

SOM BASED COUNT DOWN TIME DISSEMINATION SYSTEM ALONG WITH QT BASED COUNT DOWN TIME READER APPLICATION OVER ETHERNET

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ABSTRACT

This paper describes the need and function of “SOM based Count Down Time dissemination system along with QT based Count down Time reader application over Ethernet”. In Flight Test Center (FTC), single Time platform is very much needed to carry out the activities in organized way and synchronization is required among the tracking instruments deployed. Previously Time codes were transmitted to various sites through serial communication and received by TCR (Time Code Reader). As the number of tracking sites at FTC are increasing day by day, it becomes cost in-effective as well as complex to distribute Time to remote sites serially. To avoid this limitation, the current SOM based low cost Time distribution system was conceptualized, developed and implemented. The serial output of previous system is fed to SOM based system, where it is processed and outputted in Ethernet port, which makes it easier to distribute time to the remote sites. In remote sites, a GUI based Time Code Reader application receive and display both Accumulated Time of the Day (ATD) and Count Down Time (CDT) over Ethernet network. This application has ability to display multiple CDTs of multiple missions, which makes it possible to test multiple flight vehicles in the same time in future.

KEYWORDS: Serial Communication, Ethernet Communication, SOM Based System