To: T.C. Douglas June 30. 1993
From: F. G. Lopata Э. Jopoर्ब
SUBJECT: JUNE PROGRESS REPORT

## R\&D LABORATORY:

The impact test apparatus is operational. Its operating procedure is being worked out and written to meet the process Safety Management requirements.

We are still waiting ATF inspection and approval of the Type II Indoor Magazine. L. Sroka is working on modifications to the building, so that it can be approved by the ATF as a magazine."

The explosive tests of the small red day-boxes have been postponed again. These tests are to establish safe storage limits for the use of these baxes in the lab. (We are currently operating under limits agreed to in the Explosives Committee.)

## LEAD-FREE PRIMERS:

We are continuing to develop analysis methods and improve our techniques on our instruments. Purchasing was reminded to obtain our Dinol. All of the lead free primers types that have been recelved in the plant have had differential scanning calorimeter runs done on them. All have had infrared spectral scans done and peaks examined. We plan to do "wet" analysis of each of them as time permits. We are in the process of getting a Fortran primer analysis program running on our computer to help us develop formulations.

## PLANT SUPPORT:

Participation is continuing as a member of the Explosives Committee primer area team and in the Process Safety Management team. The R\&D lab PSM team is trying to get a first draft for the lab done by the end of July.

TNR precipitations and styphnates produced from selected batches are being analyzed in an attempt to determine and understand what measurable data are most significant in crystal formation and sensitivity effects.

CURRENT PRIMER
We have done 39 dispersive infra red scans, and 50 differential scanning calorimeter thermal analysis runs this month. We have also done about 40 CCTV prints/photographs.

