurement Results

|                                          | 5G Scan           |
|------------------------------------------|-------------------|
| Date                                     | 2021-04-14, 16:36 |
| Avg. Area [cm <sup>2</sup> ]             | 4.00              |
| pS <sub>tot</sub> avg[W/m <sup>2</sup> ] | 1.16              |
| pS <sub>n</sub> avg [W/m <sup>2</sup> ]  | 1.63              |
| E <sub>peak</sub> [V/m]                  | 23.3              |
| H <sub>peak</sub> [A/m]                  | 0.051             |
| Power Drift [dB]                         | 0.14              |

| Details | 5G Scan |
|---------|---------|
|---------|---------|



Test Laboratory: Morlab Laboratory

5G NR n260\_50MHz\_QPSK\_Back Face\_2mm\_Frequency 38.5GHz\_Antenna Module 2

Device under Test Properties

| Name, Manufacturer | Dimensions [mm]     | IMEI | DUT Type |
|--------------------|---------------------|------|----------|
| N/A                | 172.0 x 78.0 x 10.0 |      | Phone    |

Exposure Conditions

| Phantom Section | Position, Test Distance [mm] | Band      | Frequency [MHz], Channel Number | Conversion Factor |
|-----------------|------------------------------|-----------|---------------------------------|-------------------|
| 5G Air          | LEFT EDGE<br>2.0             | Band n260 | 38512.0,2254366                 | 1.0               |

Hardware Setup

| Phantom | Medium | Probe, Calibration Date                  | DAE, Calibration Date  |
|---------|--------|------------------------------------------|------------------------|
| mmWave  | Air    | EUmmWV4 - SN9512_F1-78GHz,<br>2020-12-02 | DAE4 Sn1643,2020-11-30 |

