INDEPENDENT ORBITER ASSESSMENT

ASSESSMENT OF THE MAIN PROPULSION SUBSYSTEM FMEA/CIL VOLUME 2 OF 4

26 FEBRUARY 1988

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88 NASA DATA:
ASSESSMENT ID: MPS-1011 BASELINE [ ]
NASA FMEA #: 0518-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1011
ITEM: LO2 TANK PRE-PRESS CHECK VALVE (CV16)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
NASA INFORMATION IS BASED ON NASA FMEA/CIL REVIEW MEETING NOTES (REF. J. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1012
NASA FMEA #: 0518-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1012
ITEM: LO2 TANK PRE-PRESS CHECK VALVE (CV16)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[F]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[ ]	[ ]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
IF THIS CHECK VALVE FAILS TO CLOSE THE LO2 PRE-PRESS DISCONNECT VALVE WOULD ADD REDUNDANCY. SINCE THE ACCELERATION ACTS STRONGLY ON THE HEAVY LO2, LOSS OF LO2 AND LPOT PUMP CAVITATION ARE UNLIKELY. HOWEVER, LOSS OF GO2 ULLAGE PRESSURE COULD CAUSE THE LO2 TANK TO BUCKLE DUE TO ATMOSPHERIC FORCES ON AN UNPRESSURIZED TANK. CONTAMINATION CAN CAUSE LOSS OF ALL REDUNDANCY. NASA INFORMATION IS BASED ON THE RI/NASA CRITICAL ITEMS LIST OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1013
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1013
ITEM: LO2 TANK PRE-PRESS CHECK VALVE (CV16)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS WORKSHEET SHOULD BE COMBINED WITH MPS-1014. THE BURNING OF THIS VALVE MIGHT CAUSE GO2 TO LEAK INTO THE AFT COMPARTMENT POSSIBLY CAUSING OVERPRESSURIZATION. THE LOSS OF ULLAGE PRESSURE MIGHT CAUSE THE LO2 TANK TO BUCKLE DUE TO ATMOSPHERIC FORCES ACTING ON AN UNPRESSURIZED TANK.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1014
NASA FMEA #: N/A

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1014
ITEM: LO2 TANK PRE-PRESS CHECK VALVE (CV16)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[1 /1]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS WORKSHEET SHOULD BE COMBINED WITH MPS-1013.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1021
NASA FMEA #: 0451-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1021
ITEM: LO2 BLEED CHECK VALVE (CV31, 33, 35)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[F]	[F]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
IF THIS CHECK VALVE FAILS TO OPEN, LO2 WILL ACCUMULATE INSIDE THE POGO ACCUMULATOR PUSHING THE GO2 OUT THROUGH THE PRESSURE ISOLATION VALVE. THIS WOULD NEUTRALIZE THE POGO SUPPRESSION SYSTEM CAUSING LOW-FREQUENCY VIBRATIONS TO BE ADDED TO THE SHUTTLES
DYNAMICS IN THE FORM OF VARYING THRUST. THESE ADDITIONAL DYNAMICS COULD CAUSE THE LOSS OF THE VEHICLE.
SINCE THE VALVE IS REALLY TWO CHECK VALVES IN PARALLEL, TWO FAILURES ARE REQUIRED FOR THE DESCRIBED EFFECTS TO OCCUE. NASA INFORMATION IS BASED ON THE RI/NASA CRITICAL ITEMS LIST OF 12-23-87 AND THE 0451-1 CIL WORKSHEET OF 9-16-87. THIS WORKSHEET SHOULD BE COMBINED WITH MPS-1023.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1022
NASA FMEA #: 0451-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1022
ITEM: LO2 BLEED CHECK VALVE (CV31, 33, 35)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[N]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R] [F] [F] [F] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
GROUND CHECKOUT WILL NOT INDICATE THAT BOTH DUAL REDUNDANT CHECK VALVES ARE OPERATING PROPERLY. NASA INFORMATION IS BASED ON THE RI/NASA CRITICAL ITEMS LIST OF 12-23-87 AND THE CIL WORKSHEET DATED 9-16-87. THIS IOA WORKSHEET SHOULD BE COMBINED WITH MPS-1023.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88 NASA DATA:
ASSESSMENT ID: MPS-1023 BASELINE [ ]
NASA FMEA #: 0451-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1023
ITEM: LO2 BLEED CHECK VALVE (CV31, 33, 35)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R] [F] [F] [F] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
IF THIS CHECK VALVE FAILS TO OPEN THE STANDPIPE DOES NOT GIVE THE GO2 AN OVERFLOW CAPABILITY IF THE LO2 LEVEL IN THE POGO ACCUMULATOR LEVEL LOWER. THIS MIGHT ALLOW GO2 INTO THE HPOTP CAUSING UNCONTAINED ENGINE DAMAGE. GROUND CHECKOUT CANNOT RELIABLY
INDICATE THAT BOTH DUAL REDUNDANT CHECK VALVES ARE OPERATING PROPERLY. BOTH DUAL REDUNDANT CHECK VLAVES CAN FAIL TO OPEN BECAUSE OF CONTAMINATION. NASA INFORMATION IS BASED ON THE RI/NASA CRITICAL ITEMS LIST OF 12-23-87 AND THE RI/NASA CIL WORKSHEET
OF 9-16-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1024
NASA FMEA #: 0451-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1024
ITEM: LO2 BLEED CHECK VALVE (CV31, 33, 35)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE VALVE IS NORMALLY OPEN DURING ENGINE OPERATION TO ALLOW GO2 TO FLOW FROM THE POGO ACCUMULATOR TO THE MANIFOLD. IOA WORKSHEET 1024 SHOULD BE DROPPED. NASA INFORMATION IS BASED ON THE RI/NASA CRITICAL ITEMS LIST OF 12-23-87 AND THE RI/NASA WORKSHEET DATED 9-16-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1025
NASA FMEA #: 0451-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1025
ITEM: LO2 BLEED CHECK VALVE (CV31, 33, 35)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[/NA]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

	[3 /3]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA CRITICAL ITEMS LIST (12-23-87) INDICATES 3/3A, MEANING 3/3 FOR NOMINAL FLIGHT AND 1/1 FOR ABORT. THE RI/NASA CIL WORKSHEET (DATED 9-16-87) DESCRIBES A FAILURE SEQUENCE THAT CONFORMS TO A CRITICALITY OF 2/1R FOR ABORT. IOA RECOMMENDS 3/3 FOR NOMINAL AND 2/1R FOR ABORT, WITH THE MAIN OXIDIZER VALVE AS THE REDUNDANT ITEM WHOSE FAILURE WOULD ALLOW LOSS OF PROPELLANT.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1026
NASA FMEA #: 0451-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1026
ITEM: LO2 BLEED CHECK VALVE (CV31, 33, 35)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[N]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE IOA WORKSHEET ADDRESSES ONLY THE PERIOD BETWEEN MECO AND MPS DUMP, WHICH IS NOT ADDRESSED ON 0451-1. GROUND CHECKOUT CANNOT RELIABLY CERTIFY THAT THE DUAL REDUNDANT CHECK VALVES ARE BOTH OPERATING PROPERLY. IOA WORKSHEET 1026 SHOULD BE COMBINED WITH 1023. NASA INFORMATION IS BASED ON THE RI/NASA CRITICAL ITEMS LIST OF 12-23-87 AND THE RI/NASA WORKSHEET DATED 9-16-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1027
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1027
ITEM: LO2 BLEED CHECK VALVE (CV31, 33, 35)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
IT WAS ORIGINALLY REPORTED THAT THE FAILURE OF THE BLEED CHECK VALVE TO CLOSE WOULD DELAY THE LAUNCH. SINCE THERE IS NO MONITOR TO SHOW THE POSITION OF THIS CHECK VALVE, THE LAUNCH WOULD NOT BE DELAYED. IOA WORKSHEET 1027 SHOULD BE DROPPED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1028
NASA FMEA #: 0451-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1028
ITEM: LO2 BLEED CHECK VALVE (CV31, 33, 35)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[F]	[F]	[F]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET APPLIES ONLY TO THE PRELAUNCH PHASE. LOSS OF TEMPERATURE CONDITIONING FOR ONE ENGINE MAY CAUSE LAUNCH DELAY.
NASA INFORMATION IS BASED ON THE RI/NASA CRITICAL ITEMS LIST (12-12-87) AND RI/NASA CIL WORKSHEET 0451-1 DATED 9-16-87.
THIS IOA WORKSHEET SHOULD BE COMBINED WITH #1023.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1031
NASA FMEA #: 0519-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1031
ITEM: GO2 PRESSURE FLOW CONTROL VALVE (LV53, 54, 55)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[P]	[P]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE OF TWO FLOW CONTROL VALVES MAY CAUSE VIOLATION OF SAFETY LIMITS ON O2 ULLAGE PRESSURE. LOSS OF ALL REDUNDANCY WILL CAUSE ULLAGE PRESSURE TO FALL BELOW ITS MINIMUM ALLOWABLE VALVE. THIS IS MONITORED AND WILL BE INDICATED TO THE CREW.
REF: RI/NASA CIL, NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1032
NASA FMEA #: 0519-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1032
ITEM: GO2 PRESSURE FLOW CONTROL VALVE (LV53, 54, 55)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[P]	[F]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF A SECOND FLOW CONTROL VALVE MAY CAUSE ULLAGE PRESSURE TO FALL BELOW THE MINIMUM LEVEL REQUIRED FOR SAFETY.
REF: RI/NASA CIL 12-23-87, NASA FMEA/CIL REVIEW MEETING (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1033
NASA FMEA #: 0519-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1033
ITEM: GO2 PRESSURE FLOW CONTROL VALVE (LV53, 54, 55)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[P]	[F]	[X] *
IOA	[3 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[P]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE MAY CAUSE OVERPRESSURIZATION OF THE O2 TANK AND VENTING OF O2. GROUND CHECKOUT SHOULD DETECT THE FAILURE TO CLOSE. LOSS OF REDUNDANCY IS DETECTABLE BY INDICATIONS OF HIGH ULLAGE PRESSURE. ALL REDUNDANCY CANNOT BE LOST BY A SINGLE EVENT.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/20/88
ASSESSMENT ID: MPS-1034
NASA FMEA #: 0519-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1034
ITEM: GO2 PRESSURE FLOW CONTROL VALVE (LV53, 54, 55)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
ESCAPING O2 AND FIRE MAY CAUSE LOSS OF VEHICLE. REF: RI/NASA CIL OF 12-23-87, NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1035
NASA FMEA #: 0519-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1035
ITEM: GO2 PRESSURE FLOW CONTROL VALVE (LV53, 54, 55)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET SHOULD BE COMBINED WITH 1034. REF: RI/NASA CIL OF 12-23-87 AND NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1041
NASA FMEA #: 0408-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1041
ITEM: LO2 FEED (ORB/ET) DISCONNECT (PD1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET SHOULD BE COMBINED WITH 1043. REF: RI/NASA CIL OF 12-23-87 AND CIL WORKSHEET DATED 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1041A
NASA FMEA #: 0408-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1041
ITEM: LO2 FEED (ORB/ET) DISCONNECT (PD1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE 1/1 CRITICALITY ON IOA WORKSHEET 1041 WAS NOT DRIVEN BY THE FAILURE TO OPEN. FAILURE TO OPEN WILL CAUSE LAUNCH DELAY.
REF: NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1042
NASA FMEA #: 0408-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1042
ITEM: LO2 FEED (ORB/ET) DISCONNECT (PD1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND CIL WORKSHEET DATED 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1042A
NASA FMEA #: 0408-11

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1042
ITEM: LO2 FEED (ORB/ET) DISCONNECT (PD1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12/23/87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1043
NASA FMEA #: 0408-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1043
ITEM: LO2 FEED (ORB/ET) DISCONNECT (PD1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND CIL WORKSHEET DATED 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1044
NASA FMEA #: 0408-7

