

RF Exposure Calculation

Applicant: GN Netcom Inc.
FCC ID: BCE-DC800

The internal / external antennas used for this portable transmitter must provide a separation distance of at least 2,5cm from all persons and must not be co-located or operating in conjunction with any other antenna or transmitter.

A safety statement concerning minimum separation distances from enclosure of the **Motorola DC800** will be integrated in the user's manual to provide end-users with transmitter operating conditions for satisfying RF exposure compliance.

The appropriate Max conducted power, Time of occupancy(dwel time), puls-train time can be drawn from the test report no. G0M20505-9466-P-15.

Calculations

name			nature value	log value
conducted power			25,53 mW	14,07 dBm
max Antenna gain dBi			3,16	5,00 dBi
max Antenna gain dBd			2,02	3,05 dBd
calculated radiated peak power		EIRP	80,72 mW	19,07 dBm
		ERP	51,51 mW	17,12 dBm

Duty cycle correction = $10 \log$ (dwell time / pulse-train time of 100 ms or less)

radiated (EIRP) and conducted outputs to the threshold values, using source-based time-averaged power				
Time of occupancy (dwell time)			2,91 ms	
puls-train time			6,28 ms	
duty cycle factor			46,34%	-3,34 dB
max source-based time-averaged power				
conducted power			11,83 mW	10,73 dBm
calculated radiated power		EIRP	37,41 mW	15,73 dBm
measured radiated power		EIRP	mW	dBm
frequency		2400 MHz		
		low threshold		High threshold
general population	d<2,5	25 mW	d<20	375 mW
	d>=2,5	50 mW		
occupational	d<2,5	156,25 mW	d<20	937,5 mW
	d>=2,5	375 mW		



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