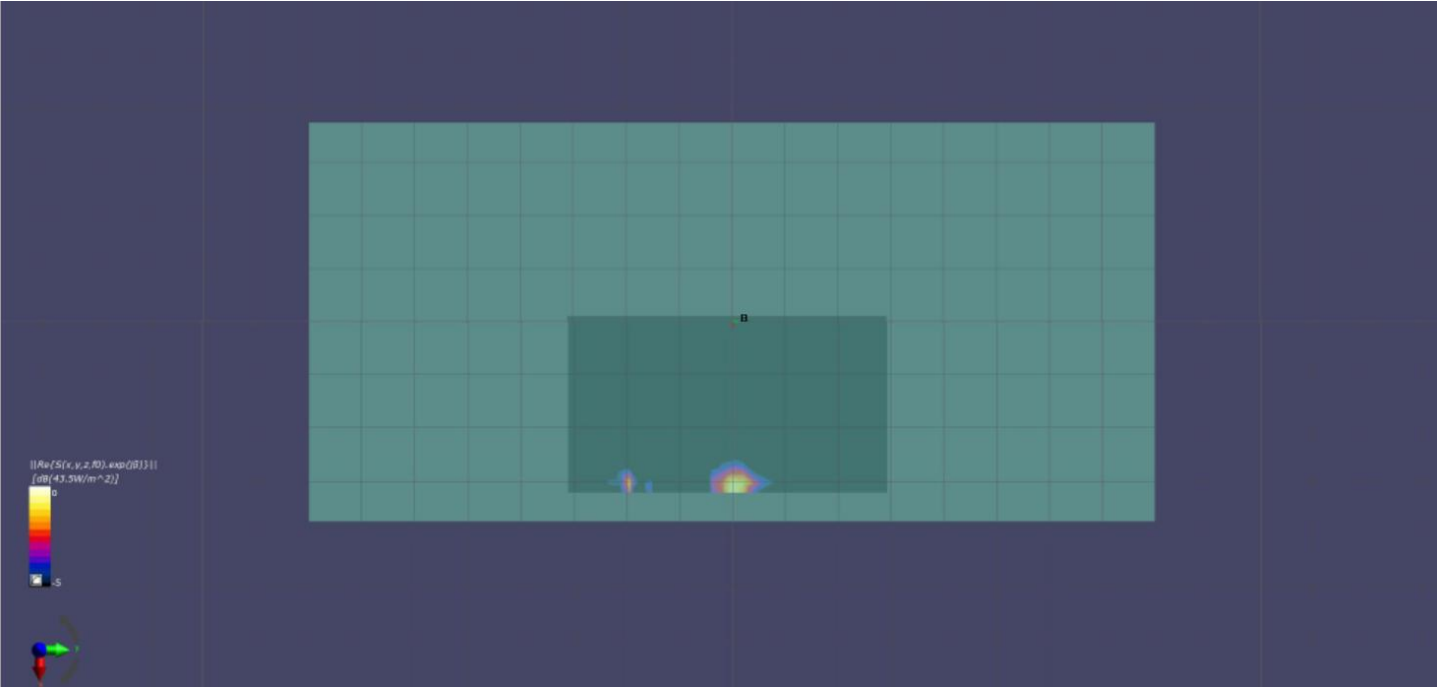
Scan Setup

|                     | 5G Scan    |
|---------------------|------------|
| Grid Extents [mm]   | 25.0x 25.0 |
| Grid Steps [lambda] | 0.25x 0.25 |
| Sensor Surface [mm] | 5.0        |
| MAIA                | N/A        |

Measurement Results

|                                          | 5G Scan           |
|------------------------------------------|-------------------|
| Date                                     | 2021-04-13, 14:51 |
| Avg. Area [cm <sup>2</sup> ]             | 4.00              |
| pS <sub>tot</sub> avg[W/m <sup>2</sup> ] | 0.53              |
| pS <sub>n</sub> avg [W/m <sup>2</sup> ]  | 0.57              |
| E <sub>peak</sub> [V/m]                  | 20.5              |
| H <sub>peak</sub> [V/m]                  | 0.055             |
| Power Drift [dB]                         | -0.12             |

Details5G Scan



Test Laboratory: Morlab Laboratory

5G NR n261\_50MHz\_16QAM\_Right Edge\_2mm\_Frequency 27.5MHz\_Antenna Module 0

Device under Test Properties

| Name, Manufacturer | Dimensions [mm]    | IMEI | DUT Type |
|--------------------|--------------------|------|----------|
| Device             | 172.0 x 78.0 x10.0 |      | Phone    |

Exposure Conditions

| Phantom Section | Position, Test Distance [mm] | Band      | Group, UID | Frequency [MHz], Channel Number | Conversion Factor |
|-----------------|------------------------------|-----------|------------|---------------------------------|-------------------|
| 5G Air          | RIGHT EDGE 2.0               | Band n261 |            | 27523.5,2077891                 | 1.0               |

Hardware Setup

| Phantom | Medium | Probe, Calibration Date               | DAE, Calibration Date  |
|---------|--------|---------------------------------------|------------------------|
| mmWave  | Air    | EUmmWV4 - SN9512_F1-78GHz, 2020-12-02 | DAE4 Sn1643,2020-11-30 |