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1044
ITEM: LO2 FEED (ORB/ET) DISCONNECT (PD1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
PROPULSIVE VENTING OF RESIDUAL O2 MAY CAUSE ORBITER/ET RECONTACT AND POSSIBLE DESTRUCTION OF THE VEHICLE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1045
NASA FMEA #: 0408-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1045
ITEM: LO2 FEED (ORB/ET) DISCONNECT (PD1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1046
NASA FMEA #: 0408-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1046
ITEM: LO2 FEED (ORB/ET) DISCONNECT (PD1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
DAMAGE TO TPS TILES FROM CRYO EXPOSURE AND/OR LOSS OF HELIUM DURING REPRESS CAUSING LOSS OF AFT COMPARTMENT PURGE CAPABILITY CAN LEAD TO LOSS OF VEHICLE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1051
NASA FMEA #: 0513-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1051
ITEM: GO2 PRESSURIZATION (ORB/ET) DISCONNECT (PD4)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1052
NASA FMEA #: 0513-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1052
ITEM: GO2 PRESSURIZATION (ORB/ET) DISCONNECT (PD4)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE POSSIBILITY OF PRESSURIZATION LINE RUPTURE JUSTIFIES A CRITICALITY OF 1/1.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1053
NASA FMEA #: 0513-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1053
ITEM: GO2 PRESSURIZATION (ORB/ET) DISCONNECT (PD4)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1053A
NASA FMEA #: 0513-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1053
ITEM: GO2 PRESSURIZATION (ORB/ET) DISCONNECT (PD4)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1054
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1054
ITEM: GO2 PRESSURIZATION (ORB/ET) DISCONNECT (PD4)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET SHOULD BE COMBINED WITH NO LOSS. COMBUSTION OF COMPONENT MATERIAL WILL ALLOW ESCAPE OF GO2.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1055
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1055
ITEM: GO2 PRESSURIZATION (ORB/ET) DISCONNECT (PD4)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[1 /1]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88 NASA DATA:
ASSESSMENT ID: MPS-1056 BASELINE [ ]
NASA FMEA #: 0513-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1056
ITEM: GO2 PRESSURIZATION (ORB/ET) DISCONNECT (PD4)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA CIL INDICATES A 1/1 CRITICALITY DURING ABORTS FOR THIS FAILURE MODE. IOA CONCURS.
REF: NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1061
NASA FMEA #: 0517-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1061
ITEM: LO2 TANK PRE-PRESS (ORB/GND) DISC (PD9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1062
NASA FMEA #: 0517-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1062
ITEM: LO2 TANK PRE-PRESS (ORB/GND) DISC (PD9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[F]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET APPLIES ONLY TO THE PRELAUNCH PHASE. IT SHOULD BE COMBINED WITH 1063.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1063
NASA FMEA #: 0517-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1063
ITEM: LO2 TANK PRE-PRESS (ORB/GND) DISC (PD9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[F]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[ ]	[ ]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF REDUNDANCY WILL ALLOW LOSS OF ULLAGE PRESSURE AND POSSIBLE ET STRUCTURAL FAILURE. ALL REDUNDANCY CANNOT BE LOST BY A SINGLE EVENT.
REF: RI/NASA CIL OF 12-23-87 AND NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1064
NASA FMEA #: 0517-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1064
ITEM: LO2 TANK PRE-PRESS (ORB/GND) DISC (PD9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS RI/NASA ANALYSIS APPLIES ONLY TO EXTERNAL LEAKAGE OF HELIUM.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1064A
NASA FMEA #: 0517-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1064
ITEM: LO2 TANK PRE-PRESS (ORB/GND) DISC (PD9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1071
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1071
ITEM: LO2 GROUND FILL & DRAIN (ORB/GND) DISCONNECT (PD12)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE MODE NOT CREDIBLE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/21/88
ASSESSMENT ID: MPS-1072
NASA FMEA #: 0303-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1072
ITEM: LO2 GROUND FILL & DRAIN (ORB/GND) DISCONNECT (PD12)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LEAKAGE OF LO2 IS DECLARED BY NSTS 22206 TO BE A CRITICALITY 1/1 ITEM. IOA WORKSHEET 1072 SHOULD BE COMBINED WITH 1073.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1073
NASA FMEA #: 0303-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1073
ITEM: LO2 GROUND FILL & DRAIN (ORB/GND) DISCONNECT (PD12)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1081
NASA FMEA #: 0406-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1081
ITEM: LO2 OVERBOARD BLEED (ORB/GND) DISCONNECT (PD13)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1081A
NASA FMEA #: 0406-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1081
ITEM: LO2 OVERBOARD BLEED (ORB/GND) DISCONNECT (PD13)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1082
NASA FMEA #: 0406-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1082
ITEM: LO2 OVERBOARD BLEED (ORB/GND) DISCONNECT (PD13)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1083
NASA FMEA #: 0406-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1083
ITEM: LO2 OVERBOARD BLEED (ORB/GND) DISCONNECT (PD13)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1084
NASA FMEA #: 0406-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1084
ITEM: LO2 OVERBOARD BLEED (ORB/GND) DISCONNECT (PD13)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[N /N]	[ ]	[N]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1085
NASA FMEA #: 0406-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1085
ITEM: LO2 OVERBOARD BLEED (ORB/GND) DISCONNECT (PD13)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET SHOULD BE COMBINED WITH 1084. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1091
NASA FMEA #: 0516-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1091
ITEM: GO2 PRESSURIZATION MANIFOLD TEST POINT COUPLING (PD15)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1092
NASA FMEA #: 0516-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1092
ITEM: GO2 PRESSURIZATION MANIFOLD TEST POINT COUPLING (PD15)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[F]	[F]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE MODE IS EXTERNAL LEAKAGE OF THE COUPLING, NOT INTERNAL SEAL LEAKAGE. THIS FMEA SHOULD BE DROPPED, OR ITS FAILURE MODE REVISED TO REFLECT THE SCENARIO DESCRIBED.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES (J.E. BORCHES).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1093
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1093
ITEM: GO2 PRESSURIZATION MANIFOLD TEST POINT COUPLING (PD15)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
COMBUSTION OF THE COMPONENT WILL ALLOW ESCAPE OF O2, CREATING A FIRE/EXPLOSION HAZARD THAT CAN DESTROY THE VEHICLE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1094
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1094
ITEM: GO2 PRESSURIZATION MANIFOLD TEST POINT COUPLING (PD15)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET SHOULD BE COMBINED WITH 1093.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1101
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1101
ITEM: LO2 PREVALVE (PV1, 2, 3)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA ANALYSIS ADDRESSES A PRELAUNCH FAILURE TO OPEN.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1102
NASA FMEA #: 0401-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1102
ITEM: LO2 PREVALVE (PV1, 2, 3)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1103
NASA FMEA #: 0401-9

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1103
ITEM: LO2 PREVALVE (PV1, 2, 3)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1104
NASA FMEA #: 0401-7

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1104
ITEM: LO2 PREVALVE (PV1, 2, 3)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[NA]	[P]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[ ]	[N]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE PREVALVE HAS A BYPASS RELIEF VALVE AS WELL AS VISOR RELIEF. ADDITONAL RELIEF CAPABILITY IS PROVIDE BY THE HPOT SEALS. RELIEF FUNCTION IS CONSIDERED STANDBY REDUNDANT.
REF: RI/NASA CIL WORKSHEET OF 10-22-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/22/88
ASSESSMENT ID: MPS-1105
NASA FMEA #: 0401-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1105
ITEM: LO2 PREVALVE (PV1, 2, 3)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /1R]	[P]	[P]	[P]	[ ]
COMPARE	[/]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSITION SWITCH INDICATORS MAY FALSELY INDICATE OPEN IF THE FAILURE IS CAUSED BY A PIECE PART STRUCTURAL FAILURE. THEREFORE, SCREEN B SHOULD FAIL.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1106
NASA FMEA #: 0401-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1106
ITEM: LO2 PREVALVE (PV1, 2, 3)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
IOA ANALYSIS ADDRESSED FAILURE TO CLOSE FOLLOWING MPS DUMP ONLY. THIS WORKSHEET SHOULD BE COMBINED WITH 1108.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1107
NASA FMEA #: 0401-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1107
ITEM: LO2 PREVALVE (PV1, 2, 3)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1108
NASA FMEA #: 0401-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1108
ITEM: LO2 PREVALVE (PV1, 2, 3)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1121
NASA FMEA #: 0414-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1121
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE (PV7)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1122
NASA FMEA #: 0414-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1122
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE (PV7)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[N /N]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
ESCAPING LO2 IS CONSIDERED A CRITICALITY 1 SITUATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1123
NASA FMEA #: 0414-7

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1123
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE (PV7)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: R/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1124
NASA FMEA #: 0414-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1124
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE (PV7)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REDUNDANCY EXISTS TO RELIEVE THE MANIFOLD IF THIS FAILURE OCCURS. MANIFOLD PRESSURE INDICATORS SUPPORT PASSAGE OF SCREEN B.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1131
NASA FMEA #: 0311-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1131
ITEM: LO2 OUTBOARD FILL AND DRAIN VALVE (PV9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[P]	[P]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET ADDRESSED PRELAUNCH FAILURES ONLY. THE 1/1 CRITICALITY WAS DRIVEN BY THE FAILURE TO REMAIN OPEN, WHILE THE NASA FAILURE MODE WAS FAIL TO OPEN. FAILURE TO OPEN FOR MPS INERT HAS NO EFFECT. LOSS OF ALL REDUNDANCY MAY CAUSE MANIFOLD RUPTURE. REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1131A
NASA FMEA #: 0311-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1131
ITEM: LO2 OUTBOARD FILL AND DRAIN VALVE (PV9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1132
NASA FMEA #: 0311-9

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1132
ITEM: LO2 OUTBOARD FILL AND DRAIN VALVE (PV9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1133
NASA FMEA #: 0311-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1133
ITEM: LO2 OUTBOARD FILL AND DRAIN VALVE (PV9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS IDENTIFIED A 1/1 CRITICALITY FOR RTLS AND TAL ABORTS. IOA CONCURS WITH THIS RESULT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1134
NASA FMEA #: 0311-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1134
ITEM: LO2 OUTBOARD FILL AND DRAIN VALVE (PV9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[N /N]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS IDENTIFIED A 1/1 CRITICALITY FOR RTLS AND TAL ABORTS. IOA CONCURS WITH THIS RESULT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1135
NASA FMEA #: 0311-9

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1135
ITEM: LO2 OUTBOARD FILL AND DRAIN VALVE (PV9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF VEHICLE CAN OCCUR UPON FIRST FAILURE DURING LOADING OR DUMP.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1136
NASA FMEA #: 0311-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1136
ITEM: LO2 OUTBOARD FILL AND DRAIN VALVE (PV9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF ALL REDUNDANCY WILL CAUSE RUPTURE OF THE MANIFOLD.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1137
NASA FMEA #: 0311-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1137
ITEM: LO2 OUTBOARD FILL AND DRAIN VALVE (PV9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1151
NASA FMEA #: 0310-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1151
ITEM: LO2 INBOARD FILL AND DRAIN VALVE (PV10)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA ANALYSIS ADDRESSED PRELAUNCH FAILUES ONLY. THE 1/1 CRITICALITY WAS DRIVEN BY THE FAILURE TO REMAIN OPEN, WHILE THE NASA FAILURE MODE WAS FAIL TO OPEN. FAILURE TO OPEN FOR MPS INERT HAS NO EFFECT. LOSS OF ALL REDUNDNACY MAY CAUSE MANIFOLD RUPTURE. REF: RI/NASA CIL WORKSHEET OF 12-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1151A
NASA FMEA #: 0310-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1151
ITEM: LO2 INBOARD FILL AND DRAIN VALVE (PV10)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1152
NASA FMEA #: 0310-10

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1152
ITEM: LO2 INBOARD FILL AND DRAIN VALVE (PV10)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1153
NASA FMEA #: 0310-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1153
ITEM: LO2 INBOARD FILL AND DRAIN VALVE (PV10)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1154
NASA FMEA #: 0310-7

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1154
ITEM: LO2 INBOARD FILL AND DRAIN VALVE (PV10)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF ALL REDUNDANCY CAN CAUSE RUPTURE OF THE MANIFOLD.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1155
NASA FMEA #: 0310-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1155
ITEM: LO2 INBOARD FILL AND DRAIN VALVE (PV10)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-9-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1156
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1156
ITEM: LO2 INBOARD FILL AND DRAIN VALVE (PV10)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA ANALYSIS SHOULD BE COMBINED WITH NUMBER 1155.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1157
NASA FMEA #: 0310-10

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1157
ITEM: LO2 INBOARD FILL AND DRAIN VALVE (PV10)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1171
NASA FMEA #: 0452-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1171
ITEM: LO2 BLEED SHUTOFF VALVE (PV19)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS INDICATES A 1/1 CRITICALITY FOR A PAD ABORT (PRELAUNCH). IOA CONCURS WITH THIS RESULT. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1172
NASA FMEA #: 0452-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1172
ITEM: LO2 BLEED SHUTOFF VALVE (PV19)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LO2 OVERBOARD LEAKAGE IS DEFINED TO BE A 1/1 CRITICALITY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1173
NASA FMEA #: 0452-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1173
ITEM: LO2 BLEED SHUTOFF VALVE (PV19)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[N /N]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE WILL ALLOW OVERBOARD LEAKAGE OF LO2.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1174
NASA FMEA #: 0452-7

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1174
ITEM: LO2 BLEED SHUTOFF VALVE (PV19)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1175
NASA FMEA #: 0452-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1175
ITEM: LO2 BLEED SHUTOFF VALVE (PV19)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1176
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1176
ITEM: LO2 BLEED SHUTOFF VALVE (PV19)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET SHOULD BE COMBINED WITH NUMBER 1172.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1181
NASA FMEA #: 0453-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1181
ITEM: LO2 POGO ACCUMULATOR RECIRCULATION VALVE (PV20, 21)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS RESULTED IN A 1/1 CRITICALITY FOR PAD ABORTS (PRELAUNCH). THE SECOND FAILURE CITED (LEAK IN ENGINE OR LINE) IS NOT A VALID REDUNDANCY FOR THE POGO VALUES. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1182
NASA FMEA #: 0453-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1182
ITEM: LO2 POGO ACCUMULATOR RECIRCULATION VALVE (PV20, 21)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1183
NASA FMEA #: 0453-7

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1183
ITEM: LO2 POGO ACCUMULATOR RECIRCULATION VALVE (PV20, 21)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-1184
NASA FMEA #: 0453-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1184
ITEM: LO2 POGO ACCUMULATOR RECIRCULATION VALVE (PV20, 21)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[F]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[N]	[N]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1185
NASA FMEA #: 0453-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1185
ITEM: LO2 POGO ACCUMULATOR RECIRCULATION VALVE (PV20, 21)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF REDUNDANT ITEMS IS NOT READILY DETECTABLE. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1191
NASA FMEA #: 0427-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1191
ITEM: LO2 LOW LEVEL LIQUID SENSOR (MT1, 2)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /1R]	[P]	[P]	[P]	[ ]
COMPARE	[N /]	[ ]	[N]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT ALSO COVERS THE LH2 ECO SENSORS. TWO SENSORS INDICATING WET WILL ALLOW ENGINE TO RUN, RESULTING IN DEPLETION SHUTDOWN AND POSSIBLE ENGINE EXPLOSION. REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1192
NASA FMEA #: 0427-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1192
ITEM: LO2 LOW LEVEL LIQUID SENSOR (MT1, 2)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[F]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[ ]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

