Government Contract Information and Expedited Processing Request

Northrop Grumman Space & Mission Systems Corp. ("NGMS") hereby requests an extension of a fixed experimental radio station facility, as detailed below and in the Form 405 application, beginning on March 2, 2009. Under the Counter Radio-Controlled Improvised Explosive Device Electronic Warfare ("CREW") program and pursuant to contract number N00024-08-C-6309, NGMS is developing systems for the Department of Defense to help troops in the field counteract roadside bombs that are triggered by radio control, improvised explosive devices. The authorization requested herein is necessary to allow NGMS to continue its tests on the CREW system's embedded GPS receiver and external antenna within an internal chamber at NGMS's facilities located at 15120 Innovation Drive, San Diego (San Diego County), California (NAD83: NL 32-59-3 1; WL 117-04-48).

The fixed experimental radio station facilities utilize a NavTech GPS Repeater Kit, GPSRK, comprised of a roof receiver antenna located on the exterior of the building that is cabled to a transmit antenna mounted inside a screen room chamber within the building, which re-radiates the GPS signal. The re-radiated signal remains within the screen room chamber. The repeater kit re-radiates GPS frequencies L1 at 1575.42 MHz and L2 at 1227.60 MHz, with an emission designator of 24M0G1D and a power of -81.7 dBm EIRP. Please refer to the table below for the link budget analysis to compute the EIRP at a 100 foot distance from the radiating element.

Received Power on Earth	-136.2dBm
Receive Antenna Gain	38dBic
Losses in 200 ft./LMR-400	-5.5dB
Connector Losses	-1.0dB
Amplifier Gain	20.0dB
Pwr in to Re-rad Antenna	-84.7dBm
Gain of Re-rad antenna	3.0dBic
Re-rad eirp	-81.7dBm
Screen room attenuation	-92dB
RF Level outside ScreenRoom	-173.7dBm
Free Space loss at 100 ft.	-63.9dB
RF Power Level at 100 ft.	**-237.6dBm**

The stop buzzer contact to terminate operations for the program is Mr. Paul Wulff (Cell phone: 858-774-8513; Office: 858-592-3296).