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Accreditation No.: SCS 0108

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Client

Sporton (Auden)

Accredited by the Swiss Accreditation Service (SAS)

Certificate No: CD2450V3-1186 Jan18

CALIBRATION CERTIFICATE

Object

CD2450V3 - SN: 1186

Calibration procedure(s)

QA CAL-20.v6

Calibration procedure for dipoles in air

Calibration date:

Primary Standards

January 09, 2018

This calibration certificate documents the traceability to national standards, which realize the physical units of measurements (SI). The measurements and the uncertainties with confidence probability are given on the following pages and are part of the certificate.

All calibrations have been conducted in the closed laboratory facility: environment temperature (22 ± 3)°C and humidity < 70%.

Calibration Equipment used (M&TE critical for calibration)

Power meter NRP	SN: 104778	04-Apr-17 (No. 217-02521/02522)	Apr-18
Power sensor NRP-Z91	SN: 103244	04-Apr-17 (No. 217-02521)	Apr-18
Power sensor NRP-Z91	SN: 103245	04-Apr-17 (No. 217-02522)	Apr-18
Reference 20 dB Attenuator	SN: 5058 (20k)	07-Apr-17 (No. 217-02528)	Apr-18
Type-N mismatch combination	SN: 5047.2 / 06327	07-Apr-17 (No. 217-02529)	Apr-18
Probe EF3DV3	SN: 4013	14-Jun-17 (No. EF3-4013_Jun17)	Jun-18
DAE4	SN: 781	13-Jul-17 (No. DAE4-781_Jul17)	Jul-18
Secondary Standards	ID#	Check Date (in house)	Scheduled Check
Power meter Agilent 4419B	SN: GB42420191	09-Oct-09 (in house check Oct-17)	In house check: Oct-20
Power sensor HP E4412A	SN: US38485102	05-Jan-10 (in house check Oct-17)	In house check: Oct-20
Power sensor HP 8482A	SN: US37295597	09-Oct-09 (in house check Oct-17)	In house check: Oct-20
RF generator R&S SMT-06	SN: 832283/011	27-Aug-12 (in house check Oct-17)	In house check: Oct-20
Network Analyzer HP 8753E	SN: US37390585	18-Oct-01 (in house check Oct-17)	In house check: Oct-18
	Name	Function	Signature
Calibrated by:	Leif Klysner	Laboratory Technician	Seef Megen
Approved by:	Katja Pokovic	Technical Manager	Me MC

Cal Date (Certificate No.)

Issued: January 10, 2018

Scheduled Calibration

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References

[1] ANSI-C63.19-2011
American National Standard, Methods of Measurement of Compatibility between Wireless Communications
Devices and Hearing Aids.

Methods Applied and Interpretation of Parameters:

