20211013_SystemPerformanceCheck-D1900V2 SN 5d199

Frequency: 1900 MHz; Duty Cycle: 1:1; Room Ambient Temperature: 23.0°C; Liquid Temperature: 22.0°C Medium parameters used: f = 1900 MHz; σ = 1.439 S/m; ϵ_r = 39.362; ρ = 1000 kg/m³ DASY5 Configuration:

- Area Scan Setting: Find Secondary Maximum Within: 2.0 dB and with a peak SAR value greater than 0.012W/kg
- Averaged Fast SAR: Polynomial fit
- Electronics: DAE4 Sn1468; Calibrated: 9/27/2021
- Probe: EX3DV4 SN7645; ConvF(8.9, 8.9, 8.9) @ 1900 MHz; Calibrated: 4/15/2021
- Sensor-Surface: 1.4mm (Mechanical Surface Detection)
- Phantom: Twin-SAM V5.0 (Right); Type: QD 000 P40 CD; Serial: 1855

Head/1900 MHz, Pin=100 mW CW/Area Scan (7x7x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 6.95 W/kg

Head/1900 MHz, Pin=100 mW CW/Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm,

dy=8mm, dz=5mm Reference Value = 62.56 V/m; Power Drift = 0.11 dB Peak SAR (extrapolated) = 8.06 W/kg SAR(1 g) = 4.34 W/kg; SAR(10 g) = 2.27 W/kg Maximum value of SAR (measured) = 6.74 W/kg



0 dB = 6.74 W/kg = 8.29 dBW/kg

20211013_SystemPerformanceCheck-D1900V2 SN 5d199

Frequency: 1900 MHz; Duty Cycle: 1:1

Head/1900 MHz, Pin=100 mW CW/Z Scan (1x1x21): Measurement grid: dx=20mm, dy=20mm, dz=5mm Maximum value of SAR (measured) = 5.66 W/kg



20211015_SystemPerformanceCheck-D1750V2 SN 1125

Frequency: 1750 MHz; Duty Cycle: 1:1; Room Ambient Temperature: 23.0°C; Liquid Temperature: 22.0°C Medium parameters used: f = 1750 MHz; σ = 1.351 S/m; ϵ_r = 40.407; ρ = 1000 kg/m³ DASY5 Configuration:

- Area Scan Setting: Find Secondary Maximum Within: 2.0 dB and with a peak SAR value greater than 0.012W/kg
- Averaged Fast SAR: Polynomial fit
- Electronics: DAE4 Sn1468; Calibrated: 9/27/2021
- Probe: EX3DV4 SN7645; ConvF(9.3, 9.3, 9.3) @ 1750 MHz; Calibrated: 4/15/2021
- Sensor-Surface: 1.4mm (Mechanical Surface Detection)
- Phantom: Twin-SAM V5.0 (Right); Type: QD 000 P40 CD; Serial: 1855

Head/1750 MHz, Pin=100 mW/Area Scan (7x7x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 5.36 W/kg

Head/1750 MHz, Pin=100 mW/Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm,

dz=5mm

Reference Value = 58.29 V/m; Power Drift = -0.04 dB Peak SAR (extrapolated) = 6.20 W/kg SAR(1 g) = 3.41 W/kg; SAR(10 g) = 1.84 W/kg Maximum value of SAR (measured) = 5.24 W/kg



0 dB = 5.24 W/kg = 7.19 dBW/kg

20211015_SystemPerformanceCheck-D1750V2 SN 1125

Frequency: 1750 MHz; Duty Cycle: 1:1

Head/1750 MHz, Pin=100 mW/Z Scan (1x1x21): Measurement grid: dx=20mm, dy=20mm, dz=5mm Maximum value of SAR (measured) = 4.52 W/kg



20211018_SystemPerformanceCheck-D750V3 SN 1122

Frequency: 750 MHz; Duty Cycle: 1:1; Room Ambient Temperature: 23.0°C; Liquid Temperature: 22.0°C Medium parameters used: f = 750 MHz; σ = 0.902 S/m; ϵ_r = 40.245; ρ = 1000 kg/m³ DASY5 Configuration:

