

## 1.0 EUT Description

The Minorplanet Systems PLC, Model AEMB100 Transmitter is a part of a radio base station transceiver used to collect data from fleet vehicles. It is powered by a 12 VDC wall transformer. It is controlled by a RS-232 interface. The antenna is detachable via a standard connection.

The EUT operates in the band of 902 MHz to 928 MHz band at a single frequency of 902.75 MHz and has been certified for compliance with 47 CFR 15.249 of the FCC rules. Specific test requirements for the devices include the following:

|               |   |
|---------------|---|
| 47 CFR 15.249 | Fundamental and Harmonic Radiated Power |
| 47 CFR 15.209 | General Radiated Emission Limits        |
| 47 CFR 15.203 | Antenna Requirements                    |
| 47 CFR 15.205 | Restricted Bands of Operation           |

The device was tested for Class II Permissive Change as the original antenna for this device has been substituted. The antenna for this device was changed to enhance performance, aesthetics and mounting convenience. Test results enumerated in this report have been performed with the new antenna from Webb Industries. No electronic circuitry or the related hook up were changed as a result of the new antenna.

The system tested consisted of the following:

| <b><u>Manufacturer &amp; Model</u></b>                | <b><u>Serial #</u></b> | <b><u>FCC ID #</u></b> | <b><u>Description</u></b>  |
|---|------------------------|------------------------|--|
| Minorplanet Systems PLC,<br>Model AEMB100 Transmitter | 250-04063-001          | QDAAEMB100             | RF Pulsed Modulated<br>Transmitter used for data<br>logging system |
| <b><u>System Peripherals</u></b>                      |                        |                        |  |
| Dell MCM  | CHWTU                  | None                   | PC   |
| NEC JC-1736VMA  | 785561ED               | None                   | Monitor VGA  |
| Microsoft E06401COMB                                  | X05-02473              | None                   | PS2 Keyboard   |
| Logitech M-S34  | LZA83004371            | DZL211029              | PS2 Mouse  |

### **Cables and Cords:**

| <b><u>Quantity</u></b> |             | <b><u>Length</u></b> |   | <b>Shielded</b> | <b>Unshielded</b> | <b>Type</b>                  | <b>Cable</b> | <b>Cord</b> |
|------------------------|-------------|----------------------|---|-----------------|-------------------|------------------------------|--------------|-------------|
| <b>Each</b>            | <b>Feet</b> | <b>Meters</b>        |   |                 |                   |                              |              |             |
| 1                      |             | 1                    | X |                 |                   | Coaxial                      | X            |             |
| 1                      |             | 2                    |   |                 | X                 | AC Power                     | X            |             |
| 1                      |             | 1.5                  |   |                 | X                 | DC Power                     | X            |             |
| 1                      | 1           |                      | X |                 |                   | DB9 Serial                   | X            |             |
| 2                      |             | 2                    |   |                 | X                 | Monitor and PC –<br>AC Power | X            |             |