	[2 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT ALSO COVERS THE LH2 ECO SENSORS. TWO SENSORS INDICATING DRY WILL CAUSE AN ENGINE SHUTDOWN COMMAND TO BE GIVEN.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1201
NASA FMEA #: 0410-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1201
ITEM: LO2 SYSTEM DELTA P TRANSDUCER (MT44, 50)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FOR MTS ONLY. REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1202
NASA FMEA #: 0410-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1202
ITEM: LO2 SYSTEM DELTA P TRANSDUCER (MT44, 50)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FOR MTS ONLY. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1211
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1211
ITEM: LO2 PREPRESS DISCONNECT CHECK VALVE TEST PORT (TP9)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE MODE IS ADDRESSED IN THE ANALYSIS OF THE GO2 PRESSURIZATION SUPPLY LINE (PD9 TO CV16) ON IOA WORKSHEET 264 AND RI/NASA 0510-1.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1221
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1221
ITEM: LO2 17 INCH ORBITER DISCONNECT TEST PORT (TP17, 18)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE MODE IS ADDRESSED IN THE ANALYSIS OF THE LO2 FEEDLINE DISCONNECT (PD1) ON IOA WORKSHEET 1042 AND RI/NASA 0408-4.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1231
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1231
ITEM: LO2 FEEDLINE RELIEF TEST PORT (TP24)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE MODE IS ADDRESSED IN THE ANALYSIS OF THE LO2 RELIEF LINE (PV7 TO RV5) ON IOA WORKSHEET 252 AND RI/NASA 0424-1.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1241
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1241
ITEM: LO2 FEEDLINE MANIFOLD (MA1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
BLOCKAGE WILL PREVENT TANK FILL OR ENGINE START.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1242
NASA FMEA #: 0419-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1242
ITEM: LO2 FEEDLINE MANIFOLD (MA1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1243
NASA FMEA #: 0419-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1243
ITEM: LO2 FEEDLINE MANIFOLD (MA1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET SHOULD BE COMBINED WITH 1242.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1244
NASA FMEA #: 0419-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1244
ITEM: LO2 FEEDLINE MANIFOLD (MA1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1251
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1251
ITEM: LO2 FILL & DRAIN LINE (FH1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1252
NASA FMEA #: 0306-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1252
ITEM: LO2 FILL & DRAIN LINE (FH1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE UNINSULATED LINE (OV102). REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1253
NASA FMEA #: 0306-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1253
ITEM: LO2 FILL & DRAIN LINE (FH1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET SHOULD BE COMBINED WITH 1252.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1253A
NASA FMEA #: 0307-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1253
ITEM: LO2 FILL & DRAIN LINE (FH1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE FOAM-INSULATED LINE. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1254
NASA FMEA #: 0307-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1254
ITEM: LO2 FILL & DRAIN LINE (FH1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE FOAM-INSULATED LINE. REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1261
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1261
ITEM: LO2 17 INCH FEEDLINE (FH2)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
BLOCKAGE WILL PREVENT TANK FILL OR ENGINE START.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1262
NASA FMEA #: 0459-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1262
ITEM: LO2 17 INCH FEEDLINE (FH2)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE FOA INSULATED LINE. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1262A
NASA FMEA #: 0418-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1262
ITEM: LO2 17 INCH FEEDLINE (FH2)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1263
NASA FMEA #: 0459-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1263
ITEM: LO2 17 INCH FEEDLINE (FH2)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE FOAM INSULATED LINE. THIS IOA WORKSHEET SHOULD BE COMBINED WITH 1262.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1264
NASA FMEA #: 0459-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1264
ITEM: LO2 17 INCH FEEDLINE (FH2)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE FOAM INSULATED LINE. REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1264A
NASA FMEA #: 0418-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1264
ITEM: LO2 17 INCH FEEDLINE (FH2)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE VACUUM JACKETED LINE. REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1271
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1271
ITEM: LO2 12 INCH FEEDLINE (FH3, 4, 5)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
BLOCKAGE WILL PREVENT PRESTART CONDITIONING AND PREVENT ENGINE START.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1272
NASA FMEA #: 0420-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1272
ITEM: LO2 12 INCH FEEDLINE (FH3, 4, 5)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE VACUUM JACKETED LINE (OV102). REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1272A
NASA FMEA #: 0460-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1272
ITEM: LO2 12 INCH FEEDLINE (FH3, 4, 5)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE FOAM INSULATED LINE. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1273
NASA FMEA #: 0420-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1273
ITEM: LO2 12 INCH FEEDLINE (FH3, 4, 5)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS IOA WORKSHEET SHOULD BE COMBINED WITH 1272.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1281
NASA FMEA #: 0412-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1281
ITEM: LO2 FEED MANIFOLD RELIEF VALVE (RV5)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LEAKAGE OF LO2 FROM THE SENSE LINE CAN OCCUR WITHOUT A PRIOR FAILURE OF THE ISOLATION VALVE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1281A
NASA FMEA #: 0412-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1281
ITEM: LO2 FEED MANIFOLD RELIEF VALVE (RV5)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LEAKAGE OF LO2 FROM THE SENSE LINE CAN OCCUR WITHOUT A PRIOR FAILURE OF THE ISOLATION VALVE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1282
NASA FMEA #: 0412-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1282
ITEM: LO2 FEED MANIFOLD RELIEF VALVE (RV5)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS IS FOR A FAILURE TO RESEAT FOLLOWING RELIEF. IOA'S ANALYSIS REFERS TO FAILURE TO REMAIN CLOSED DURING ENGINE OPERATION. REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1282A
NASA FMEA #: 0412-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1282
ITEM: LO2 FEED MANIFOLD RELIEF VALVE (RV5)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE WILL ALLOW LEAKAGE OF LO2. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-5-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1283
NASA FMEA #: 0412-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1283
ITEM: LO2 FEED MANIFOLD RELIEF VALVE (RV5)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REDUNDANCY EXISTS TO RELIEVE MANIFOLD PRESSURE. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-5-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1291
NASA FMEA #: 0609-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1291
ITEM: GO2 PRESSURE MANIFOLD REPRESS ORIFICE (RP1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/26/88
ASSESSMENT ID: MPS-1292
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 1292
ITEM: GO2 PRESSURE MANIFOLD REPRESS ORIFICE (RP1)

LEAD ANALYST: K.A. HOLDEN

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ]
(ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE MODE NOT CREDIBLE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88 NASA DATA:
ASSESSMENT ID: MPS-2001 BASELINE [ ]
NASA FMEA #: 0301-7 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2001
ITEM: LH2 INBOARD FILL AND DRAIN VALVE (PV12)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[P]	[P]	[P]	[X]
COMPARE	[/]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ]
(ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88
ASSESSMENT ID: MPS-2002
NASA FMEA #: 0301-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2002
ITEM: LH2 INBOARD FILL AND DRAIN VALVE (PV12)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[P]	[P]	[P]	[X]
COMPARE	[/]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88
ASSESSMENT ID: MPS-2003
NASA FMEA #: 0301-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2003
ITEM: LH2 INBOARD FILL AND DRAIN VALVE (PV12)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /1R]	[P]	[P]	[P]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL WORKSHEET OF 11-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88
ASSESSMENT ID: MPS-2004
NASA FMEA #: 0301-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2004
ITEM: LH2 INBOARD FILL AND DRAIN VALVE (PV12)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /1R]	[P]	[P]	[P]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FROZEN H2 WOULD THAW AND BOIL OFF OR SUBLIMATE AND BE VENTED THROUGH THE RELIEF SYSTEM OR DURING MPS INERT.
REF: RI/NASA FMEA/CIL REVIEW MEETIN NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88 NASA DATA:
ASSESSMENT ID: MPS-2005 BASELINE [ ]
NASA FMEA #: 0301-5 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2005
ITEM: LH2 INBOARD FILL AND DRAIN VALVE (PV12)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ]
(ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88
ASSESSMENT ID: MPS-2006
NASA FMEA #: 0301-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2006
ITEM: LH2 INBOARD FILL AND DRAIN VALVE (PV12)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
VALVE FAILURE TO CLOSE IS ADDRESSED ON 0301-2. INDICATOR FAILURE MAY CAUSE LAUNCH SCRUB.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88
ASSESSMENT ID: MPS-2007
NASA FMEA #: 0301-10

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2007
ITEM: LH2 INBOARD FILL AND DRAIN VALVE (PV12)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88
ASSESSMENT ID: MPS-2011
NASA FMEA #: 0302-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2011
ITEM: LH2 OUTBOARD FILL AND DRAIN VALVE (PV11)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2012
NASA FMEA #: 0302-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2012
ITEM: LH2 OUTBOARD FILL AND DRAIN VALVE (PV11)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2013
NASA FMEA #: 0302-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2013
ITEM: LH2 OUTBOARD FILL AND DRAIN VALVE (PV11)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
TWO FAILURES ARE REQUIRED BEFORE MANIFOLD RUPTURE OR HAZARDOUS VENTING ARE POSSIBLE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-24-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88
ASSESSMENT ID: MPS-2014
NASA FMEA #: 0302-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2014
ITEM: LH2 OUTBOARD FILL AND DRAIN VALVE (PV11)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[P]	[P]	[P]	[ ]
COMPARE	[/]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA ANALYSIS INDICATES 1/1 CRITICALITY FOR RTLS AND TAL ABORTS. IOA CONCURS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/25/88
ASSESSMENT ID: MPS-2015
NASA FMEA #: 0302-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2015
ITEM: LH2 OUTBOARD FILL AND DRAIN VALVE (PV11)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE TO CLOSE IS ADDRESSED ON 0302-2. INDICATOR FAILURE MAY CAUSE LAUNCH SCRUB.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/27/88 NASA DATA:
ASSESSMENT ID: MPS-2016 BASELINE [ ]
NASA FMEA #: 0302-9 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2016
ITEM: LH2 OUTBOARD FILL AND DRAIN VALVE (PV11)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2021
NASA FMEA #: 0308-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2021
ITEM: LH2 FILL AND DRAIN LINE (FH6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88 NASA DATA:
ASSESSMENT ID: MPS-2022 BASELINE [ ]
NASA FMEA #: NA NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2022
ITEM: LH2 FILL AND DRAIN LINE (FH6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2023
NASA FMEA #: 0308-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2023
ITEM: LH2 FILL AND DRAIN LINE (FH6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88 NASA DATA:
ASSESSMENT ID: MPS-2031 BASELINE [ ]
NASA FMEA #: 0303-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2031
ITEM: LH2 GROUND FILL AND DRAIN (ORB/GND) DISCONNECT (ORBITER HALF) (PD11)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2031A
NASA FMEA #: 0303-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2031
ITEM: LH2 GROUND FILL AND DRAIN (ORB/GND) DISCONNECT (ORBITER HALF) (PD11)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2041
NASA FMEA #: 0432-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2041
ITEM: LH2 HI POINT BLEED (ORB/GND) DISCONNECT (ORB HALF) (PD17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2042
NASA FMEA #: 0432-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2042
ITEM: LH2 HI POINT BLEED (ORB/GND) DISCONNECT (ORB HALF) (PD17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[F]	[X]
COMPARE	[/]	[ ]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2043
NASA FMEA #: 0432-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2043
ITEM: LH2 HI POINT BLEED (ORB/GND) DISCONNECT (ORB HALF) (PD17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[F]	[X]
COMPARE	[/]	[ ]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2044
NASA FMEA #: 0432-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2044
ITEM: LH2 HI POINT BLEED (ORB/GND) DISCONNECT (ORB HALF) (PD17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2051
NASA FMEA #: 0304-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2051
ITEM: LH2 REPLENISH VALVE (PV13)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /1R]	[P]	[P]	[P]	[ ]
COMPARE	[N /]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2052
NASA FMEA #: 0304-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2052
ITEM: LH2 REPLENISH VALVE (PV13)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2053
NASA FMEA #: 0304-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2053
ITEM: LH2 REPLENISH VALVE (PV13)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /1R]	[P]	[P]	[P]	[ ]
COMPARE	[N /]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[P]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
MANIFOLD PRESSURE INDICATOR AND ALARM SUPPORTS PASSAGE OF SCREEN B.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2054
NASA FMEA #: 0304-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2054
ITEM: LH2 REPLENISH VALVE (PV13)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2055
NASA FMEA #: 0304-7

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2055
ITEM: LH2 REPLENISH VALVE (PV13)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2061
NASA FMEA #: 0431-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2061
ITEM: LH2 HI POINT BLEED VALVE (PV22)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2062
NASA FMEA #: 0431-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2062
ITEM: LH2 HI POINT BLEED VALVE (PV22)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL WORKSHEET OF 11-12-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2063
NASA FMEA #: 0431-8

