



Cummings Research Park  
300 Sparkman Drive, NW  
P.O. Box 070007  
Huntsville, Alabama 35807-7007  
256-726-1268

Federal Communications Commission  
Office of Engineering and Technology  
445 12<sup>th</sup> Street, SW  
Washington, DC 20554

Dear Sir or Ma'am:

Teledyne Brown Engineering is a Department of Defense (DoD) contractor who provides innovative products and services in support of our armed forces. In addition to government contracts, we conduct Internal Research and Development (IR&D) projects with the goal of producing new cutting edge technology. Under our IR&D program, Teledyne Brown Engineering is nearing the completion of a prototype Multi-Input/Multi-Output (MIMO) radar that will help military helicopter pilots land in degraded visual environments (commonly called "brown-out" conditions). The radar operates as an advanced radar altimeter where returns are processed to give pilots a visual representation of the landing area.

While the project has not been classified by the US Government as described in 47 CFR 0.457, the nature of our research is confidential for a number of reasons mentioned in 47 CFR 0.459. First and foremost, the frequency at which this system operates should remain confidential so that the advisories of the United States cannot start developing jamming techniques to endanger aircrews' lives during low visibility landings. Additionally, the development of this radar is of interest to many other US based companies that provide hardware for the armed forces around the world. Teledyne feels that trade secrets could be compromised if this application were not held in confidence. If other corporations gained insight of our MIMO radar's frequency, power, pulse duration, and configuration, Teledyne Brown Engineering would not be able to recover our large investment we are counting on to further improve upon the performance of this vital development for our armed forces deployed in dusty environments.

Teledyne Brown Engineering requests the frequency, bandwidth, power, pulse duration, and purpose of our research and experiments not be disclosed to the public. The nature of the pulsed radar and the short range of the emissions should not cause any interference with other equipment operating at this frequency. All experimentation with this radar will occur on the 63 acre campus of Teledyne Brown Engineering. A majority of the testing will occur inside our high bay test building which is not located within 400 meters of a public road.

Teledyne Brown Engineering operates under strict government security regulations and all employees working on this project have Secret or Top Secret clearance from the DoD. Our facilities are also cleared to store, process, and manufacture classified hardware for both the DoD and the Department of Energy. The intent of our internal research project has been briefed to the various programs within the DoD but the information is not subject to the Freedom of Information Act and will not be made public in the next two or more years.

Sincerely,

A handwritten signature in black ink, appearing to read "John R. Moran".

John R. Moran, PE  
MIMO Program Manager