- Area Scan Setting: Find Secondary Maximum Within: 2.0 dB and with a peak SAR value greater than 0.012W/kg
- Averaged Fast SAR: Polynomial fit
- Electronics: DAE4 Sn1468; Calibrated: 9/27/2021
- Probe: EX3DV4 SN7645; ConvF(10.76, 10.76, 10.76) @ 750 MHz; Calibrated: 4/15/2021
- Sensor-Surface: 1.4mm (Mechanical Surface Detection)
- Phantom: Twin-SAM V5.0 (Right); Type: QD 000 P40 CD; Serial: 1855

Head/750 MHz, Pin=100 mW/Area Scan (6x17x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 1.03 W/kg

Head/750 MHz, Pin=100 mW/Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm,

dz=5mm

Reference Value = 34.45 V/m; Power Drift = -0.09 dB Peak SAR (extrapolated) = 1.35 W/kg SAR(1 g) = 0.899 W/kg; SAR(10 g) = 0.597 W/kg Maximum value of SAR (measured) = 1.21 W/kg



0 dB = 1.21 W/kg = 0.83 dBW/kg

20211018_SystemPerformanceCheck-D750V3 SN 1122

Frequency: 750 MHz; Duty Cycle: 1:1

Head/750 MHz, Pin=100 mW/Z Scan (1x1x21): Measurement grid: dx=20mm, dy=20mm, dz=5mm Maximum value of SAR (measured) = 1.01 W/kg



20211018_SystemPerformanceCheck-D835V2 SN 4d194

Frequency: 835 MHz; Duty Cycle: 1:1; Room Ambient Temperature: 23.0°C; Liquid Temperature: 22.0°C Medium parameters used: f = 835 MHz; σ = 0.904 S/m; ϵ_r = 40.944; ρ = 1000 kg/m³ DASY5 Configuration:

- Area Scan Setting: Find Secondary Maximum Within: 2.0 dB and with a peak SAR value greater than 0.012W/kg
- Averaged Fast SAR: Polynomial fit
- Electronics: DAE4 Sn1468; Calibrated: 9/27/2021
- Probe: EX3DV4 SN7645; ConvF(10.56, 10.56, 10.56) @ 835 MHz; Calibrated: 4/15/2021
- Sensor-Surface: 2.5mm (Mechanical Surface Detection)
- Phantom: Twin-SAM V5.0 (Right); Type: QD 000 P40 CD; Serial: 1855

Head/835 MHz, Pin=100 mW/Area Scan (7x13x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 1.23 W/kg

Head/835 MHz, Pin=100 mW/Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm,

dz=5mm

Reference Value = 37.39 V/m; Power Drift = 0.04 dB Peak SAR (extrapolated) = 1.52 W/kg SAR(1 g) = 1.04 W/kg; SAR(10 g) = 0.698 W/kg Maximum value of SAR (measured) = 1.26 W/kg



0 dB = 1.26 W/kg = 1.00 dBW/kg

20211018_SystemPerformanceCheck-D835V2 SN 4d194

Frequency: 835 MHz; Duty Cycle: 1:1

Head/835 MHz, Pin=100 mW/Z Scan (1x1x21): Measurement grid: dx=20mm, dy=20mm, dz=5mm Maximum value of SAR (measured) = 1.28 W/kg



Frequency: 2450 MHz; Duty Cycle: 1:1; Room Ambient Temperature: 23.0°C; Liquid Temperature: 22.0°C Medium parameters used: f = 2450 MHz; σ = 1.789 S/m; ϵ_r = 38.664; ρ = 1000 kg/m³ DASY5 Configuration:

- Area Scan Setting: Find Secondary Maximum Within: 2.0 dB and with a peak SAR value greater than 0.012W/kg
- Averaged Fast SAR: Polynomial fit
- Electronics: DAE4 Sn1468; Calibrated: 9/27/2021
- Probe: EX3DV4 SN7645; ConvF(8.26, 8.26, 8.26) @ 2450 MHz; Calibrated: 4/15/2021
- Sensor-Surface: 1.4mm (Mechanical Surface Detection)
- Phantom: Twin-SAM V5.0 (Right); Type: QD 000 P40 CD; Serial: 1855

Head/2450MHz, Pin=100mW/Area Scan (6x8x1): Measurement grid: dx=12mm, dy=12mm

Maximum value of SAR (measured) = 6.11 W/kg

Head/2450MHz, Pin=100mW/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm,

dz=5mm

Reference Value = 62.56 V/m; Power Drift = 0.00 dB Peak SAR (extrapolated) = 9.63 W/kg SAR(1 g) = 4.88 W/kg; SAR(10 g) = 2.3 W/kg Maximum value of SAR (measured) = 7.98 W/kg