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2063
ITEM: LH2 HI POINT BLEED VALVE (PV22)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-12-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88 NASA DATA:
ASSESSMENT ID: MPS-2071 BASELINE [ ]
NASA FMEA #: 0410-4 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2071
ITEM: LH2 SYSTEM DELTA-P TRANSDUCER (MT44, MT50)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FOR MT44 ONLY. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2072
NASA FMEA #: 0410-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2072
ITEM: LH2 SYSTEM DELTA-P TRANSDUCER (MT44, MT50)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FOR MT44 ONLY. REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2081
NASA FMEA #: 0429-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2081
ITEM: LH2 HI POINT BLEED LINE (FH19)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE VACUUM JACKETED LINE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 6-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2081A
NASA FMEA #: 0430-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2081
ITEM: LH2 HI POINT BLEED LINE (FH19)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE FORM INSULATED LINE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 6-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88 NASA DATA:
ASSESSMENT ID: MPS-2082 BASELINE [ ]
NASA FMEA #: NA NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2082
ITEM: LH2 HI POINT BLEED LINE (FH19)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3] [NA] [NA] [NA] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/28/88
ASSESSMENT ID: MPS-2083
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2083
ITEM: LH2 HI POINT BLEED LINE (FH19)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ANALYSIS IS FOR THE VACUUM JACKETED LINE. THE LINE IS OPEN TO THE LH2 MANIFOLD. PRESSURE WOULD NOT INCREASE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2091
NASA FMEA #: 0405-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2091
ITEM: LH2 RECIRCULATION DISCONNECT VALVE (PD3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2092
NASA FMEA #: 0405-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2092
ITEM: LH2 RECIRCULATION DISCONNECT VALVE (PD3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RELIEF VALVE (RV7) PROVIDES REDUNDANCY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-17-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88 NASA DATA:
ASSESSMENT ID: MPS-2093 BASELINE [ ]
NASA FMEA #: 0405-6 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2093
ITEM: LH2 RECIRCULATION DISCONNECT VALVE (PD3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2094
NASA FMEA #: 0405-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2094
ITEM: LH2 RECIRCULATION DISCONNECT VALVE (PD3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2094A
NASA FMEA #: 0405-10

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2094
ITEM: LH2 RECIRCULATION DISCONNECT VALVE (PD3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2101
NASA FMEA #: 0403-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2101
ITEM: LH2 RECIRCULATION PUMP VALVE (PV14, PV15, PV16)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2102
NASA FMEA #: 0403-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2102
ITEM: LH2 RECIRCULATION PUMP VALVE (PV14, PV15, PV16)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA 2/1R CRITICALITY APPLIES TO ABORT ONLY. THE SECOND FAILURE CITED (FEED LINE LEAK) IS NOT A REDUNDANCY TO THE VALVE. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-12-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2103
NASA FMEA #: 0403-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2103
ITEM: LH2 RECIRCULATION PUMP VALVE (PV14, PV15, PV16)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2111
NASA FMEA #: 0309-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2111
ITEM: LH2 PRESTART CONDITIONING MANIFOLD (MA3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2112
NASA FMEA #: 0309-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2112
ITEM: LH2 PRESTART CONDITIONING MANIFOLD (MA3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2113
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2113
ITEM: LH2 PRESTART CONDITIONING MANIFOLD (MA3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2114
NASA FMEA #: 0309-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2114
ITEM: LH2 PRESTART CONDITIONING MANIFOLD (MA3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2121
NASA FMEA #: 0421-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2121
ITEM: LH2 PRESTART CONDITIONING PUMP LINE (FH11, FH13, FH15)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 4-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2122
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2122
ITEM: LH2 PRESTART CONDITIONING PUMP LINE (FH11, FH13, FH15)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88 NASA DATA:
ASSESSMENT ID: MPS-2123 BASELINE [ ]
NASA FMEA #: 0421-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2123
ITEM: LH2 PRESTART CONDITIONING PUMP LINE (FH11, FH13, FH15)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2131
NASA FMEA #: 0425-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2131
ITEM: LH2 PRESTART CONDITIONING RETURN LINE (FH12, FH14, FH16)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 4-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2132
NASA FMEA #: 0425-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2132
ITEM: LH2 PRESTART CONDITIONING RETURN LINE (FH12, FH14, FH16)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 4-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2133
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2133
ITEM: LH2 PRESTART CONDITIONING RETURN LINE (FH12, FH14, FH16)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88 NASA DATA:
ASSESSMENT ID: MPS-2134 BASELINE [ ]
NASA FMEA #: 0425-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2134
ITEM: LH2 PRESTART CONDITIONING RETURN LINE (FH12, FH14, FH16)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3] [NA] [NA] [NA] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2141
NASA FMEA #: 0309-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2141
ITEM: LH2 PRESTART CONDITIONING REPLENISH LINE (FH17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88 NASA DATA:
ASSESSMENT ID: MPS-2142 BASELINE [ ]
NASA FMEA #: NA NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2142
ITEM: LH2 PRESTART CONDITIONING REPLENISH LINE (FH17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2143
NASA FMEA #: 0309-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2143
ITEM: LH2 PRESTART CONDITIONING REPLENISH LINE (FH17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2151
NASA FMEA #: 0309-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2151
ITEM: LH2 PRESTART CONDITIONING RETURN LINE (FH18)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2152
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2152
ITEM: LH2 PRESTART CONDITIONING RETURN LINE (FH18)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88 NASA DATA:
ASSESSMENT ID: MPS-2153 BASELINE [ ]
NASA FMEA #: 0309-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2153
ITEM: LH2 PRESTART CONDITIONING RETURN LINE (FH18)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2161
NASA FMEA #: 0411-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2161
ITEM: LH2 RECIRCULATION MANIFOLD RELIEF VALVE (RV7)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
PROPELLANT BLEED VLAVES PROVIDE A REDUNDANT RELIEF PATH.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2162
NASA FMEA #: 0411-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2162
ITEM: LH2 RECIRCULATION MANIFOLD RELIEF VALVE (RV7)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA CIL WORKSHEET OF 11-13-87 INDICATES A 3/3 CRITICALITY WHILE RI/NASA CIL OF 12-23-87 SHOWS 2/1R. NO SUPPORTTING RATIONALE AVAILABLE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2163
NASA FMEA #: 0411-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2163
ITEM: LH2 RECIRCULATION MANIFOLD RELIEF VALVE (RV7)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-13-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2164
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2164
ITEM: LH2 RECIRCULATION MANIFOLD RELIEF VALVE (RV7)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2171
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2171
ITEM: LH2 RECIRCULATION PUMP (PP1, PP2, PP3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2172
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2172
ITEM: LH2 RECIRCULATION PUMP (PP1, PP2, PP3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2173
NASA FMEA #: 0404-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2173
ITEM: LH2 RECIRCULATION PUMP (PP1, PP2, PP3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2174
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2174
ITEM: LH2 RECIRCULATION PUMP (PP1, PP2, PP3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2175
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2175
ITEM: LH2 RECIRCULATION PUMP (PP1, PP2, PP3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2176
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2176
ITEM: LH2 RECIRCULATION PUMP (PP1, PP2, PP3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2177
NASA FMEA #: 0404-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2177
ITEM: LH2 RECIRCULATION PUMP (PP1, PP2, PP3)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-12-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88 NASA DATA:
ASSESSMENT ID: MPS-2181 BASELINE [ ]
NASA FMEA #: 0502-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2181
ITEM: LH2 PRE-PRESS CHECK VALVE (CV17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2182
NASA FMEA #: 0502-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2182
ITEM: LH2 PRE-PRESS CHECK VALVE (CV17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[F]	[X] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88 NASA DATA:
ASSESSMENT ID: MPS-2183 BASELINE [ ]
NASA FMEA #: 0502-3 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2183
ITEM: LH2 PRE-PRESS CHECK VALVE (CV17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ]
(ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2191
NASA FMEA #: 0505-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2191
ITEM: GH2 PRESSURIZATION ISOLATION CHECK VALVE
(CV21,CV22,CV23)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2192
NASA FMEA #: 0505-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2192
ITEM: GH2 PRESSURIZATION ISOLATION CHECK VALVE (CV21,CV22,CV23 AND TEST PORTS TP5,TP6,TP7)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2201
NASA FMEA #: 0504-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2201
ITEM: GH2 PRESSURIZATION FLOW CONTROL VALVE
(LV56,LV57,LV58)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[P]	[F]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2202
NASA FMEA #: 0504-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2202
ITEM: GH2 PRESSURIZATION FLOW CONTROL VALVE (LV56,LV57,LV58)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[P]	[F]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2203
NASA FMEA #: 0504-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2203
ITEM: GH2 PRESSURIZATION FLOW CONTROL VALVE (LV56,LV57,LV58)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88 NASA DATA:
ASSESSMENT ID: MPS-2211 BASELINE [ ]
NASA FMEA #: 0503-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2211
ITEM: GH2 PRESSURIZATION DISCONNECT (PD5)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2211A
NASA FMEA #: 0503-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2211
ITEM: GH2 PRESSURIZATION DISCONNECT (PD5)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE IOA CRITICALITY WAS DRIVEN BY THE FAILURE TO REMAIN OPEN.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88 NASA DATA:
ASSESSMENT ID: MPS-2212 BASELINE [ ]
NASA FMEA #: 0503-5 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2212
ITEM: GH2 PRESSURIZATION DISCONNECT (PD5)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 1/29/88
ASSESSMENT ID: MPS-2213
NASA FMEA #: 0503-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2213
ITEM: GH2 PRESSURIZATION DISCONNECT (PD5)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88 NASA DATA:
ASSESSMENT ID: MPS-2213A BASELINE [ ]
NASA FMEA #: 0503-7 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2213
ITEM: GH2 PRESSURIZATION DISCONNECT (PD5)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2221
NASA FMEA #: 0501-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2221
ITEM: LH2 TANK GROUND PRE-PRESS DISCONNECT (PD10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2222
NASA FMEA #: 0501-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2222
ITEM: LH2 TANK GROUND PRE-PRESS DISCONNECT (PD10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[F]	[X] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2222A
NASA FMEA #: 0501-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2222
ITEM: LH2 TANK GROUND PRE-PRESS DISCONNECT (PD10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[N /]	[ ]	[ ]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS ADDRESSES FAILURE DURING LOADING ONLY. AN ANALYSIS FOR THE PRELAUNCH PHASE ONLY IS NOT NECESSARY. THE 0501-2 FMEA/CIL SHOULD BE COMBINED WITH 0501-4.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88 NASA DATA:
ASSESSMENT ID: MPS-2222B BASELINE [ ]
NASA FMEA #: 0501-4 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2222
ITEM: LH2 TANK GROUND PRE-PRESS DISCONNECT (PD10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[/]	[ ]	[ ]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2231
NASA FMEA #: 0516-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2231
ITEM: GH2 PRESSURIZATION MANIFOLD TEST POINT COUPLING
(PD16)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[F]	[F]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE FAILURE MODE SPECIFIES LEAKAGE WHICH IS PRESUMED TO BE AN EXTERNAL LEAKAGE CAUSED BY A SINGLE FAILURE. THIS ANALYSIS SHOULD BE REVISED OR DELETED.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88 NASA DATA:
ASSESSMENT ID: MPS-2231A BASELINE [ ]
NASA FMEA #: 0516-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2231
ITEM: GH2 PRESSURIZATION MANIFOLD TEST POINT COUPLING (PD16)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2241
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2241
ITEM: LH2 PREPRESSURIZATION DISCONNECT CHECK VALVE TEST PORT (TP10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE LINE FROM CV17 TO PD10, ON IOA WORKSHEET 346; RI/NASA 0511-1.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2251
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2251
ITEM: GH2 PRESSURIZATION DUAL CHECK VALVE TEST PORT (TP21,TP22,TP23)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE CHECK VALVE (CV21, 22, 23), ON IOA WORKSHEET 2192; RI/NASA 0505-4.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2261
NASA FMEA #: 0407-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2261
ITEM: LH2 FEED DISCONNECT VALVE (PD2)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88 NASA DATA:
ASSESSMENT ID: MPS-2261A BASELINE [ ]
NASA FMEA #: 0407-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2261
ITEM: LH2 FEED DISCONNECT VALVE (PD2)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE CRITICALITY DETERMINED ON IOA 2261 WAS DRIVEN BY THE FAILURE TO REMAIN OPEN, NOT THE FAILURE TO OPEN.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2262
NASA FMEA #: 0407-7

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2262
ITEM: LH2 FEED DISCONNECT VALVE (PD2)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2262A
NASA FMEA #: 0407-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2262
ITEM: LH2 FEED DISCONNECT VALVE (PD2)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2263
NASA FMEA #: 0407-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2263
ITEM: LH2 FEED DISCONNECT VALVE (PD2)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88 NASA DATA:
ASSESSMENT ID: MPS-2263A BASELINE [ ]
NASA FMEA #: 0407-11 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2263
ITEM: LH2 FEED DISCONNECT VALVE (PD2)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2271
NASA FMEA #: 0402-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2271
ITEM: LH2 PREVALVE (PV4,PV5,PV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2271A
NASA FMEA #: 0402-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2271
ITEM: LH2 PREVALVE (PV4,PV5,PV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE IOA CRITICALITY WAS DRIVEN BY THE FAILURE TO REMAIN OPEN. FAILURE TO OPEN FOR LH2 DUMP HAS REDUNDANCY, THIS CIL WORKSHEET SHOULD ADDRESS PRELAUNCH FAILURE ALSO.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2272
NASA FMEA #: 0402-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2272
ITEM: LH2 PREVALVE (PV4,PV5,PV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
INTERFACING SUBSYSTEMS (MFV) ARE ASSUMED TO BE OPERATING WITHIN TOLERANCE (NSTS 22206, 2.3.2d). FAILURE HAS NO EFFECT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2273
NASA FMEA #: 0402-10

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2273
ITEM: LH2 PREVALVE (PV4,PV5,PV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2274
NASA FMEA #: 0402-8

