Exhibit 11: RF Exposure/Environmental Evaluation

Section 15.247 (b)(4)

Requirement:

Systems operating under the provisions of this section shall be operated in a manner that ensures that the public is not exposed to radio frequency energy levels in excess of the Commission's guidelines. See Sec. 1.1307(b)(1) of this chapter. Technical information showing the basis for this statement must be submitted to the Commission upon request.

Demonstration of Compliance:

Base Station

The base station of the MDW 9040 is classified as a mobile device, which is installed so that a minimum separation distance of 20 centimeters is maintained between the transmitter's radiating structure and the body of the user or nearby persons, and the ERP of the MDW 9040 is less than 1.5 watts.

The instruction manual contains the following warning statement on page 4 to ensure the minimum separation distance.

" In order to comply with the FCC RF exposure requirements the MDW 9040 must be installed so that a minimum separation distance of 20 cm be maintained from the antenna to the user or any near by persons."

Handset

The maximum measured peak output power of the device was 166.0 mW. The MDW 9040 handset transmits TDD for 1.059 msec (the total frame length is 5.0 msec) on one specific hop channel, then it hops to the next channel in the hop list.

The average RF duty factor for the MDW 9040 is -13.5 dB. This factor is derived using the following formula:

$$20 \log \frac{1.059 \text{ msec}}{5 \text{ msec}} = 20 \log 0.2118 = -13.5 \text{ dB}$$

Exhibit 11

    Shown below are the measured output power and the average
output power using the above-calculated RF duty cycle:

Frequency (MHz)	Peak Output Power (dBm)	Peak Output Power (mW)	Average Output Power (dBm)	Average Output Power (mW)
902.26	20.0	100.0	6.5	4.5
915.36	22.2	166.0	8.7	7.4
927.65	21.9	155.0	8.4	6.9

20.0 – 13.5 = 6.5 dBm = 4.5 mW

22.2 – 13.5 = 8.7 dBm = 7.4 mW

21.9 – 13.5 = 8.4 dBm = 6.9 mW

    Since the peak and average RF output power of the device is
less than 200 mW the user is not exposed to excessive amounts of
RF; therefore, the device complies with Section 15.247(b)(4) for
RF Exposure.

    Note: The handset antenna is a quarter wave monopole design.
 In both retracted and extended positions, the maximum gain does
not exceed +0dBi.

Exhibit 11