- Coordinate System: y-axis is in the direction of the dipole arms. z-axis is from the basis of the antenna
 (mounted on the table) towards its feed point between the two dipole arms. x-axis is normal to the other axes.
 In coincidence with the standards [1], the measurement planes (probe sensor center) are selected to be at a
 distance of 15 mm above the top metal edge of the dipole arms.
- Measurement Conditions: Further details are available from the hardcopies at the end of the certificate. All
 figures stated in the certificate are valid at the frequency indicated. The forward power to the dipole connector
 is set with a calibrated power meter connected and monitored with an auxiliary power meter connected to a
 directional coupler. While the dipole under test is connected, the forward power is adjusted to the same level.
- Antenna Positioning: The dipole is mounted on a HAC Test Arch phantom using the matching dipole positioner with the arms horizontal and the feeding cable coming from the floor. The measurements are performed in a shielded room with absorbers around the setup to reduce the reflections. It is verified before the mounting of the dipole under the Test Arch phantom, that its arms are perfectly in a line. It is installed on the HAC dipole positioner with its arms parallel below the dielectric reference wire and able to move elastically in vertical direction without changing its relative position to the top center of the Test Arch phantom. The vertical distance to the probe is adjusted after dipole mounting with a DASY5 Surface Check job. Before the measurement, the distance between phantom surface and probe tip is verified. The proper measurement distance is selected by choosing the matching section of the HAC Test Arch phantom with the proper device reference point (upper surface of the dipole) and the matching grid reference point (tip of the probe) considering the probe sensor offset. The vertical distance to the probe is essential for the accuracy.
- Feed Point Impedance and Return Loss: These parameters are measured using a HP 8753E Vector Network Analyzer. The impedance is specified at the SMA connector of the dipole. The influence of reflections was eliminating by applying the averaging function while moving the dipole in the air, at least 70cm away from any obstacles.
- E-field distribution: E field is measured in the x-y-plane with an isotropic ER3D-field probe with 100 mW forward power to the antenna feed point. In accordance with [1], the scan area is 20mm wide, its length exceeds the dipole arm length (180 or 90mm). The sensor center is 15 mm (in z) above the metal top of the dipole arms. Two 3D maxima are available near the end of the dipole arms. Assuming the dipole arms are perfectly in one line, the average of these two maxima (in subgrid 2 and subgrid 8) is determined to compensate for any non-parallelity to the measurement plane as well as the sensor displacement. The E-field value stated as calibration value represents the maximum of the interpolated 3D-E-field, in the plane above the dipole surface.

The reported uncertainty of measurement is stated as the standard uncertainty of measurement multiplied by the coverage factor k=2, which for a normal distribution corresponds to a coverage probability of approximately 95%.

Measurement Conditions

DASY system configuration, as far as not given on page 1.

DASY Version	DASY5	V52.10.0
Phantom	HAC Test Arch	
Distance Dipole Top - Probe Center	15.mm	
Scan resolution	dx, $dy = 5 mm$	
Frequency	2450 MHz ± 1 MHz	
Input power drift	< 0.05 dB	

Maximum Field values at 2450 MHz

E-field 15 mm above dipole surface	condition	Interpolated maximum	
Maximum measured above high end	100 mW input power	87.8 V/m = 38.86 dBV/m	
Maximum measured above low end	100 mW input power	86.8 V/m = 38.77 dBV/m	
Averaged maximum above arm	100 mW input power	87.3 V/m ± 12.8 % (k=2)	

Appendix (Additional assessments outside the scope of SCS 0108)

Antenna Parameters

Frequency	Return Loss	Impedance	
2250 MHz	16.3 dB	$65.7 \Omega + 8.2 j\Omega$	
2350 MHz	26.1 dB	54.2 Ω - 3.0 jΩ	
2450 MHz	31.6 dB	52.4 Ω - 1.3 jΩ	
2550 MHz	39.2 dB	$50.9 \Omega + 0.7 j\Omega$	
2650 MHz	16.6 dB	67.1 Ω - 3.0 jΩ	

3.2 Antenna Design and Handling

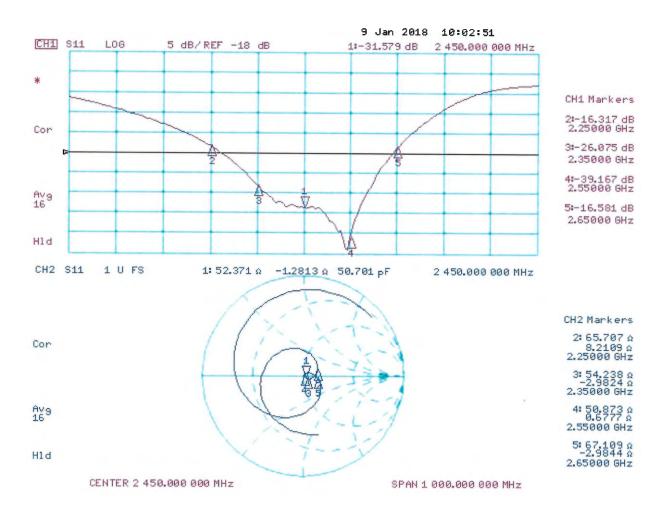
The calibration dipole has a symmetric geometry with a built-in two stub matching network, which leads to the enhanced bandwidth.