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2274
ITEM: LH2 PREVALVE (PV4,PV5,PV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE PREVALVE HAS TWO RELIEF PATHS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2275
NASA FMEA #: 0402-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2275
ITEM: LH2 PREVALVE (PV4,PV5,PV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2281
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2281
ITEM: LH2 17 INCH ORBITER DISCONNECT TEST PORT
(TP11,TP12)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER EXTERNAL LEAKAGE OF THE DISCONNECT (RI/NASA 0407-4, 0407-11 AND IOA 2263).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2291
NASA FMEA #: 0416-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2291
ITEM: LH2 FEEDLINE MANIFOLD (MA2)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2292
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2292
ITEM: LH2 FEEDLINE MANIFOLD (MA2)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE WILL PREVENT TANK FILL OR ENGINE START. NO LOSS OF CREW OR VEHICLE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2293
NASA FMEA #: 0416-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2293
ITEM: LH2 FEEDLINE MANIFOLD (MA2)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2301
NASA FMEA #: 0415-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2301
ITEM: LH2 17 INCH FEEDLINE (FH7)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2302
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2302
ITEM: LH2 17 INCH FEEDLINE (FH7)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE WILL PREVENT TANK FILL, TEMPERATURE CONDITIONING OR ENGINE START. NO LOSS OF CREW OR VEHICLE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2303
NASA FMEA #: 0415-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2303
ITEM: LH2 17 INCH FEEDLINE (FH7)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88 NASA DATA:
ASSESSMENT ID: MPS-2311 BASELINE [ ]
NASA FMEA #: 0417-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2311
ITEM: LH2 12 INCH FEEDLINE (FH8,FH9,FH10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2312
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2312
ITEM: LH2 12 INCH FEEDLINE (FH8,FH9,FH10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE WILL PREVENT TEMPERATURE CONDITIONING AND ENGINE START.
NO LOSS OF CREW OR VEHICLE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2313
NASA FMEA #: 0417-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2313
ITEM: LH2 12 INCH FEEDLINE (FH8,FH9,FH10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2321
NASA FMEA #: 0437-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2321
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE (PV8)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-20-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2322
NASA FMEA #: 0437-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2322
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE (PV8)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
IOA CRITICALITY WAS DRIVEN BY THE FAILURE TO REMAIN CLOSED. NO LOSS OF CREW OR VEHICLE FOR FAILURE TO CLOSE.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2322A
NASA FMEA #: 0437-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2322
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE (PV8)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

RECOMMENDATIONS: (If different from NASA)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RELIEF VALVE WILL NOT CRACK AT NORMAL OPERATING PRESSURE. TWO FAILURES ARE REQUIRED TO CAUSE LOSS OF CREW OR VEHICLE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 4-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88 NASA DATA:
ASSESSMENT ID: MPS-2323 BASELINE [ ]
NASA FMEA #: 0437-8 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2323
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE (PV8)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-20-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2331
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2331
ITEM: LH2 FEEDLINE RELIEF LINE TEST PORT (TP25)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE RELIEF LINE ON IOA WORKSHEET 340 AND RI/NASA CIL WORKSHEET 0423-1.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88 NASA DATA:
ASSESSMENT ID: MPS-2341 BASELINE [ ]
NASA FMEA #: 0436-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2341
ITEM: LH2 FEEDLINE MANIFOLD RELIEF VALVE (RV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ]
(ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-5-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/01/88
ASSESSMENT ID: MPS-2342
NASA FMEA #: 0436-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2342
ITEM: LH2 FEEDLINE MANIFOLD RELIEF VALVE (RV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE OF BOTH THE RELIEF VALVE AND THE ISOLATION VALVE WILL ALLOW LEAKAGE OF LH2 RESULTING IN POSSIBLE LOSS OF CREW/VEHICLE. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-5-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2342A
NASA FMEA #: 0436-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2342
ITEM: LH2 FEEDLINE MANIFOLD RELIEF VALVE (RV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS INDICATES A CRITICALITY OF 1/1 FOR ABORT. IOA CONCURS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-20-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2343
NASA FMEA #: 0436-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2343
ITEM: LH2 FEEDLINE MANIFOLD RELIEF VALVE (RV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LH2 FROM THE SENSE LINE WILL LEAK UPON FIRST FAILURE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-20-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2343A
NASA FMEA #: 0436-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2343
ITEM: LH2 FEEDLINE MANIFOLD RELIEF VALVE (RV6)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS RI/NASA ANALYSIS SHOULD BE COMBINED WITH 0436-5.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-20-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2351
NASA FMEA #: 0608-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2351
ITEM: LH2 DUMP PRESSURIZATION ORIFICE (RP10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RELIEF SYSTEMS ARE NOT REDUNDANT TO THE ORIFICE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2352
NASA FMEA #: 0608-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2352
ITEM: LH2 DUMP PRESSURIZATION ORIFICE (RP10)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2361
NASA FMEA #: 0435-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2361
ITEM: LH2 FEEDLINE RELIEF FLAME ARRESTOR (FL1)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS IS FOR A COMPLETE BLOCKAGE OF FLOW.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-21-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2371
NASA FMEA #: 0512-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2371
ITEM: LH2 PRESSURIZATION LINE VENT VALVE (LV52)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88 NASA DATA:
ASSESSMENT ID: MPS-2372 BASELINE [ ]
NASA FMEA #: 0512-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2372
ITEM: LH2 PRESSURIZATION LINE VENT VALVE (LV52)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88 NASA DATA:
ASSESSMENT ID: MPS-2373 BASELINE [ ]
NASA FMEA #: 0512-3 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2373
ITEM: LH2 PRESSURIZATION LINE VENT VALVE (LV52)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ]
(ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2381
NASA FMEA #: 0651-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2381
ITEM: LH2 FEED RTLS INBOARD VALVE (PV17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
BOTH IOA AND RI/NASA INDICATE A CRITICALITY OF 1/1 FOR RTLS ABORT.
REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2382
NASA FMEA #: 0651-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2382
ITEM: LH2 FEED RTLS INBOARD VALVE (PV17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[/]	[ ]	[ ]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2382A
NASA FMEA #: 0651-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2382
ITEM: LH2 FEED RTLS INBOARD VALVE (PV17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[F]	[X] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.
IOA CRITICALITY WAS DRIVEN BY FAILURE TO REMAIN CLOSED DURING ASCENT. FAILURE TO CLOSE POST-MECO HAS NO EFFECT ON A NOMINAL MISSION. ENTRY REPRESS IS NONESSENTIAL. CRITICALITY 2/1R FOR ABORT ONLY.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2383
NASA FMEA #: 0651-9

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2383
ITEM: LH2 FEED RTLS INBOARD VALVE (PV17)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2391
NASA FMEA #: 0651-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2391
ITEM: LH2 FEED RTLS OUTBOARD VALVE (PV18)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
BOTH IOA AND RI/NASA INDICATE A CRITICALITY OF 1/1 FOR ABORT. REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2392
NASA FMEA #: 0651-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2392
ITEM: LH2 FEED RTLS OUTBOARD VALVE (PV18)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[/]	[ ]	[ ]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2392A
NASA FMEA #: 0651-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2392
ITEM: LH2 FEED RTLS OUTBOARD VALVE (PV18)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[F]	[X] *
IOA	[2 /1R]	[P]	[F]	[F]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.
IOA CRITICALITY WAS DRIVEN BY FAILURE TO REMAIN CLOSED DURING ASCENT. FAILURE TO CLOSE POST-MECO HAS NO EFFECT ON A NOMINAL MISSION. ENTRY REPRESS IS NONESSENTIAL. CRITICALITY IS 2/1R FOR ABORT ONLY.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/02/88
ASSESSMENT ID: MPS-2393
NASA FMEA #: 0651-9

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 2393
ITEM: LH2 FEED RTLS OUTBOARD VALVE (PV18)

LEAD ANALYST: W.J.MCNICOLL

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3010
NASA FMEA #: 0202-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3010
ITEM: ENGINE HELIUM SUPPLY CHECK VALVE (CV1,CV2,CV3)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[F]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[/N]	[ ]	[ ]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
A SINGLE ENGINE SHUTDOWN WILL CAUSE AN INTACT ABORT. NO LOSS OF CREW OR VEHICLE. NSTS 22206 2.3.3L REQUIRES ASSIGNMENT OF 3/1R. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3011
NASA FMEA #: 0202-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3011
ITEM: ENGINE HELIUM SUPPLY CHECK VALVE (CV1,CV2,CV3)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3020
NASA FMEA #: 0201-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3020
ITEM: HELIUM SUPPLY DISCONNECT(ORB/GND, ORB HALF), (PD8)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[F]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[/N]	[ ]	[ ]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE (CV1, 2, 3) WILL CAUSE LOSS OF HELIUM AND AN ENGINE SHUTDOWN. FAILURE OF ANOTHER CHECK VALVE WILL CAUSE A SECOND ENGINE SHUTDOWN AND LOSS OF VEHICLE. SCREEN C SHOULD PASS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3021
NASA FMEA #: 0201-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3021
ITEM: HELIUM SUPPLY DISCONNECT (ORB/GND, ORB HALF), (PD8)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[F]	[P]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE (CV1, 2, 3 FAIL TO CHECK) WILL CAUSE LOSS OF HELIUM AND AN ENGINE SHUTDOWN. FAILURE OF ANOTHER CHECK VALVE WILL CAUSE A SECOND ENGINE SHUTDOWN AND LOSS OF VEHICLE.
ANALYSIS 0201-3 COULD BE COMBINE WITH 0201-4.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3021A
NASA FMEA #: 0201-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3021
ITEM: HELIUM SUPPLY DISCONNECT (ORB/GND, ORB HALF), (PD8)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /1R] [P] [F] [P] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE (CV1, 2, 3 FAIL TO CHECK) WILL CAUSE LOSS OF HELIUM AND AN ENGINE SHUTDOWN. FAILURE OF ANOTHER CHECK VALVE WILL CAUSE A SECOND ENGINE SHUTDOWN AND LOSS OF VEHICLE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3030
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3030
ITEM: TEST PORT (TP8)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER RI/NASA 0234-1 AND IOA 4620, RUPTURE OF THE HELIUM FILL LINE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3040
NASA FMEA #: 0256-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3040
ITEM: 17.3 CU. FT. HELIUM SUPPLY TANK (TK6, 8, 10)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3050
NASA FMEA #: 0203-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3050
ITEM: 4.7 CU. FT. HELIUM SUPPLY TANK (TK1,2,3,7,9,11)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3050A
NASA FMEA #: 0203-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3050
ITEM: 4.7 CU. FT. HELIUM SUPPLY TANK (TK1,2,3,7,9,11)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[P]	[P]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS RI/NASA ANALYSIS SHOULD BE COMBINED WITH 0203-2. POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3050B
NASA FMEA #: 0257-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3050
ITEM: 4.7 CU. FT. HELIUM SUPPLY TANK (TK1,2,3,7,9,11)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3060
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3060
ITEM: PRESSURE TAP PORT (TP26,27,28)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER RI/NASA 0252-1 AND IOA 4620, RUPTURE OF THE INTERCONNECT LINE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3070
NASA FMEA #: 0258-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3070
ITEM: ENGINE HELIUM SUPPLY CHECK VALVE (CV25,26;36,37;41,42)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SINGLE FAILURE WILL HAVE NO EFFECT. LEAKAGE OF UPSTREAM LINE IS A SINGLE FAILURE POINT.
REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3070A
NASA FMEA #: 0258-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3070
ITEM: ENGINE HELIUM SUPPLY CHECK VALVE
(CV25,26;36,37;41,42)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE VALVE IS NOT REQUIRED TO REMAIN CLOSED.
REF: RI/NASA OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3071
NASA FMEA #: 0258-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3071
ITEM: ENGINE HELIUM SUPPLY CHECK VALVE (CV25,26;36,37;41,42)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[F]	[P]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE OF BOTH CHECK VALVES IN AN ENGINE SYSTEM WILL CAUSE ENGINE SHUTDOWN AND LOSS OF MISSION. NSTS 22206 2.3.3L REQUIRES ASSIGNMENT OF 3/1R.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3080
NASA FMEA #: 0242-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3080
ITEM: ENGINE HELIUM SUPPLY FILTER - PANEL A;B
(FL2,6;3,7;4,8)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[/N]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF REDUNDANCY RESULTS IN SHUTDOWN OF ONE ENGINE AND LOSS OF MISSION. NSTS 22206 2.3.3L REQUIRES ASSIGNMENT OF 3/1R.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88 NASA DATA:
ASSESSMENT ID: MPS-3081 BASELINE [ ]
NASA FMEA #: 0242-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3081
ITEM: ENGINE HELIUM SUPPLY FILTER - PANEL A;B
(FL2,6;3,7;4,8)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /2R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

RECOMMENDATIONS: (If different from NASA)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SINGLE FAILURE CAN CAUSE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3082
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3082
ITEM: ENGINE HELIUM SUPPLY FILTER - PANEL A;B
(FL2,6;3,7;4,8)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[2 /2]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3090
NASA FMEA #: 0204-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3090
ITEM: ENGINE HELIUM SUPPLY ISOLATION VALVE
(LV1,2;3,4;5,6)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE IOA CRITICALITY WAS DRIVEN BY THE FAILURE TO REMAIN OPEN. NO EFFECT OF FAILURE TO OPEN.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3090A
NASA FMEA #: 0204-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3090
ITEM: ENGINE HELIUM SUPPLY ISOLATION VALVE
(LV1,2;3,4;5,6)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[/N]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[P]	[P]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE WILL CAUSE ENGINE SHUTDOWN AND LOSS OF MISSION.
NSTS 22206 2.3.3L REQUIRES ASSIGNMENT OF 3/1R.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88 NASA DATA:
ASSESSMENT ID: MPS-3091 BASELINE [ ]
NASA FMEA #: 0204-3 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3091
ITEM: ENGINE HELIUM SUPPLY ISOLATION VALVE
(LV1,2;3,4;5,6)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3092
NASA FMEA #: 0204-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3092
ITEM: ENGINE HELIUM SUPPLY ISOLATION VALVE
(LV1,2;3,4;5,6)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

