

HIGH DENSITY DIGITAL RADAR RECORDING SYSTEM



**VICTOR LEUNG
DATATAPE INCORPORATED
PASADENA, CA 91109-7014**

ABSTRACT

EGLIN AFB, Armament Division, had initiated an ongoing update efforts to replace the obsolete video recorders and associated digitizing capability used to record radar signature data.

The prime objective of this program was realized and has demonstrated the feasibility of HIGH DENSITY DIGITAL RECORDING, as a means of radar video recording and has developed the interface design criteria for all radar sites at EGLIN AFB.

The HIGH DENSITY DIGITAL RECORDER/REPRODUCER system had been adapted for radar use with a micro-processor driven radar interface unit that includes the following: A/D and D/A Converters, Input and Output formatter, Memories, Filtering Networks and Error Detection and Correction (EDAC), Auxiliary data mux and demux.

The System has four modes of operation with a digitizing rate of 30 Mega-samples and a selectable 6, 7 or 8 bit resolution. The four modes are: Single radar channel, Dual radar channel, PRI sequence and Snapshot memory.