The dipole is built of standard semirigid coaxial cable. The internal matching line is open ended. The antenna is therefore open for DC signals.

Do not apply force to dipole arms, as they are liable to bend. The soldered connections near the feedpoint may be damaged. After excessive mechanical stress or overheating, check the impedance characteristics to ensure that the internal matching network is not affected.

After long term use with 40W radiated power, only a slight warming of the dipole near the feedpoint can be measured.

Impedance Measurement Plot



DASY5 E-field Result

Date: 09.01.2018

Test Laboratory: SPEAG Lab2

DUT: HAC Dipole 2450 MHz; Type: CD2450V3; Serial: CD2450V3 - SN: 1186

Communication System: UID 0 - CW ; Frequency: 2450 MHz Medium parameters used: $\sigma=0$ S/m, $\epsilon_r=1$; $\rho=1000~kg/m^3$

Phantom section: RF Section

Measurement Standard: DASY5 (IEEE/IEC/ANSI C63.19-2011)

DASY52 Configuration:

Probe: EF3DV3 - SN4013; ConvF(1, 1, 1); Calibrated: 14.06.2017;

Sensor-Surface: (Fix Surface)

Electronics: DAE4 Sn781; Calibrated: 13.07.2017

Phantom: HAC Test Arch with AMCC; Type: SD HAC P01 BA; Serial: 1070

DASY52 52.10.0(1446); SEMCAD X 14.6.10(7417)

Dipole E-Field measurement @ 2450MHz/E-Scan - 2450MHz d=15mm/Hearing Aid Compatibility Test (41x181x1):

Interpolated grid: dx=0.5000 mm, dy=0.5000 mm

Device Reference Point: 0, 0, -6.3 mm

Reference Value = 77.23 V/m; Power Drift = -0.02 dB

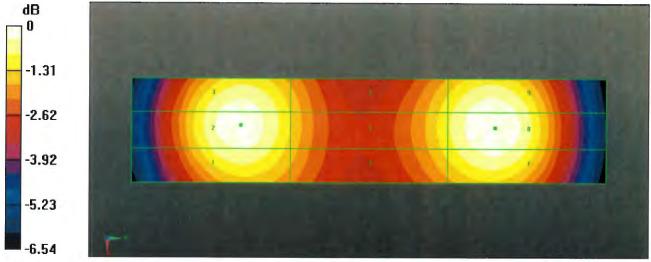
Applied MIF = 0.00 dB

RF audio interference level = 38.86 dBV/m

Emission category: M2

MIF scaled E-field

	Grid 2 M2 38.77 dBV/m	
Grid 4 M2	Grid 5 M2	Grid 6 M2
	37.94 dBV/m Grid 8 M2	
38.6 dBV/m	38.86 dBV/m	38.76 dBV/m



0 dB = 87.75 V/m = 38.86 dBV/m





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Client

Sporton (Auden)

Accreditation No.: SCS 0108

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Certificate No: DAE4-853 Jul17

CALIBRATION CERTIFICATE

Object DAE4 - SD 000 D04 BM - SN: 853

Calibration procedure(s) QA CAL-06.v29

Calibration procedure for the data acquisition electronics (DAE)

Calibration date: July 19, 2017

This calibration certificate documents the traceability to national standards, which realize the physical units of measurements (SI). The measurements and the uncertainties with confidence probability are given on the following pages and are part of the certificate.

All calibrations have been conducted in the closed laboratory facility: environment temperature (22 ± 3)°C and humidity < 70%.