	[2 /2]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE WILL CAUSE ENGINE SHUTDOWN AND LOSS OF MISSION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3092A
NASA FMEA #: 0204-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3092
ITEM: ENGINE HELIUM SUPPLY ISOLATION VALVE
(LV1,2;3,4;5,6)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3110
NASA FMEA #: 0205-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3110
ITEM: ENGINE HELIUM PRESSURE REGULATOR (PR1,7;2,8;3,9)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[/N]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[P]	[P]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE WILL CAUSE ENGINE SHUTDOWN AND LOSS OF MISSION.
NSTS 22206 2.3.3L REQUIRES ASSIGNMENT OF 3/1R.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88 NASA DATA:
ASSESSMENT ID: MPS-3110A BASELINE [ ]
NASA FMEA #: 0205-3 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3110
ITEM: ENGINE HELIUM PRESSURE REGULATOR (PR1,7;2,8;3,9)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[N /N]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[P]	[P]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE WILL CAUSE ENGINE SHUTDOWN AND LOSS OF MISSION.
NSTS 22206 2.3.3L REQUIRES ASSIGNMENT OF 3/1R.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3111
NASA FMEA #: 0205-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3111
ITEM: ENGINE HELIUM PRESSURE REGULATOR (PR1,7;2,8;3,9)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
HELIUM ESCAPING THROUGH THE RELIEF VALVE CAN OVERPRESSURIZE THE AFT COMPARTMENT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3112
NASA FMEA #: 0205-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3112
ITEM: ENGINE HELIUM PRESSURE REGULATOR (PR1,7;2,8;3,9)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3120
NASA FMEA #: 0206-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3120
ITEM: ENGINE HE RELIEF VALVE PANEL A;B
(RV1,8;2,9;3,10)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

	[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION (1/1). POSSIBLE ENGINE SHUTDOWN CAUSED BY LOSS OF HELIUM (2/2).
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3120A
NASA FMEA #: 0206-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3120
ITEM: ENGINE HE RELIEF VALVE PANEL A;B
(RV1,8;2,9;3,10)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

	[1 /1]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION (1/1).
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3121
NASA FMEA #: 0206-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3121
ITEM: ENGINE HE RELIEF VALVE PANEL A;B
(RV1,8;2,9;3,10)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION (1/1).
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3122
NASA FMEA #: 0206-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3122
ITEM: ENGINE HE RELIEF VALVE PANEL A;B
(RV1,8;2,9;3,10)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[NA]	[P]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[/N]	[N]	[ ]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION UPON SECOND FAILURE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3123
NASA FMEA #: 0206-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3123
ITEM: ENGINE HE RELIEF VALVE PANEL A;B
(RV1,8;2,9;3,10)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3130
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3130
ITEM: ENGINE HELIUM SUPPLY RELIEF VALVE SENSE LINE

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[1 /1]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88
ASSESSMENT ID: MPS-3140
NASA FMEA #: 0207-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3140
ITEM: ENGINE REG OUTLET CHECK VLV (CV5,29;6,40;7,45)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[F]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE HAS NO EFFECT. THE CHECK VALVE CANNOT PROTECT AGAINST AN UPSTREAM LEAK.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/03/88 NASA DATA:
ASSESSMENT ID: MPS-3141 BASELINE [ ]
NASA FMEA #: 0207-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3141
ITEM: ENGINE REG OUTLET CHECK VLV (CV5,29;6,40;7,45)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LAUNCH SCRUB.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3150
NASA FMEA #: 0260-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3150
ITEM: ENGINE HELIUM SUPPLY INTERCONNECT INLET VALVE (LV59,61,63)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /1R]	[F]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
INTERCONNECT IN VALVE MAY NEED TO BE OPENED DURING ASCENT DUE TO A FAILURE IN AN ENGINE HELIUM SYSTEM. FAILURE WILL CAUSE AN ENGINE TO SHUTDOWN DUE TO LACK OF HELIUM PURGE. LOSS OF MISSION.
NSTS 22206 2.3.3L REQUIRES ASSIGNMENT OF 3/1R.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3151
NASA FMEA #: 0260-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3151
ITEM: ENGINE HELIUM SUPPLY INTERCONNECT INLET VALVE (LV59,61,63)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE HAS NO EFFECT. THE VALVE HAS NO REDUNDANCY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3152
NASA FMEA #: 0260-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3152
ITEM: ENGINE HELIUM SUPPLY INTERCONNECT INLET VALVE (LV59,61,63)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION. THIS RI/NASA ANALYSIS COULD BE COMBINED WITH 0260-4.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88 NASA DATA:
ASSESSMENT ID: MPS-3152A BASELINE [ ]
NASA FMEA #: 0260-4 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3152
ITEM: ENGINE HELIUM SUPPLY INTERCONNECT INLET VALVE (LV59,61,63)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3160
NASA FMEA #: 0262-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3160
ITEM: ENGINE HELIUM SUPPLY INTERCONNECT OUTLET VALVE (LV60,62,64)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS INDICATES 3/1R FOR ABORT. NO SUPPORTING RATIONALE IS AVAILABLE AND IOA DOES NOT AGREE.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3161
NASA FMEA #: 0262-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3161
ITEM: ENGINE HELIUM SUPPLY INTERCONNECT OUTLET VALVE (LV60,62,64)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3162
NASA FMEA #: 0262-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3162
ITEM: ENGINE HELIUM SUPPLY INTERCONNECT OUTLET VALVE (LV60,62,64)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[1 /1] [NA] [NA] [NA] [A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA INDICATES 1/1 FOR ABORT ONLY. POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3162A
NASA FMEA #: 0262-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3162
ITEM: ENGINE HELIUM SUPPLY INTERCONNECT OUTLET VALVE (LV60,62,64)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3162B
NASA FMEA #: 0262-6

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3162
ITEM: ENGINE HELIUM SUPPLY INTERCONNECT OUTLET VALVE (LV60,62,64)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3170
NASA FMEA #: 0261-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3170
ITEM: ENGINE HELIUM INTERCONNECT CHECK VALVE-PANEL OUTLET (CV28,39,44)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE WILL HAVE NO EFFECT.
REF: RI/NASA OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3171
NASA FMEA #: 0261-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3171
ITEM: ENGINE HELIUM INTERCONNECT CHECK VALVE-PANEL OUTLET (CV28,39,44)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3180
NASA FMEA #: 0259-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3180
ITEM: ENGINE HELIUM INTERCONNECT CHECK VALVE-PANEL INLET (CV27,38,43)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE WILL HAVE NO EFFECT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3181
NASA FMEA #: 0259-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3181
ITEM: ENGINE HELIUM INTERCONNECT CHECK VALVE-PANEL INLET (CV27,38,43)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3190
NASA FMEA #: 0409-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3190
ITEM: MAIN ENGINE GN2 PURGE DISCONNECT (ORB HALF) (PD14)

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS ADDRESSED ON IOA WORKSHEET 4660 AND 4666. THIS DUPLICATE ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-3200
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 3200
ITEM: FACILITY PORTS

LEAD ANALYST: M.L.MCNEELY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE LINE (IOA 443, RI/NASA 0235-1).

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4010
NASA FMEA #: 0202-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4010
ITEM: PNEU VALVE HE SUPPLY CHECK VALVE (CV4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[F]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[/N]	[ ]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[P]	[P]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE (PD8) WILL ALLOW PNEUMATIC HELIUM TO LEAK AWAY. PNEUMATIC ACCUMULATORS WILL RETAIN PRESSURE TO CLOSE PREVALVES. THE CORSSOVER VALVE WILL PROVIDE HELIUM FOR SUBSEQUENT VALVE OPERATIONS. FAILURE OF ANOTHER HELIUM SUPPLY CHECK VALVE WILL DEPLETE ENGINE HELIUM SUPPLIES AND VALVE OPERATIONS WILL BE IMPOSSIBLE. RELIEF SYSTEM WILL PROTECT AGAINST MANIFOLD RUPTURE, BUT VENTING HYDROGEN IS A FIRE HAZARD DURING ENTRY/LANDING.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88 NASA DATA:
ASSESSMENT ID: MPS-4011 BASELINE [ ]
NASA FMEA #: 0202-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4011
ITEM: PNEU VALVE HE SUPPLY CHECK VALVE (CV4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[P]	[P]	[P]	[ ]
COMPARE	[/]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88 NASA DATA:
ASSESSMENT ID: MPS-4020 BASELINE [ ]
NASA FMEA #: 0241-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4020
ITEM: PNEU VALVE HE REG OUTLET CHECK VALVE (CV8)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /1R]	[P]	[P]	[P]	[ ]
COMPARE	[/]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /1R] [P] [P] [P] [D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
HELIUM TANK PRESSURE DISPLAY SUPPORTS PASSAGE OF SCREEN B. FOUR FAILURES (CV8, CV9, CV4, PD8) WILL CAUSE LOSS OF PNEUMATIC HELIUM AND INABILITY TO CLOSE PREVALVES.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4021
NASA FMEA #: 0241-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4021
ITEM: PNEU VALVE HE ISOLATION CHECK VALVE (CV8)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[P]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE (LV10) WILL PREVENT VALVE OPERATIONS FOR DUMP. VENTING HYDROGEN WILL CREATE A FIRE HAZARD DURING ENTRY/LANDING. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88 NASA DATA:
ASSESSMENT ID: MPS-4021A BASELINE [ ]
NASA FMEA #: 0241-3 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4021
ITEM: PNEU VALVE HE ISOLATION CHECK VALVE (CV8)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4030
NASA FMEA #: 0209-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4030
ITEM: PNEU VALVE HE ISOLATION CHECK VALVE (CV9)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
ACCUMULATORS WILL SUPPLY HELIUM PRESSURE FOR MECO. MAY NOT BE ABLE TO OPEN PREVALVES FOR DUMP. FILL AND DRAIN VALVES ARE ON OTHER HELIUM PREVALVES FOR DUMP. FILL AND DRAIN VALVES ARE ON OTHER HELIUM LEG, SO WILL BE OPERATIONAL. INEFFICIENT DUMP DUE TO PREVALVE INOPERABILITY, BUT RELIEF SYSTEM AND INERTING WILL PROTECT AGAINST MANIFOLD RUPTURE. NO REDUNDANCY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4030A
NASA FMEA #: 0209-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4030
ITEM: PNEU VALVE HE ISOLATION CHECK VALVE (CV9)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4031
NASA FMEA #: 0209-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4031
ITEM: PNEU VALVE HE ISOLATION CHECK VALVE (CV9)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[N /N]	[ ]	[N]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[P]	[P]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE OF CV8 AND RV4 TO REMAIN CLOSED IN ADDITION TO CV9 FAILURE WILL ALLOW PNEUMATIC PRESSURE TO ESCAPE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88 NASA DATA:
ASSESSMENT ID: MPS-4040 BASELINE [ ]
NASA FMEA #: 0631-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4040
ITEM: GO2 PRESS MANIF REPRESS CHECK VALVE (CV10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LINE RUPTURE IS NOT VALID AS A LOSS OF REDUNDANCY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4040A
NASA FMEA #: 0631-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4040
ITEM: GO2 PRESS MANIF REPRESS CHECK VALVE (CV10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88 NASA DATA:
ASSESSMENT ID: MPS-4041 BASELINE [ ]
NASA FMEA #: 0631-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4041
ITEM: GO2 PRESS MANIF REPRESS CHECK VALVE (CV10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4050
NASA FMEA #: 0603-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4050
ITEM: LO2 FEED MANIF REPRESS CHECK VALVE (CV12)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LINE RUPTURE IS NOT VALID AS A LOSS OF REDUNDANCY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4050A
NASA FMEA #: 0603-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4050
ITEM: LO2 FEED MANIF REPRESS CHECK VALVE (CV12)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4051
NASA FMEA #: 0603-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4051
ITEM: LO2 FEED MANIF REPRESS CHECK VALVE (CV12)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
HELIUM PRESSURE IS NOT REQUIRED FOR DUMP. RELIEF SYSTEM AND INERTING WILL PROTECT AGAINST MANIFOLD RUPTURE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4060
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4060
ITEM: GH2 PRESS MANIF REPRESS CHECK VALVE (CV13)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4060A
NASA FMEA #: 0605-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4060
ITEM: GH2 PRESS MANIF REPRESS CHECK VALVE (CV13)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88 NASA DATA:
ASSESSMENT ID: MPS-4061 BASELINE [ ]
NASA FMEA #: 0605-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4061
ITEM: GH2 PRESS MANIF REPRESS CHECK VALVE (CV13)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4070
NASA FMEA #: 0632-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4070
ITEM: LH2 RECIRC MANIF REPRESS CHECK VALVE (CV14)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LINE RUPTURE IS NOT VALID AS LOSS OF REDUNDANCY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4070A
NASA FMEA #: 0632-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4070
ITEM: LH2 RECIRC MANIF REPRESS CHECK VALVE (CV14)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/04/88
ASSESSMENT ID: MPS-4071
NASA FMEA #: 0632-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4071
ITEM: LH2 RECIRC MANIF REPRESS CHECK VALVE (CV14)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RELIEF VALVE RV7 IS NOT REDUNDANT TO THE CHECK VALVE. FAILURE HAS NO EFFECT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88 NASA DATA:
ASSESSMENT ID: MPS-4080 BASELINE [ ]
NASA FMEA #: 0630-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4080
ITEM: LH2 FEED MANIF NOM REPRESS CHECK VALVE (CV15)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LINE RUPTURE IS NOT VALID AS A LOSS OF REDUNDANCY. FAILURE HAS NO EFFECT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL&a4248HRHEEEWNG NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4080A
NASA FMEA #: 0630-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4080
ITEM: LH2 FEED MANIF NOM REPRESS CHECK VALVE (CV15)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4081
NASA FMEA #: 0630-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4081
ITEM: LH2 FEED MANIF NOM REPRESS CHECK VALVE (CV15)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
DEGRADED DUMP. MPS INERTING WILL CLEAR REMAINING LH2. RELIEF SYSTEM WILL PROTECT AGAINST MANIFOLD RUPTURE. NO REDUNDANCY. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4090
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4090
ITEM: LO2 TANK PRE-PRESS CHECK VALVE (CV16)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ITEM IS ANALYZED ON IOA 1011-1014 AND RI/NASA 0518. DELETE DUPLICATE ANALYSIS.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4091
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4091
ITEM: LO2 TANK PRE-PRESS CHECK VALVE (CV16)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ITEM IS ANALYZED ON IOA 1011-1014 AND RI/NASA 0518. DELETE DUPLICATE ANALYSIS.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4100
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4100
ITEM: LH2 TANK PRE-PRESS CHECK VALVE (CV17)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ITEM IS ANALYZED ON IOA 2181-2183 AND RI/NASA 0502. DELETE DUPLICATE ANALYSIS.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4101
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4101
ITEM: LH2 TANK PRE-PRESS CHECK VALVE (DV17)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ITEM IS ANALYZED ON IOA 2181-2183 AND RI/NASA 0502. DELETE DUPLICATE ANALYSIS.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4110
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4110
ITEM: GH2 PRESS MANIFOLD REPRESS CHECK VALVE (CV24)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4110A
NASA FMEA #: 0605-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4110
ITEM: GH2 PRESS MANIFOLD REPRESS CHECK VALVE (CV24)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4111
NASA FMEA #: 0605-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4111
ITEM: GH2 PRESS MANIFOLD REPRESS CHECK VALVE (CV24)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4120
NASA FMEA #: 0248-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4120
ITEM: LH2 FEED MANIF RTLS REPRESS CHECK VALVE (CV30)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LINE RUPTURE IS NOT VALID AS LOSS OF REDUNDANCY. FAILURE HAS NO EFFECT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4121
NASA FMEA #: 0248-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4121
ITEM: LH2 FEED MANIF RTLS REPRESS CHECK VALVE (CV30)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE VALVE IS ONLY REQUIRED TO OPEN DURING AN RTLS ABORT. LACK OF HELIUM REPRESS WILL ALLOW VENTING OF RESIDUAL H2 AFTER LANDING TO CREATE A FIRE HAZARD. NOMINAL NA, ABORT 1/1.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4130
NASA FMEA #: 0238-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4130
ITEM: PNEU VALVE HE SUPPLY-ISOLATION VALVE (LV7,LV8)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
ACCUMULATORS WILL RETAIN PRESSURE TO OPERATE PREVALVES AT MECO. SUBSEQUENT VALVE OPERATION MAY BE IMPOSSIBLE. RELIEF SYSTEMS WILL PREVENT MANIFOLD RUPTURE. VENTING HYDROGEN DURING ENTRY AND LANDING WILL CREATE A FIRE HAZARD. RI/NASA USE OF RELIEF SYSTEM AS REDUNDANCY IS INVALID.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4131
NASA FMEA #: 0238-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4131
ITEM: PNEU VALVE HE SUPPLY-ISOLATION VALVE (LV7,LV8)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
ACCUMULATORS WILL RETAIN PRESSURE TO OPERATE PREVALVES AT MECO. SUBSEQUENT VALVE OPERATION MAY BE IMPOSSIBLE. RELIEF SYSTEMS WILL PREVENT MANIFOLD RUPTURE. VENTING HYDROGEN DURING ENTRY AND LANDING WILL CREATE A FIRE HAZARD. RI/NASA USE OF

