October 25, 2017

TUV SUD BABT
Octagon House, Concorde Way
Segensworth Rd N, Fareham
PO15 5RL

Attention: Director of Certification

FCC ID: LTQVMRR2
IC: 3659A-VMRR2

RE: ***Minimum separation distance calculation per guidance from KDB 447498 D01 Mobile Portable RF Exposure v06 and RSS-102 Issue 5 March 2015***.

EUT	VMRR2 76-77 GHz Vehicular Medium Range Radar
EIRP	493.17 mW (measured worst-case Peak EIRP of the EUT)
Frequency	76.1209 GHz
FCC Limit (§1.1310 (d)(4))	1.0 mW/cm^2 @ 76.1209 GHz
ISED Limit (RSS-102 (4) Table 4)	10 W/m^2 @ 76.1209 GHz

Equation for predicting RF field was used to determine the minimum distance that will comply with the requirements:

$$S = \frac{EIRP}{4\pi r^2}$$

Where: EIRP = equivalent isotropically radiated power

r = distance from the antenna to the point of investigation

From this formula, using 1.0 mW/cm^2 as *S*, the distance *r* is then calculated. This is the minimum distance of compliance with the power density requirements.

$$r = \sqrt{\frac{EIRP}{4\pi S}}$$

$$r = \sqrt{\frac{493.17\ mW}{12.566\ \frac{mW}{cm^2}}}$$

Therefore *r* = 6.3 centimeters from the EUT antenna surface.

Sincerely,

Nikolay Shtin

Name
Authorized Signatory
Title: EMC/Wireless Engineer