Calibration Equipment used (M&TE critical for calibration)

Primary Standards	ID#	Cal Date (Certificate No.)	Scheduled Calibration
Keithley Multimeter Type 2001	SN: 0810278	09-Sep-16 (No:19065)	Sep-17
Secondary Standards	ID#	Check Date (in house)	Scheduled Check
Auto DAE Calibration Unit	SE UWS 053 AA 1001	05-Jan-17 (in house check)	In house check: Jan-18
Calibrator Box V2.1	SE LIMS 006 AA 1000	05-Jan-17 (in house check)	In house check: Jan-18

Name

Function

Calibrated by:

Eric Hainfeld

Laboratory Technician

Signature

Approved by:

Sven Kühn

Deputy Manager

Issued: July 19, 2017

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Certificate No: DAE4-853_Jul17

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Accreditation No.: SCS 0108

Glossary

DAE data acquisition electronics

Connector angle information used in DASY system to align probe sensor X to the robot

coordinate system.

Methods Applied and Interpretation of Parameters

- DC Voltage Measurement: Calibration Factor assessed for use in DASY system by comparison with a calibrated instrument traceable to national standards. The figure given corresponds to the full scale range of the voltmeter in the respective range.
- Connector angle: The angle of the connector is assessed measuring the angle mechanically by a tool inserted. Uncertainty is not required.
- The following parameters as documented in the Appendix contain technical information as a result from the performance test and require no uncertainty.
 - DC Voltage Measurement Linearity: Verification of the Linearity at +10% and -10% of the nominal calibration voltage. Influence of offset voltage is included in this measurement.
 - Common mode sensitivity: Influence of a positive or negative common mode voltage on the differential measurement.
 - Channel separation: Influence of a voltage on the neighbor channels not subject to an input voltage.
 - AD Converter Values with inputs shorted: Values on the internal AD converter corresponding to zero input voltage
 - Input Offset Measurement: Output voltage and statistical results over a large number of zero voltage measurements.
 - Input Offset Current: Typical value for information; Maximum channel input offset current, not considering the input resistance.
 - Input resistance: Typical value for information: DAE input resistance at the connector, during internal auto-zeroing and during measurement.
 - Low Battery Alarm Voltage: Typical value for information. Below this voltage, a battery alarm signal is generated.
 - Power consumption: Typical value for information. Supply currents in various operating modes.

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DC Voltage Measurement

A/D - Converter Resolution nominal

High Range:

1LSB =

6.1μV ,

full range = -100...+300 mV full range = -1.....+3mV

Low Range:

1LSB =

61nV,

DASY measurement parameters: Auto Zero Time: 3 sec; Measuring time: 3 sec

Calibration Factors	X	Υ	Z
High Range	402.602 ± 0.02% (k=2)	403.267 ± 0.02% (k=2)	403.445 ± 0.02% (k=2)
Low Range	3.95476 ± 1.50% (k=2)	3.96544 ± 1.50% (k=2)	3.96662 ± 1.50% (k=2)

Connector Angle

Connector Angle to be used in DASY system	134.5 ° ± 1 °

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Appendix (Additional assessments outside the scope of SCS0108)

1. DC Voltage Linearity

High Range		Reading (μV)	Difference (μV)	Error (%)
Channel X	+ Input	200032.34	-1.72	-0.00
Channel X	+ Input	20007.23	2.14	0.01
Channel X	- Input	-20002.92	1.88	-0.01
Channel Y	+ Input	200032,83	-1.31	-0,00
Channel Y	+ Input	20004.73	-0.35	-0.00
Channel Y	- Input	-20006,55	-1.74	0.01
Channel Z	+ Input	200040.33	6.37	0,00
Channel Z	+ Input	20004.71	-0.33	-0.00
Channel Z	- Input	-20008.02	-3.12	0.02

Low Range		Reading (μV)	Difference (μV)	Error (%)
Channel X	+ Input	2001.66	0.35	0.02
Channel X	+ Input	201.67	0.28	0.14
Channel X	- Input	-198.01	0.61	-0.31
Channel Y	+ Input	2001.27	0.05	0.00
Channel Y	+ Input	200.65	-0.72	-0.36
Channel Y	- Input	-199.27	-0.58	0.29
Channel Z	+ Input	2000.81	-0.40	-0.02
Channel Z	+ input	199.74	-1.51	-0.75
Channel Z	- Input	-200.02	-1.26	0.63