Scan Setup

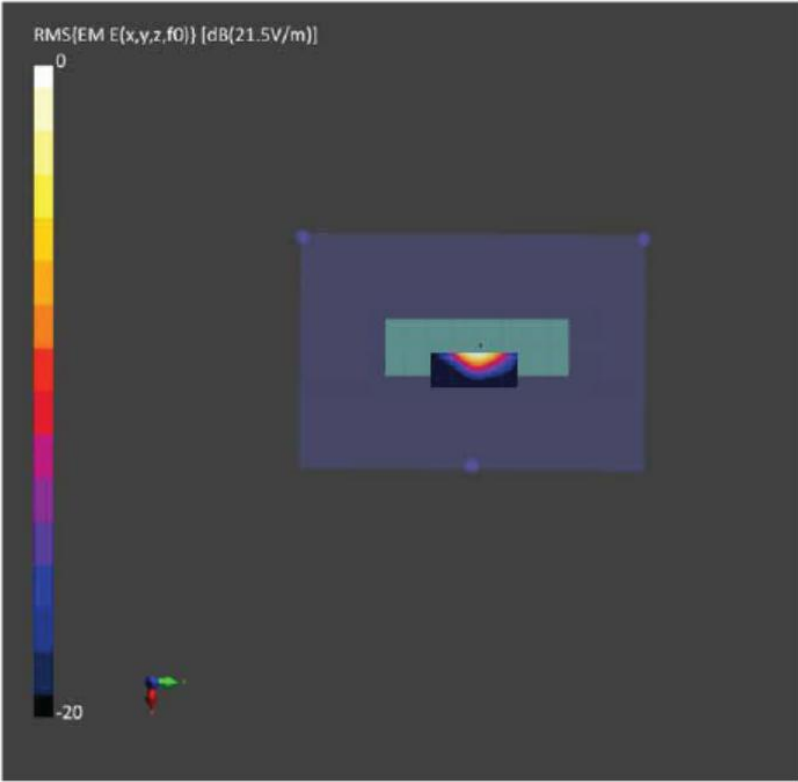
|                     | 5G Scan    |
|---------------------|------------|
| Grid Extents [mm]   | 25.0x 25.0 |
| Grid Steps [lambda] | 0.25x 0.25 |
| Sensor Surface [mm] | 5.0        |
| MAIA                | N/A        |

Measurement Results

|                                          | 5G Scan           |
|------------------------------------------|-------------------|
| Date                                     | 2021-04-22, 18:31 |
| Avg. Area [cm <sup>2</sup> ]             | 4.00              |
| pS <sub>tot</sub> avg[W/m <sup>2</sup> ] | 0.53              |
| pS <sub>n</sub> avg [W/m <sup>2</sup> ]  | 0.437             |
| E <sub>peak</sub> [V/m]                  | 21.5              |
| H <sub>peak</sub> [A/m]                  | 0.059             |
| Power Drift [dB]                         | -0.14             |

Details

5G Scan



Test Laboratory: Morlab Laboratory

5G NR n261\_50MHz\_16QAM\_Left Edge\_2mm\_Frequency 27.5GHz\_Antenna Module 1

| Name, Manufacturer | Dimensions [mm]    | IMEI | DUT Type |
|--------------------|--------------------|------|----------|
| Device             | 172.0 x 78.0 x10.0 |      | Phone    |

Exposure Conditions

| Phantom Section | Position, Test Distance [mm] | Band      | Frequency [MHz], Channel Number | Conversion Factor |
|-----------------|------------------------------|-----------|---------------------------------|-------------------|
| 5G Air          | RIGHT EDGE 2.0               | Band n261 | 27923.5                         | 1.0               |

Hardware Setup

| Phantom | Medium | Probe, Calibration Date               | DAE, Calibration Date  |
|---------|--------|---------------------------------------|------------------------|
| mmWave  | Air    | EUmmWV4 - SN9512_F1-78GHz, 2020-12-02 | DAE4 Sn1643,2020-11-30 |