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88 NASA DATA:
ASSESSMENT ID: MPS-4132 BASELINE [ ]
NASA FMEA #: 0238-3 NEW [X]

SUBSYSTEM: MPS
ID: MDAC 4132
ITEM: PNEU VALVE HE SUPPLY-ISOLATION VALVE (LV7,LV8)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ]
(ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4140
NASA FMEA #: 0208-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4140
ITEM: PNEU HE CROSSOVER SOLENOID (LV10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[P]	[F]	[P]	[ ]
COMPARE	[/N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF ALL REDUNDANCY (LV10, 7, 8) WILL PRECLUDE VALVE OPERATION FOR DUMP. RELIEF SYSTEMS WILL PREVENT MANIFOLD RUPTURE, BUT VENTING OF H2 DURING ENTRY/LANDING MAY CREATE A FIRE/EXPLOSION HAZARD.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4140A
NASA FMEA #: 0208-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4140
ITEM: PNEU HE CROSSOVER SOLENOID (LV10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[P]	[F]	[P]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
POSSIBLE OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4141
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4141
ITEM: PNEU HE CROSSOVER SOLENOID (LV10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[P]	[F]	[P]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[F]	[P]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF ALL REDUNDANCY (LV10, 7, 8) WILL MAKE VALVE OPERATION FOLLOWING MECO IMPOSSIBLE. RELIEF SYSTEMS WILL PREVENT MANIFOLD RUPTURE. VENTING HYDROGEN DURING ENTRY AND LANDING MAY CREATE A FIRE/EXPLOSION HAZARD.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4142
NASA FMEA #: 0208-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4142
ITEM: PNEU HE CROSSOVER SOLENOID (LV10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
HELIUM LEAK AND ENGINE SHUTDOWN ARE NOT VALID FAILURES TO BE CONSIDERED LOSS OF REDUNDANCY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4150
NASA FMEA #: 0225-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4150
ITEM: LO2 PREVALVE OPENING SOLENOID (LV12,LV14,LV16)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
NSTS 22206 2.3.2d PRECLUDES THE INCLUSION OF SSME HPOT SEALS OR RIV IN THE SUCCESSION OF FAILURES. AS SUCH, RELIEF WILL BE PROVIDED FOR THE 12" FEED LINE. STILL 3/1R FOR LO2 INERT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4151
NASA FMEA #: 0225-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4151
ITEM: LO2 PREVALVE OPENING SOLENOID (LV12,LV14,LV16)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4152
NASA FMEA #: 0225-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4152
ITEM: LO2 PREVALVE OPENING SOLENOID (LV12,LV14,LV16)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4152A
NASA FMEA #: 0225-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4152
ITEM: LO2 PREVALVE OPENING SOLENOID (LV12,LV14,LV16)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE OF BOTH OPENING SOLENOIDS CAN PREVENT PREVALVE CLOSURE DESPITE PROPER OPERATION OF CLOSING SOLENOIDS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4160
NASA FMEA #: 0226-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4160
ITEM: LO2 PREVALVE OPENING SOLENOID (LV13,LV15,LV17)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4160A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4160
ITEM: LO2 PREVALVE OPENING SOLENOID (LV13,LV15,LV17)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4160B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4160
ITEM: LO2 PREVALVE CLOSING SOLENOID (LV13,LV15,LV17)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4161
NASA FMEA #: 0226-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4161
ITEM: LO2 PREVALVE CLOSING SOLENOID (LV13,LV15,LV17)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/05/88
ASSESSMENT ID: MPS-4162
NASA FMEA #: 0226-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4162
ITEM: LO2 PREVALVE CLOSING SOLENOID (LV13,LV15,LV17)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
NSTS 22206 2.3.2d PRECLUDES THE INCLUSION OF SSME HPOT SEALS OR RIV IN THE SUCCESSION OF FAILURES. THEY REMAIN VALID RELIEF PATHS. STILL 3/1R FOR LO2 INERT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-20-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4162A
NASA FMEA #: 0226-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4162
ITEM: LO2 PREVALVE CLOSING SOLENOID (LV13,LV15,LV17)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE CAN CLOSE PREVALVE.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4164
NASA FMEA #: 0227-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4164
ITEM: LH2 PREVALVE OPENING SOLENOID (LV18,LV20,LV22)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[F]	[P]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE IS NOT DETECTABLE.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88 NASA DATA:
ASSESSMENT ID: MPS-4165 BASELINE [ ]
NASA FMEA #: 0227-4 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4165
ITEM: LH2 PREVALVE OPENING SOLENOID (LV18,LV20,LV22)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4166
NASA FMEA #: 0227-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4166
ITEM: LH2 PREVALVE OPENING SOLENOID (LV18,LV20,LV22)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[P]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURES IN INTERFACING SUBSYSTEMS ARE NOT ALLOWED (NSTS 22206, 2.3.2d). SECOND FAILURE WILL PREVENT CLOSURE AT MECO, BUT HAS NO HARMFUL EFFECT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4166A
NASA FMEA #: 0227-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4166
ITEM: LH2 PREVALVE OPENING SOLENOID (LV18,LV20,LV22)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE TO CLOSE PREVALVE HAS NO EFFECT. POSTULATING FAILURES IN INTERFACING SUBSYSTEMS IS NOT PART OF THIS ANALYSIS (NSTS 22206, 2.3.2d).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4167
NASA FMEA #: 0228-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4167
ITEM: LH2 PREVALVE CLOSING SOLENOID (LV19,LV21,LV23)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[P]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE TO CLOSE PREVALVE HAS NOT EFFECT. SUBSEQUENT FAILURES IN INTERFACING SUBSYSTEMS ARE NOT CONSIDERED (NSTS 22206, 2.3.2d). REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88 NASA DATA:
ASSESSMENT ID: MPS-4167A BASELINE [ ]
NASA FMEA #: 0290-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4167
ITEM: LH2 PREVALVE CLOSING SOLENOID (LV19,LV21,LV23)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4167B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4167
ITEM: LH2 PREVALVE CLOSING SOLENOID (LV19,LV21,LV23)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4168
NASA FMEA #: 0228-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4168
ITEM: LH2 PREVALVE CLOSING SOLENOID (LV19,LV21,LV23)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE OF PREVALVE TO REMAIN CLOSED HAS NO EFFECT. FAILURES IN INTERFACING SUBSYSTEMS ARE NOT CONSIDERED (NSTS 22206, 2.3.2d). REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4169
NASA FMEA #: 0228-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4169
ITEM: LH2 PREVALVE CLOSING SOLENOID (LV19,LV21,LV23)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-20-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4169A
NASA FMEA #: 0228-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4169
ITEM: LH2 PREVALVE CLOSING SOLENOID (LV19,LV21,LV23)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-20-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4170
NASA FMEA #: 0231-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4170
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV24)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4170A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4170
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV24)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4170B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4170
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV24)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4171
NASA FMEA #: 0231-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4171
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV24)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4172
NASA FMEA #: 0231-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4172
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV24)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /1R] [P] [P] [P] [D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF ALL REDUNDANCY IS DETECTABLE VIA MANIFOLD PRESSURE INDICATORS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88 NASA DATA:
ASSESSMENT ID: MPS-4172A BASELINE [ ]
NASA FMEA #: 0231-5 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4172
ITEM: LO2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV24)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[P]	[P]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LOSS OF ALL REDUNDANCY IS DETECTABLE VIA MANIFOLD PRESSURE INDICATORS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4180
NASA FMEA #: 0232-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4180
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV25)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4180A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4180
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV25)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4180B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4180
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV25)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4181
NASA FMEA #: 0232-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4181
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV25)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[NA]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4182
NASA FMEA #: 0232-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4182
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV25)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88 NASA DATA:
ASSESSMENT ID: MPS-4182A BASELINE [ ]
NASA FMEA #: 0232-5 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4182
ITEM: LH2 FEEDLINE RELIEF SHUTOFF VALVE CLOSING SOLENOID (LV25)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[ ]	[N]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
A SINGLE FAILURE MAY RESULT IN MANIFOLD RUPTURE.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4190
NASA FMEA #: 0233-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4190
ITEM: HE SUPPLY BLOWDOWN VALVE (LV26,LV27)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88 NASA DATA:
ASSESSMENT ID: MPS-4190A BASELINE [ ]
NASA FMEA #: 0233-5 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4190
ITEM: HE SUPPLY BLOWDOWN VALVE (LV26,LV27)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
INBOARD VALVE (LV26) IS CRITICALITY 1/1. OUTBOARD VALVE IS 2/1R. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4191
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4191
ITEM: HE SUPPLY BLOWDOWN VALVE (LV26,LV27)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[P]	[F]	[P]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
INADEQUATE PURGE MAY CAUSE LOSS OF VEHICLE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4192
NASA FMEA #: 0233-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4192
ITEM: HE SUPPLY BLOWDOWN VALVE (LV26,LV27)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4200
NASA FMEA #: 0221-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4200
ITEM: LO2 OUTBOARD FILL VALVE OPENING SOLENOID (LV28)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4201
NASA FMEA #: 0221-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4201
ITEM: LO2 OUTBOARD FILL VALVE OPENING SOLENOID (LV28)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4202
NASA FMEA #: 0221-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4202
ITEM: LO2 OUTBOARD FILL VALVE OPENING SOLENOID (LV28)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS ASSIGNED A 1/1 CRITICALITY FOR ABORT. IOA CONCURS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4202A
NASA FMEA #: 0221-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4202
ITEM: LO2 OUTBOARD FILL VALVE OPENING SOLENOID (LV28)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4210
NASA FMEA #: 0222-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4210
ITEM: LO2 OUTBOARD FILL VALVE CLOSING SOLENOID (LV29)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS INDICATES 1/1 FOR ABORT. IOA CONCURS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4211
NASA FMEA #: 0222-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4211
ITEM: LO2 OUTBOARD FILL VALVE CLOSING SOLENOID (LV29)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4212
NASA FMEA #: 0222-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4212
ITEM: LO2 OUTBOARD FILL VALVE CLOSING SOLENOID (LV29)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/08/88
ASSESSMENT ID: MPS-4212A
NASA FMEA #: 0222-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4212
ITEM: LO2 OUTBOARD FILL VALVE CLOSING SOLENOID (LV29)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/09/88
ASSESSMENT ID: MPS-4220
NASA FMEA #: 0223-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4220
ITEM: LO2 INBOARD FILL VALVE OPENING SOLENOID (LV30)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/09/88
ASSESSMENT ID: MPS-4221
NASA FMEA #: 0223-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4221
ITEM: LO2 INBOARD FILL VALVE OPENING SOLENOID (LV30)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/09/88
ASSESSMENT ID: MPS-4222
NASA FMEA #: 0223-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4222
ITEM: LO2 INBOARD FILL VALVE OPENING SOLENOID (LV30)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/09/88
ASSESSMENT ID: MPS-4222A
NASA FMEA #: 0223-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4222
ITEM: LO2 INBOARD FILL VALVE OPENING SOLENOID (LV30)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/09/88
ASSESSMENT ID: MPS-4223
NASA FMEA #: 0224-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4223
ITEM: LO2 INBOARD FILL VALVE CLOSING SOLENOID (LV31)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/09/88 NASA DATA:
ASSESSMENT ID: MPS-4224 BASELINE [ ]
NASA FMEA #: 0224-4 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4224
ITEM: LO2 INBOARD FILL VALVE CLOSING SOLENOID (LV31)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/09/88
ASSESSMENT ID: MPS-4225
NASA FMEA #: 0224-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4225
ITEM: LO2 INBOARD FILL VALVE CLOSING SOLENOID (LV31)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/09/88
ASSESSMENT ID: MPS-4225A
NASA FMEA #: 0224-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4225
ITEM: LO2 INBOARD FILL VALVE CLOSING SOLENOID (LV31)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4226
NASA FMEA #: 0270-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4226
ITEM: LH2 OUTBOARD FILL VALVE OPENING SOLENOID (LV32)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4227
NASA FMEA #: 0270-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4227
ITEM: LH2 OUTBOARD FILL VALVE OPENING SOLENOID (LV32)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4228
NASA FMEA #: 0270-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4228
ITEM: LH2 OUTBOARD FILL VALVE OPENING SOLENOID (LV32)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS INDICATES 1/1 FOR ABORT. IOA CONCURS. THE IOA CRITICALITY WAS DRIVEN BY THE FAILURE TO REMAIN CLOSED. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4228A
NASA FMEA #: 0270-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4228
ITEM: LH2 OUTBOARD FILL VALVE OPENING SOLENOID (LV32)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THREE FAILURES MUST OCCUR BEFORE LH2 CAN ESCAPE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4229
NASA FMEA #: 0271-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4229
ITEM: LH2 OUTBOARD FILL VALVE CLOSING SOLENOID (LV33)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA INDICATES 1/1 FOR ABORT. IOA CONCURS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4230
NASA FMEA #: 0271-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4230
ITEM: LH2 OUTBOARD FILL VALVE CLOSING SOLENOID (LV33)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4231
NASA FMEA #: 0271-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4231
ITEM: LH2 OUTBOARD FILL VALVE CLOSING SOLENOID (LV33)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[P]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4231A
NASA FMEA #: 0271-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4231
ITEM: LH2 OUTBOARD FILL VALVE CLOSING SOLENOID (LV33)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4232
NASA FMEA #: 0272-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4232
ITEM: LH2 INBOARD FILL VALVE OPENING SOLENOID (LV34)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4233
NASA FMEA #: 0272-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4233
ITEM: LH2 INBOARD FILL VALVE OPENING SOLENOID (LV34)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4234
NASA FMEA #: 0272-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4234
ITEM: LH2 INBOARD FILL VALVE OPENING SOLENOID (LV34)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4234A
NASA FMEA #: 0272-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4234
ITEM: LH2 INBOARD FILL VALVE OPENING SOLENOID (LV34)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4235
NASA FMEA #: 0273-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4235
ITEM: LH2 INBOARD FILL VALVE CLOSING SOLENOID (LV35)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4236
NASA FMEA #: 0273-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4236
ITEM: LH2 INBOARD FILL VALVE CLOSING SOLENOID (LV35)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4236A
NASA FMEA #: 0291-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4236
ITEM: LH2 INBOARD FILL VALVE CLOSING SOLENOID (LV35)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-9-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4236B
NASA FMEA #: 0291-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4236
ITEM: LH2 INBOARD FILL VALVE CLOSING SOLENOID (LV35)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-9-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4237
NASA FMEA #: 0273-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4237
ITEM: LH2 INBOARD FILL VALVE CLOSING SOLENOID (LV35)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4237A
NASA FMEA #: 0273-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4237
ITEM: LH2 INBOARD FILL VALVE CLOSING SOLENOID (LV35)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-15-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88 NASA DATA:
ASSESSMENT ID: MPS-4240 BASELINE [ ]
NASA FMEA #: 0229-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4240
ITEM: LH2 RECIRC PUMP VALVE OPENING SOLENOID (LV36)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4241
NASA FMEA #: 0229-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4241
ITEM: LH2 RECIRC PUMP VALVE OPENING SOLENOID (LV36)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4242
NASA FMEA #: 0229-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4242
ITEM: LH2 RECIRC PUMP VALVE OPENING SOLENOID (LV36)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE WILL BE 1/1 DURING ABORT ONLY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4242A
NASA FMEA #: 0229-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4242
ITEM: LH2 RECIRC PUMP VALVE OPENING SOLENOID (LV36)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE WILL BE 1/1 DURING AN ABORT ONLY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4250
NASA FMEA #: 0230-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4250
ITEM: LH2 REPLENISH VALVE OPENING SOLENOID(LV39)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[P]	[F]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE CAN PREVENT LH2 DUMP. SUBSEQUENT FAILURE OF RELIEF SYSTEM CAN CAUSE MANIFOLD RUPTURE.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4251
NASA FMEA #: 0230-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4251
ITEM: LH2 REPLENISH VALVE OPENING SOLENOID(LV39)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4252
NASA FMEA #: 0230-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4252
ITEM: LH2 REPLENISH VALVE OPENING SOLENOID(LV39)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LAUNCH SCRUB.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4252A
NASA FMEA #: 0230-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4252
ITEM: LH2 REPLENISH VALVE OPENING SOLENOID(LV39)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4260
NASA FMEA #: 0601-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4260
ITEM: LO2 MANIFOLD REPRESS VALVE (LV40,LV41)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
DUMP AND RELIEF SYSTEMS ARE NOT REDUNDANT TO THE REPRESS SYSTEM. FAILURE RESULTS IN DEGRADED DUMP. NO LOSS OF CREW OR VEHICLE.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4260A
NASA FMEA #: 0601-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4260
ITEM: LO2 MANIFOLD REPRESS VALVE (LV40,LV41)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
INBOARD VALVE (LV40) IS 1/1. OUTBOARD VALVE (LV41) IS 2/1R.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4261
NASA FMEA #: 0601-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4261
ITEM: LO2 MANIFOLD REPRESS VALVE (LV40,LV41)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