2. Common mode sensitivity

DASY measurement parameters: Auto Zero Time: 3 sec; Measuring time: 3 sec

	Common mode Input Voltage (mV)	High Range Average Reading (μV)	Low Range Average Reading (μV)
Channel X	200	-6.81	-8.25
	- 200	10.16	8.50
Channel Y	200	4.33	4.41
	- 200	-5.81	-6.18
Channel Z	200	2.40	2.38
	- 200	-4.45	-4.60

3. Channel separation

DASY measurement parameters: Auto Zero Time: 3 sec; Measuring time: 3 sec

	Input Voltage (mV)	Channel X (μV)	Channel Y (μV)	Channel Z (μV)
Channel X	200	-	1.24	-2.01
Channel Y	200	7.20	-	2.53
Channel Z	200	10.31	4.71	-

4. AD-Converter Values with inputs shorted

DASY measurement parameters: Auto Zero Time: 3 sec; Measuring time: 3 sec

	High Range (LSB)	Low Range (LSB)	
Channel X	16247	16895	
Channel Y	16088	16351	
Channel Z	16248	17044	

5. Input Offset Measurement

DASY measurement parameters: Auto Zero Time: 3 sec; Measuring time: 3 sec

Input 10MΩ

	Average (μV)	min. Offset (μV)	max. Offset (μV)	Std. Deviation (μV)
Channel X	-0.70	-1.52	0.31	0.39
Channel Y	-0.77	-1.78	0.39	0.37
Channel Z	0.22	-1.06	1.36	0.47

6. Input Offset Current

Nominal Input circuitry offset current on all channels: <25fA

7. Input Resistance (Typical values for information)

	Zeroing (kOhm)	Measuring (MOhm) 200 200	
Channel X	200		
Channel Y	200		
Channel Z	200	200	

8. Low Battery Alarm Voltage (Typical values for information)

Typical values	Alarm Level (VDC)	
Supply (+ Vcc)	+7.9	
Supply (- Vcc)	-7.6	

9. Power Consumption (Typical values for information)

Typical values	Switched off (mA)	Stand by (mA)	Transmitting (mA)	
Supply (+ Vcc)	+0.01	+6	+14	
Supply (- Vcc)	-0.01	-8	- 9	

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Sporton (Auden)

Certificate No: EF3-4047_Jan18

CALIBRATION CERTIFICATE

Object EF3DV3 - SN:4047

Calibration procedure(s) QA CAL-02.v8, QA CAL-25.v6

Calibration procedure for E-field probes optimized for close near field

evaluations in air

Calibration date: January 8, 2018

This calibration certificate documents the traceability to national standards, which realize the physical units of measurements (SI). The measurements and the uncertainties with confidence probability are given on the following pages and are part of the certificate.

All calibrations have been conducted in the closed laboratory facility: environment temperature (22 ± 3)°C and humidity < 70%.

Calibration Equipment used (M&TE critical for calibration)

Primary Standards	ID	Cal Date (Certificate No.)	Scheduled Calibration
Power meter NRP	SN: 104778	04-Apr-17 (No. 217-02521/02522)	Apr-18
Power sensor NRP-Z91	SN: 103244	04-Apr-17 (No. 217-02521)	Apr-18
Power sensor NRP-Z91	SN: 103245	04-Apr-17 (No. 217-02525)	Apr-18
Reference 20 dB Attenuator	SN: S5277 (20x)	07-Apr-17 (No. 217-02528)	Apr-18
Reference Probe ER3DV6	SN: 2328	10-Oct-17 (No. ER3-2328_Oct17)	Oct-18
DAE4	SN: 789	2-Aug-17 (No. DAE4-789_Aug17)	Aug-18
Secondary Standards	ID	Check Date (in house)	Scheduled Check
Power meter E4419B	SN: GB41293874	06-Apr-16 (in house check Jun-16)	In house check: Jun-18
Power sensor E4412A	SN: MY41498087	06-Apr-16 (in house check Jun-16)	In house check: Jun-18
Power sensor E4412A	SN: 000110210	06-Apr-16 (in house check Jun-16)	In house check: Jun-18
RF generator HP 8648C	SN: US3642U01700	04-Aug-99 (in house check Jun-16)	In house check: Jun-18
Network Analyzer HP 8753E	SN: US37390585	18-Oct-01 (in house check Oct-17)	In house check: Oct-18

