



America

Certification Exhibit

FCC ID: TMAELK-6052

FCC Rule Part: 47 CFR Part 2.1091

TÜV SÜD Project Number: 72144707

Manufacturer: ELK Products, Inc.
Model: ELK-6052 and ELK-6053

RF Exposure

General Information:

Applicant: ELK Products, Inc.
Device Category: Mobile
Environment: General Population/Uncontrolled Exposure

Technical Information:

Antenna Type: 22 AWG 6.9 cm Wire
Antenna Gain: 0 dBi
Maximum Transmitter Conducted Power: 18.54 dBm, 71.45 mW
Maximum System EIRP: 18.54 dBm, 71.45 mW
Exposure Conditions: 20 centimeters or greater

MPE Calculation

The Power Density (mW/cm²) is calculated as follows:

$$S = \frac{PG}{4\pi R^2}$$

Where:

- S = power density (in appropriate units, e.g. mW/cm²)
- P = power input to the antenna (in appropriate units, e.g., mW)
- G = power gain of the antenna in the direction of interest relative to an isotropic radiator
- R = distance to the center of radiation of the antenna (appropriate units, e.g., cm)

Table 1: MPE Calculation

Transmit Frequency (MHz)	Radio Power (dBm)	Power Density Limit (mW/Cm ²)	Radio Power (mW)	Antenna Gain (dBi)	Antenna Gain (mW eq.)	Distance (cm)	Power Density (mW/cm ²)
902.989	18.54	0.60	71.45	0	1.0	20	0.014