



REGULATORY TESTING FROM START TO CERTIFICATE

Intro

Antenna gain documentation required for all FCC Part 15 devices. Must provide either an antenna datasheet/ specification or a test report with gain measurements and plots. This Information cannot be held confidential. Additionally, proprietary information of the design itself can remain confidential in either the ' operational description' or 'schematic'.

Flipper Module Antenna Specifications

1. Company: Commcrete Ltd
2. Product name: Flipper Module Antenna
VTS-300 Antenna (Surface Mounted)
3. RF module/chip: Tx & Rx chains (filters, amplifiers, attenuators)
4. Antenna description

Antenna type	Omni Directional Single Patch
Antenna manufacturer	PN: PA45-1592-175SA Manufacturer: API – Spectrum Control Antennas
Antenna datasheet	Attached
Frequency range	Tx: 1626.5-1660.5 MHz Rx: 1525-1559 MHz
Modulation	N/A
Antenna gain max (peak)	2dBi max -1dBi average
Cable loss	N/A (Antenna is active)
Connector type	TNC

5. Antenna radiation pattern
Please refer to [appendix A >>](#)

Appendix A - Radiation Pattern

RP – Rx & Tx (similar)

**35 mm sq.
Ground plane**
Ground plane
thickness is minimal

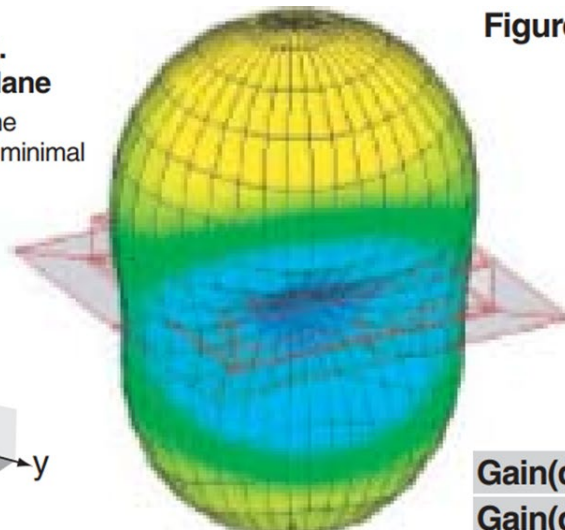
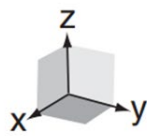


Figure 1



Gain(dB) 1.640GHz

Gain(dB) 1.540GHz

Having the antenna covered with a radome, the average effective gain is -1dBi.