Name Function Signature

Michael Weber Laboratory Technician

Approved by: Katja Pokovic Technical Manager

Issued: January 9, 2018

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Glossary:

NORMx,y,z sensitivity in free space DCP diode compression point

CF crest factor (1/duty_cycle) of the RF signal modulation dependent linearization parameters

Polarization ϕ ϕ rotation around probe axis

Polarization 9 9 rotation around an axis that is in the plane normal to probe axis (at measurement center),

i.e., 9 = 0 is normal to probe axis

Connector Angle information used in DASY system to align probe sensor X to the robot coordinate system

Calibration is Performed According to the Following Standards:

a) IEEE Std 1309-2005, "IEEE Standard for calibration of electromagnetic field sensors and probes, excluding antennas, from 9 kHz to 40 GHz", December 2005

b) CTIA Test Plan for Hearing Aid Compatibility, Rev 3.0, November 2013

Methods Applied and Interpretation of Parameters:

- NORMx,y,z: Assessed for E-field polarization 9 = 0 for XY sensors and 9 = 90 for Z sensor (f ≤ 900 MHz in TEM-cell; f > 1800 MHz: R22 waveguide).
- NORM(f)x,y,z = NORMx,y,z * frequency_response (see Frequency Response Chart).
- DCPx,y,z: DCP are numerical linearization parameters assessed based on the data of power sweep with CW signal (no uncertainty required). DCP does not depend on frequency nor media.
- PAR: PAR is the Peak to Average Ratio that is not calibrated but determined based on the signal characteristics
- Ax,y,z; Bx,y,z; Cx,y,z; Dx,y,z; VRx,y,z: A, B, C, D are numerical linearization parameters assessed based on the data of power sweep for specific modulation signal. The parameters do not depend on frequency nor media. VR is the maximum calibration range expressed in RMS voltage across the diode.
- Spherical isotropy (3D deviation from isotropy): in a locally homogeneous field realized using an open waveguide setup.
- Sensor Offset: The sensor offset corresponds to the offset of virtual measurement center from the probe tip (on probe axis). No tolerance required.
- Connector Angle: The angle is assessed using the information gained by determining the NORMx (no uncertainty required).

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Probe EF3DV3

SN:4047

Manufactured:

May 24, 2016

Calibrated:

January 8, 2018

Calibrated for DASY/EASY Systems

(Note: non-compatible with DASY2 system!)

January 8, 2018 EF3DV3 -- SN:4047

DASY/EASY - Parameters of Probe: EF3DV3 - SN:4047

Basic Calibration Parameters

	Sensor X	Sensor Y	Sensor Z	Unc (k=2)
Norm $(\mu V/(V/m)^2)$	0.80	0.65	1,27	± 10.1 %
DCP (mV) ⁸	96.8	99.5	95.6	

Modulation Calibration Parameters

alu	Communication System Name		A dB	B dB√μV	C.	D dB	VR mV	Unc ^b (k=2)
0	cw	X	0.0	0.0	1.0	0.00	137.5	±3.3 %
	Warrens and American State of the State of t	Υ	0.0	0.0	1.0		158.8	
	AMAPAN TO	Z	0.0	0.0	1.0		169.9	
10061- CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 11 Mbps)	Х	3.63	73.1	21.5	3.60	131.3	±0.7 %
		Υ	4.00	74.4	22.0		111.4	
		Z.	3:15	70.4	20.4		118.6	
l l	IEEE 802.11a/h WiFi 5 GHz (OFDM, 54 Mbps)	X	11.46	71.0	24.8	10.56	138.5	±3.0 %
0, (0		Y	10.98	69.5	23.7		113.8	
		Ζ	10.80	69.4	23.8		119.7	
10077- CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 54 Mbps)	Х	10.23	69.8	24.7	11.00	115.0	±3.3 %
<u> </u>	(5555)	Y	10.74	71.4	25.5		134.0	
		Z	10.32	70.6	25.3		138.6	