0 dB = 7.98 W/kg = 9.02 dBW/kg

Frequency: 2450 MHz; Duty Cycle: 1:1

Head/2450MHz, Pin=100mW/Z Scan (1x1x21): Measurement grid: dx=20mm, dy=20mm, dz=5mm

Maximum value of SAR (measured) = 7.25 W/kg



Frequency: 2600 MHz; Duty Cycle: 1:1; Room Ambient Temperature: 23.0°C; Liquid Temperature: 22.0°C Medium parameters used: f = 2600 MHz; σ = 1.909 S/m; ϵ_r = 38.516; ρ = 1000 kg/m³ DASY5 Configuration:

- Area Scan Setting: Find Secondary Maximum Within: 2.0 dB and with a peak SAR value greater than 0.012W/kg
- Averaged Fast SAR: Polynomial fit
- Electronics: DAE4 Sn1468; Calibrated: 9/27/2021
- Probe: EX3DV4 SN7645; ConvF(8.11, 8.11, 8.11) @ 2600 MHz; Calibrated: 4/15/2021
- Sensor-Surface: 2.5mm (Mechanical Surface Detection)
- Phantom: Twin-SAM V5.0 (Right); Type: QD 000 P40 CD; Serial: 1855

Head/2600MHz, Area Scan (6x8x1): Measurement grid: dx=12mm, dy=12mm

Maximum value of SAR (measured) = 5.71 W/kg

Head/2600MHz, Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 62.68 V/m; Power Drift = 0.03 dB Peak SAR (extrapolated) = 10.8 W/kg SAR(1 g) = 5.19 W/kg; SAR(10 g) = 2.36 W/kg Maximum value of SAR (measured) = 7.40 W/kg



0 dB = 7.40 W/kg = 8.69 dBW/kg

Frequency: 2600 MHz; Duty Cycle: 1:1

Head/2600MHzc, Pin=100mW/Z Scan (1x1x21): Measurement grid: dx=20mm, dy=20mm, dz=5mm Maximum value of SAR (measured) = 7.89 W/kg



Frequency: 2450 MHz; Duty Cycle: 1:1; Room Ambient Temperature: 23.0°C; Liquid Temperature: 22.0°C Medium parameters used: f = 2450 MHz; σ = 1.793 S/m; ϵ_r = 40.362; ρ = 1000 kg/m³ DASY5 Configuration:

- Area Scan Setting: Find Secondary Maximum Within: 2.0 dB and with a peak SAR value greater than 0.012W/kg
- Averaged Fast SAR: Polynomial fit
- Electronics: DAE4 Sn1591; Calibrated: 3/26/2021
- Probe: EX3DV4 SN7330; ConvF(8.03, 8.03, 8.03) @ 2450 MHz; Calibrated: 9/29/2021
- Sensor-Surface: 1.4mm (Mechanical Surface Detection)
- Phantom: SAM Phantom CRP v5.0(Left); Type: QD000P40CD; Serial: TP:1991

Head/2450MHz, Pin=100mW/Area Scan (6x8x1): Measurement grid: dx=12mm, dy=12mm

Maximum value of SAR (measured) = 6.39 W/kg

Head/2450MHz, Pin=100mW/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm,

dz=5mm

Reference Value = 62.91 V/m; Power Drift = 0.00 dB Peak SAR (extrapolated) = 10.1 W/kg SAR(1 g) = 4.89 W/kg; SAR(10 g) = 2.26 W/kg Maximum value of SAR (measured) = 8.17 W/kg



0 dB = 8.17 W/kg = 9.12 dBW/kg

Frequency: 2450 MHz; Duty Cycle: 1:1

Head/2450MHz, Pin=100mW/Z Scan (1x1x21): Measurement grid: dx=20mm, dy=20mm, dz=5mm

Maximum value of SAR (measured) = 7.36 W/kg



20211027_SystemPerformanceCheck-D5GHzV2 SN 1209

Frequency: 5750 MHz; Duty Cycle: 1:1; Room Ambient Temperature: 23.0°C; Liquid Temperature: 22.0°C Medium parameters used: f = 5750 MHz; σ = 5.151 S/m; ϵ_r = 34.332; ρ = 1000 kg/m³ DASY5 Configuration:

