1.0 COMPLETED BY ORIGINATOR

<table>
<thead>
<tr>
<th>ORIGINATOR</th>
<th>DATE</th>
<th>ORGANIZATION</th>
<th>APPROVAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>D. EYLES</td>
<td>3/5/69</td>
<td>MIT/IL</td>
<td></td>
</tr>
</tbody>
</table>

1.4 TITLE OF CHANGE

LUMINARY 1A

Make 1406 Alarm non-abortive.

1.5 REASON(S) FOR CHANGE

Undesirability of POODOO abort during landing.

1.6 DESCRIPTION OF CHANGE

Make 1406 Alarm non-abortive: ALARM, not POODOO.

2.0 SOFTWARE CONTROL BOARD OR FLIGHT SOFTWARE BRANCH DECISION FOR VISIBILITY IMPACT ESTIMATE BY MIT

2.1 □ APPROVED □ DISAPPROVED

2.2 REMARKS:

2.3 SOFTWARE CONTROL BOARD OR FLIGHT SOFTWARE BRANCH SIGN OFF

DATE

3.0 MIT VISIBILITY IMPACT EVALUATION:

3.1 SCHEDULE IMPACT

0

3.2 IMPACT OF PROVIDING DETAILED EVALUATION

3.3 STORAGE IMPACT

3.4 REMARKS:

3.5 MIT COORDINATOR

Henry W Cherry

DATE

4.0 SOFTWARE CONTROL BOARD ACTION

4.1 □ IMPLEMENT AND PROVIDE □ PROVIDE □ DISAPPROVED CHANGE EVAL. DETAILED CHANGE EVALUATION

4.2 REMARKS

4.3 SOFTWARE CONTROL BOARD SIGN OFF

DATE

5.0 MIT DETAILED PROGRAM CHANGE EVALUATION

5.1 MIT COORDINATOR

DATE

5.2 MIT EVALUATION

6.0 SOFTWARE CONTROL BOARD DECISION ON MIT DETAILED PROGRAM CHANGE EVALUATION

□ START OR CONTINUE □ DISAPPROVED OR STOP IMPLEMENTATION

6.2 REMARKS:

6.3 SOFTWARE CONTROL BOARD SIGN OFF

DATE
LUMINARY Memo #68

TO: Distribution
FROM: George W. Cherry
DATE: February 20, 1969
SUBJECT: Lunar Landing Guidance Equations Program Alarms

In the present LUMINARY 1A, TGO computations which fail to converge cause the program to flash V37 and the astronaut cannot select P66 (Alarm 1406). If the astronaut is exercising his new ATT HOLD option (PCR 737) in P63, P64, P65 and allows a very large attitude error to develop, the TGO computations may fail to converge. We do not want Alarm 1406 or any other alarm of this nature which might be caused by large attitude errors to toss the crew irrevocably out of the landing programs. We also do not want any landing guidance equations unhappiness to do anything except turn on a program alarm. No POODOOs!

Action: Don Eyles, Allan Klumpp, please scrutinize the equations performance with large attitude error and implement the above philosophy. Alarm 1406 should not do a POODOO, certainly at least not in ATT HOLD mode.