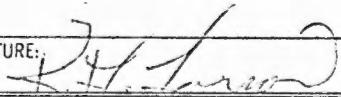


MIT/IL SOFTWARE ANOMALY REPORT

R. LARSON

1.1 ORIGINATOR: Garman		1.2 ORGANIZATION: FSB		1.3 DATE: 10-2-69		1.4 ORIGINATOR CONTROL NO.	
1.5 DESCRIPTION OF ANOMALY: A 520 alarm occurred at time of abort (to P70). This is probably very similar to program note 1.4.2, as it is our belief that <u>any</u> software restart can cause the 520 alarm during descent with about a 30% probability. Is that true?						MEC REPORT NO. L-1B-08	
						PROGRAM LUM	
CONTINUED ON PAGE							
1.6 DESCRIPTION OF RUN: LMS descent abort simulation on 10/1/69.							
CONTINUED ON PAGE							
- MIT ANALYSIS -							
2.1 CAUSE: See Data Amplification Sheet.							
CONTINUED ON PAGE							
2.2 RECOGNITION:							
CONTINUED ON PAGE							
2.3 MISSION EFFECT:							
CONTINUED ON PAGE							
2.4 AVOIDANCE PROCEDURE:							
CONTINUED ON PAGE							
2.5 RECOVERY PROCEDURE:							
CONTINUED ON PAGE							
2.6 PROGRAM CORRECTION:							
CONTINUED ON PAGE							
2.7 RECOMMENDED DISPOSITION (Fix, Work-around, etc):							
CONTINUED ON PAGE							
2.8 RECOMMENDED RE-TESTING:							
CONTINUED ON PAGE						2.9 MIT/IL SIGNATURE: 	
						2.10 DATE: 11-7-69	
3.1 NASA DIRECTION:						4.1 CLOSING ACTION TAKEN:	
3.2 NASA/MSC SIGNATURE:		3.3 ORGANIZATION:		3.4 DATE:		4.2 SIGNATURE:	
						4.3 ORGANIZATION:	
						4.4 DATE:	

MIT/IL SOFTWARE ANOMALY REPORT

REPORT NO. L-1B-08
PROGRAM LUM
PROGRAM REVISION 116

I.1 ORIGINATOR: J. GARMAN	I.2 ORGANIZATION: FSB	I.3 DATE: 10/2/69	I.4 ORIGINATOR CONTROL NO.
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2.1 Cause:

Not true: A 00520 alarm, "RADARUPT not expected at this time," is generated whenever a radar (LR or RR) interrupt is received when not called for. In referring to A. Harano's DDM #483 as revised 28 August 1969, it is seen that the rupt is generated upon a restart only if the restart occurs during the counter state "9". With 6 radar readings (5 velocity, 1 altitude) every two seconds, the CNTOF9 is present 30 msec/sec or 3% probability.

It is understood that the present LMS configuration will generate a 00520 alarm anytime a restart occurs during the time the "activity" bit is set. This is 270 msec/sec. or approximately 30% probability.