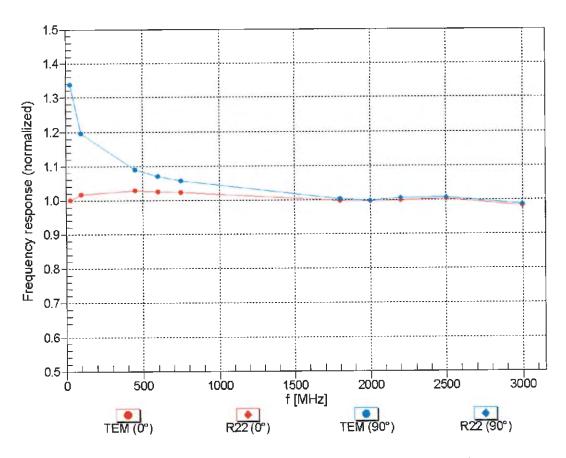
The reported uncertainty of measurement is stated as the standard uncertainty of measurement multiplied by the coverage factor k=2, which for a normal distribution corresponds to a coverage probability of approximately 95%.

^B Numerical linearization parameter: uncertainty not required.

E Uncertainty is determined using the max, deviation from linear response applying rectangular distribution and is expressed for the square of the

January 8, 2018 EF3DV3 - SN:4047

Frequency Response of E-Field (TEM-Cell:ifi110 EXX, Waveguide: R22)



Uncertainty of Frequency Response of E-field: ± 6.3% (k=2)

EF3DV3 – SN:4047 January 8, 2018

Receiving Pattern (ϕ), $\vartheta = 0^{\circ}$

f=600 MHz,TEM,0° f=1800 MHz,R22,0°

135

45

135

46

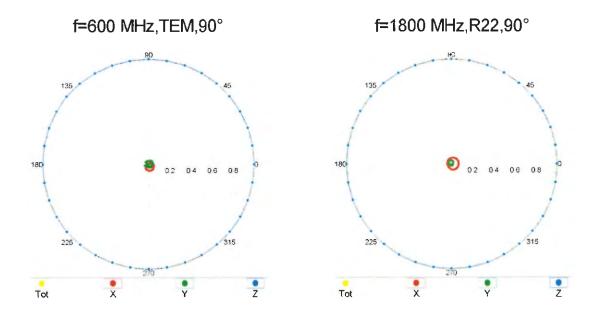
125

315

225

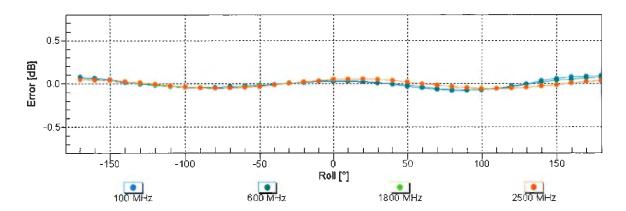
Tot X Y Z Tot X Y Z

Receiving Pattern (ϕ), $\vartheta = 90^{\circ}$



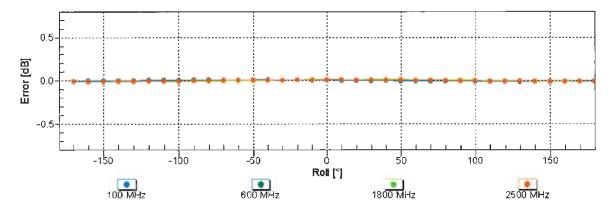
EF3DV3 – SN:4047 January 8, 2018

Receiving Pattern (ϕ), $\vartheta = 0^{\circ}$



Uncertainty of Axial Isotropy Assessment: ± 0.5% (k=2)