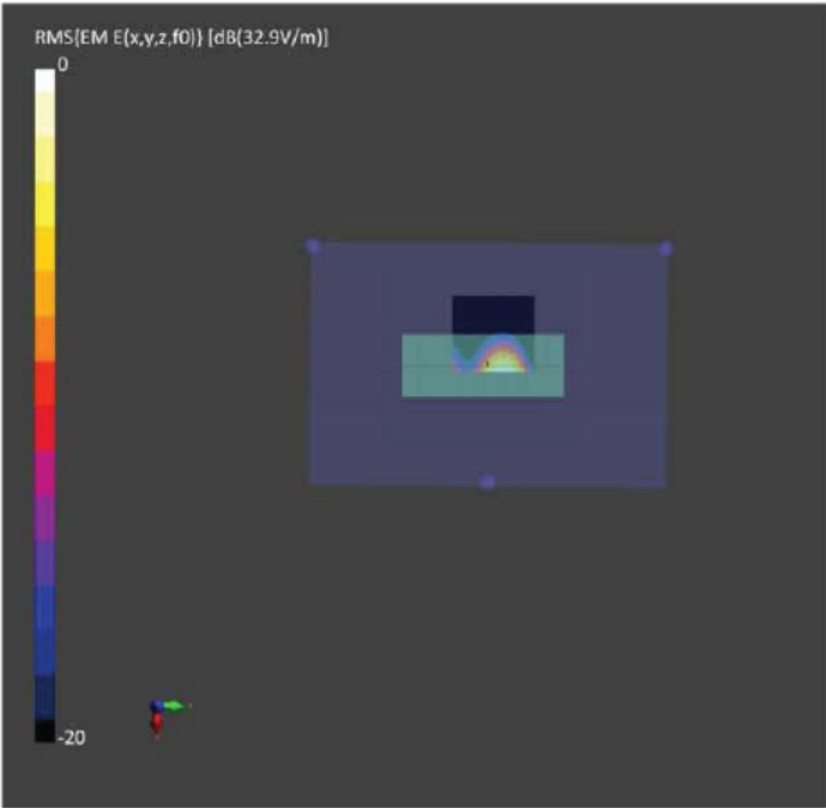
Scan Setup

|                     | 5G Scan    |
|---------------------|------------|
| Grid Extents [mm]   | 25.0x 25.0 |
| Grid Steps [lambda] | 0.25x 0.25 |
| Sensor Surface [mm] | 5.0        |
| MAIA                | N/A        |

Measurement Results

|                             | 5G Scan           |
|-----------------------------|-------------------|
| Date                        | 2021-04-22, 18:05 |
| Avg. Area [cm²]             | 4.00              |
| pS <sub>tot</sub> avg[W/m²] | 0.773             |
| pS <sub>n</sub> avg [W/m²]  | 0.627             |
| E <sub>peak</sub> [V/m]     | 32.9              |
| H <sub>peak</sub> [AV/m]    | 0.065             |
| Power Drift [dB]            | -0.11             |

| Details | 5G Scan |
|---------|---------|
|---------|---------|



Test Laboratory: Morlab Laboratory

5G NR n261\_50MHz\_16QAM\_Back Face\_2mm\_Frequency 27.9GHz\_Antenna Module 2

Device under Test Properties

| Name, Manufacturer | Dimensions [mm]    | IMEI | DUT Type |
|--------------------|--------------------|------|----------|
| Device             | 172.0 x 78.0 x10.0 |      | Phone    |

Exposure Conditions

| Phantom Section | Position, Test Distance [mm] | Band | Frequency [MHz], Channel Number | Conversion Factor |
|-----------------|------------------------------|------|---------------------------------|-------------------|
| 5G Air          | BACK 2.0                     | n261 | 27523.5,2077891                 | 1.0               |

Hardware Setup

| Phantom | Medium | Probe, Calibration Date               | DAE, Calibration Date  |
|---------|--------|---------------------------------------|------------------------|
| mmWave  | Air    | EUmmWV4 - SN9512_F1-78GHz, 2020-12-02 | DAE4 Sn1643,2020-11-30 |

Scan Setup

|                     | 5G Scan    |
|---------------------|------------|
| Grid Extents [mm]   | 25.0x 25.0 |
| Grid Steps [lambda] | 0.25x 0.25 |
| Sensor Surface [mm] | 5.0        |
| MAIA                | N/A        |

Measurement Results

|                                          | 5G Scan           |
|------------------------------------------|-------------------|
| Date                                     | 2021-04-22, 14:35 |
| Avg. Area [cm <sup>2</sup> ]             | 4.00              |
| pS <sub>tot</sub> avg[W/m <sup>2</sup> ] | 1.19              |
| pS <sub>n</sub> avg [W/m <sup>2</sup> ]  | 0.724             |
| E <sub>peak</sub> [V/m]                  | 46.2              |
| H <sub>peak</sub> [A/m]                  | 0.107             |
| Power Drift [dB]                         | -0.72-6.14-2.04   |

| Details | 5G Scan |
|---------|---------|
|---------|---------|

