

Appendix B: System Checks and Tissues

B.1. System Check

Prior to SAR assessment, the system is verified to $\pm 10\%$ of the SAR measurement on the reference dipole at the time of calibration by the calibration facility. Full system validation status and result summary can be found in SAR System Validation Appendix.

Table 1 System Check Results

Test Date	Ambient Temp. (degC)	Liquid Temp. (degC)	Probe SN	Freq. (MHz)	Tissue Type	Dipole SN	Input Power (dBm)	Measured SAR (10g) (W/kg)	Normalized SAR (10g) (W/kg)	Target SAR (10g) (W/kg)	Deviation (10g)
1/24/24	22.1	20.1	7853	2450	Head	1112	17	1.20	23.94	24.4	-1.9%

B.2. Dielectric Parameters of the TSL

Table 2 SAR Tissue Dielectric Parameters

Date	Tissue Type	Liquid Temp (°C)	Frequency (MHz)	Conductivity measured (σ)	Conductivity Target (σ)	Deviation	Permittivity measured (ϵ_r)	Permittivity Target (ϵ_r)	Deviation
1/24/24	Head	20.1	2400	1.84	1.76	4.6%	40.0	39.3	1.9%
1/24/24	Head	20.1	2450	1.88	1.80	4.2%	39.9	39.2	1.8%
1/24/24	Head	20.1	2480	1.90	1.83	3.7%	39.9	39.2	1.8%

The above measured tissue parameters were used in the DASY software. The DASY software was used to perform interpolation to determine the dielectric parameters at the SAR test device frequencies (per KDB Publication 865664 D01v01r04 and IEEE 1528-2013 6.6.1.2). The tissue parameters listed in the SAR test plots may slightly differ from the table above due to significant digit rounding in the software.

The SAR values were compensated for deviations between the measured and required tissue dielectric properties, as described in IEEE 1528-2013. The SAR values were applied to only scale up the measured SAR values, and not downward, per KDB Publication 865664 D01v04r04.

B.3. Sample TSL Compositions

TSL recipes are proprietary to SPEAG. Since the composition is approximate to the actual liquids utilized, the manufacturer data sheets are provided below.

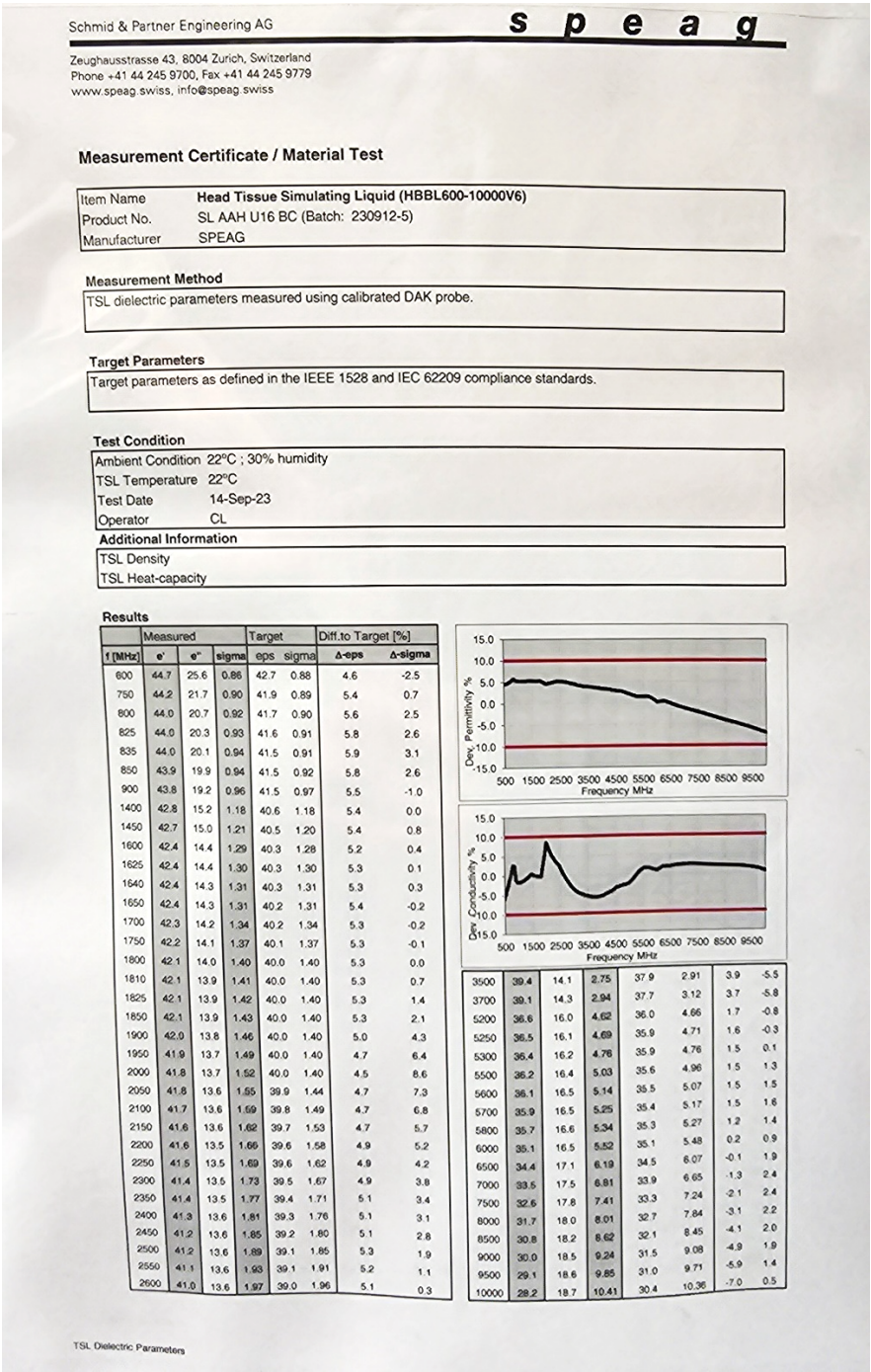


Figure 1 - Head TSL Calibration Certificate Example