- Area Scan Setting: Find Secondary Maximum Within: 2.0 dB and with a peak SAR value greater than 0.012W/kg
- Averaged Fast SAR: Polynomial fit
- Electronics: DAE4 Sn1494; Calibrated: 7/27/2021
- Probe: EX3DV4 SN7313; ConvF(4.79, 4.79, 4.79) @ 5750 MHz; Calibrated: 2/23/2021
- Sensor-Surface: 1.4mm (Mechanical Surface Detection)
- Phantom: Twin-SAM V5.0 (20deg probe tilt); Type: QD 000 P40 CD; Serial: 1751

Head/5.75 GHz, Pin=100mW/Area Scan (7x7x1): Measurement grid: dx=10mm, dy=10mm

Maximum value of SAR (measured) = 19.6 W/kg

Head/5.75 GHz, Pin=100mW/Zoom Scan (8x8x8)/Cube 0: Measurement grid: dx=4mm, dy=4mm,

dz=1.4mm

Reference Value = 68.35 V/m; Power Drift = 0.10 dB Peak SAR (extrapolated) = 38.1 W/kg SAR(1 g) = 8.61 W/kg; SAR(10 g) = 2.42 W/kg Maximum value of SAR (measured) = 21.3 W/kg



0 dB = 21.3 W/kg = 13.28 dBW/kg

20211027_SystemPerformanceCheck-D5GHzV2 SN 1209

Frequency: 5750 MHz; Duty Cycle: 1:1

Head/5.75 GHz, Pin=100mW/Z Scan (1x1x21): Measurement grid: dx=20mm, dy=20mm, dz=5mm Maximum value of SAR (measured) = 13.4 W/kg



Measurement Report for Device UID 0 - Channel 0 (2600.0MHz) Device under Test Properties

Model, Manufacturer		Dimensions [mm]	IM	El	DUT Type		
Device,		50.0 x 10.0 x 8.0					
Exposure Condit	ions						
Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat,				2600.0,	7.3	1.96	39.1
HSL			0	0			
Hardware Setup							

Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) -	HBBL-600-10000, 2021-Oct-28	EX3DV4 - SN7545, 2021-08-26	DAE4 Sn1668, 2021-04-08
2044			

Scan Setup

Scan Setup			Measurement Results		
-	Area Scan	Zoom Scan		Area Scan	Zoom Scan
Grid Extents [mm]	40.0 x 80.0	30.0 x 30.0 x 30.0	Date	2021-10-28	2021-10-28
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 1.5	psSAR1g [W/kg]	5.47	5.43
Sensor Surface [mm]	3.0	1.4	psSAR10g [W/kg]	2.47	2.44
Graded Grid			Power Drift [dB]	-0.07	-0.05
Grading Ratio			Power Scaling		
MAIA			Scaling Factor [dB]		
Surface Detection			TSL Correction		
Scan Method			M2/M1 [%] Dist 3dB Peak [mm]		

Warning(s) / Error(s) Area Scan

Details Warning(s) Error(s)



Zoom Scan



Measurement Report for Device UID 0 - Channel 0 (1900.0MHz) Device under Test Properties

Model, Manufacturer		Dimensions [mm]	I	MEI	DUT Type		
Device,		50.0 x 10.0 x 8.0					
Exposure Condit	tions						
Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat,				1900.0,	8.12	1.44	38.1
HSL			0	0			
Hardware Setup		TSI Measured Date	a	Probe Calibration	Date	DAF Calibration	Date

Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) -	HBBL-600-10000, 2021-Oct-18	EX3DV4 - SN7545, 2021-08-26	DAE4 Sn1668, 2021-04-08
2044			

Scan Setup

	Area Scan	Zoom Scan		Area Scan	Zoom Scan
Grid Extents [mm]	40.0 x 80.0	30.0 x 30.0 x 30.0	Date	2021-10-18	2021-10-18
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 1.5	psSAR1g [W/kg]	3.84	3.83
Sensor Surface [mm]	3.0	1.4	psSAR10g [W/kg]	1.99	1.97
Graded Grid			Power Drift [dB]	-0.00	-0.01
Grading Ratio			Power Scaling		
MAIA			Scaling Factor [dB]		
Surface Detection			TSL Correction		
Scan Method			M2/M1 [%]		
			Dist 3dB Peak [mm]		

Warning(s) / Error(s) Details Area Scan

Details Warning(s) Error(s) Zoom Scan

Measurement Results