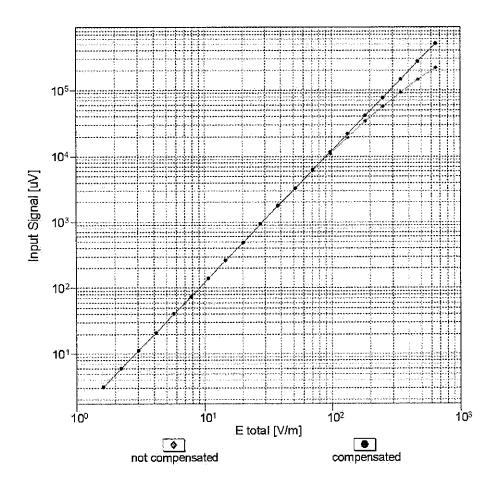
Receiving Pattern (ϕ), $\vartheta = 90^{\circ}$

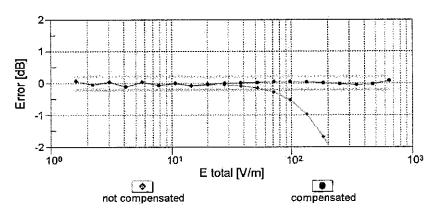


Uncertainty of Axial Isotropy Assessment: ± 0.5% (k=2)

January 8, 2018 EF3DV3 - SN:4047

Dynamic Range f(E-field) (TEM cell , f = 900 MHz)



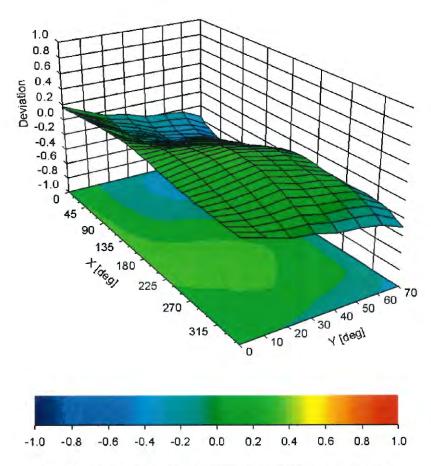


Uncertainty of Linearity Assessment: ± 0.6% (k=2)

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Deviation from Isotropy in Air

Error (ϕ, ϑ) , f = 900 MHz



Uncertainty of Spherical Isotropy Assessment: ± 2.6% (k=2)

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DASY/EASY - Parameters of Probe: EF3DV3 - SN:4047

Other Probe Parameters

Sensor Arrangement	Rectangular
Connector Angle (°)	-30.2
Mechanical Surface Detection Mode	enabled
Optical Surface Detection Mode	disabled
Probe Overall Length	337 mm
Probe Body Diameter	12 mm
Tip Length	25 mm
Tip Diameter	4 mm
Probe Tip to Sensor X Calibration Point	1.5 mm
Probe Tip to Sensor Y Calibration Point	1.5 mm
Probe Tip to Sensor Z Calibration Point	1.5 mm

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Appendix (Additional assessments outside the scope of SCS 0108)

Calibration Parameters for 3-4 GHz

	Sensor X	Sensor Y	Sensor Z	Unc (k=2)
Norm $(\mu V/(V/m)^2)^X$	0.92	0.75	1.40	± 10.1 %
DCP (mV) ^B	96.8	99.5	95.6	

Calibration Parameters for 5-6 GHz

	Sensor X	Sensor Y	Sensor Z	Unc (k=2)
Norm (μV/(V/m) ²) ^X	1.10	0.88	1.66	± 10.1 %
DCP (mV) ^B	96.8	99.5	95.6	

The reported uncertainty of measurement is stated as the standard uncertainty of measurement multiplied by the coverage factor k=2, which for a normal distribution corresponds to a coverage probability of approximately 95%.

⁸ Numerical linearization parameter: uncertainty not required. ^x Calibration procedure for frequencies above 3 GHz is pending accreditation.