	[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
DUMP AND RELIEF SYSTEMS ARE NOT REDUNDANT TO THE REPRESS SYSTEM. FAILURE RESULTS IN DEGRADED DUMP. NO LOSS OF CREW OR VEHICLE.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4262
NASA FMEA #: 0601-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4262
ITEM: LO2 MANIFOLD REPRESS VALVE (LV40,LV41)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[/N]	[ ]	[N]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4262A
NASA FMEA #: 0601-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4262
ITEM: LO2 MANIFOLD REPRESS VALVE (LV40,LV41)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /2R]	[P]	[P]	[P]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4270
NASA FMEA #: 0606-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4270
ITEM: LH2 MANIFOLD REPRESS VALVE (LV42,LV43)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
DUMP AND RELIEF SYSTEMS ARE NOT REDUNDANT TO THE REPRESS SYSTEM. FAILURE RESULTS IN DEGRADED DUMP. NO LOSS OF CREW OR VEHICLE. REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4271
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4271
ITEM: LH2 MANIFOLD REPRESS VALVE (LV42,LV43)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)	[3 /3]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4272
NASA FMEA #: 0606-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4272
ITEM: LH2 MANIFOLD REPRESS VALVE (LV42,LV43)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[ ] *
IOA	[3 /1R]	[P]	[P]	[P]	[ ]
COMPARE	[N /]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REGULATOR (PR6) WILL KEEP HELIUM FLOW AT LOW LEVEL.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4272A
NASA FMEA #: 0606-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4272
ITEM: LH2 MANIFOLD REPRESS VALVE (LV42,LV43)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /1R]	[P]	[P]	[P]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4280
NASA FMEA #: 0219-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4280
ITEM: LO2 FEED DISCONNECT VALVE OPENING SOLENOID (LV46)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4281
NASA FMEA #: 0219-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4281
ITEM: LO2 FEED DISCONNECT VALVE OPENING SOLENOID (LV46)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4281A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4281
ITEM: LO2 FEED DISCONNECT VALVE OPENING SOLENOID (LV46)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4281B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4281
ITEM: LO2 FEED DISCONNECT VALVE OPENING SOLENOID (LV46)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4282
NASA FMEA #: 0219-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4282
ITEM: LO2 FEED DISCONNECT VALVE OPENING SOLENOID (LV46)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[2 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE VALVE HAS A MECHANICAL BACKUP CLOSURE DEVICE.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4282A
NASA FMEA #: 0219-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4282
ITEM: LO2 FEED DISCONNECT VALVE OPENING SOLENOID (LV46)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4290
NASA FMEA #: 0220-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4290
ITEM: LO2 FEED DISCONNECT VALVE CLOSING SOLENOID (LV47)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4291
NASA FMEA #: 0220-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4291
ITEM: LO2 FEED DISCONNECT VALVE CLOSING SOLENOID (LV47)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4292
NASA FMEA #: 0220-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4292
ITEM: LO2 FEED DISCONNECT VALVE CLOSING SOLENOID (LV47)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/10/88
ASSESSMENT ID: MPS-4292A
NASA FMEA #: 0220-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4292
ITEM: LO2 FEED DISCONNECT VALVE CLOSING SOLENOID (LV47)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4300
NASA FMEA #: 0217-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4300
ITEM: LH2 FEED DISCONNECT VALVE OPENING SOLENOID (LV48)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4301
NASA FMEA #: 0217-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4301
ITEM: LH2 FEED DISCONNECT VALVE OPENING SOLENOID (LV48)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
IOA DID NOT ACCOUNT FOR THE LATCH.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4301A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4301
ITEM: LH2 FEED DISCONNECT VALVE OPENING SOLENOID (LV48)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4301B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4301
ITEM: LH2 FEED DISCONNECT VALVE OPENING SOLENOID (LV48)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4302
NASA FMEA #: 0217-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4302
ITEM: LH2 FEED DISCONNECT VALVE OPENING SOLENOID (LV48)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[2 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE VALVE HAS A MECHANICAL BACKUP SYSTEM TO CLOSE IT AT ET SEPARATION.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4302A
NASA FMEA #: 0217-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4302
ITEM: LH2 FEED DISCONNECT VALVE OPENING SOLENOID (LV48)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4310
NASA FMEA #: 0218-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4310
ITEM: LH2 FEED DISCONNECT VALVE CLOSING SOLENOID (LV49)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4311
NASA FMEA #: 0218-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4311
ITEM: LH2 FEED DISCONNECT VALVE CLOSING SOLENOID (LV49)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4312
NASA FMEA #: 0218-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4312
ITEM: LH2 FEED DISCONNECT VALVE CLOSING SOLENOID (LV49)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4312A
NASA FMEA #: 0218-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4312
ITEM: LH2 FEED DISCONNECT VALVE CLOSING SOLENOID (LV49)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-11-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4320
NASA FMEA #: 0215-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4320
ITEM: LH2 RECIRC DISCONNECT VALVE OPENING SOLENOID (LV50)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4321
NASA FMEA #: 0215-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4321
ITEM: LH2 RECIRC DISCONNECT VALVE OPENING SOLENOID (LV50)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
TWO FAILURES ARE REQUIRED BEFORE THE DISCONNECT VALVE WILL CLOSE. ANOTHER FAILURE IS REQUIRED TO CAUSE LOSS OF CREW OR VEHICLE.
SEE RI/NASA 0405-2.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4322
NASA FMEA #: 0215-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4322
ITEM: LH2 RECIRC DISCONNECT VALVE OPENING SOLENOID (LV50)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R] [P] [F] [P] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
MECHANICAL BACKUP DEVICE EXISTS FOR CLOSURE AT MECO.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4330
NASA FMEA #: 0216-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4330
ITEM: LH2 RECIRC DISCONNECT VALVE CLOSING SOLENOID (LV51)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[2 /1R]	[P]	[F]	[P]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE DISCONNECT VALVE HAS A BACKUP MECHANICAL CLOSURE DEVICE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4330A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4330
ITEM: LH2 RECIRC DISCONNECT VALVE CLOSING SOLENOID (LV51)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 11-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4330B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4330
ITEM: LH2 RECIRC DISCONNECT VALVE CLOSING SOLENOID (LV51)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4331
NASA FMEA #: 0216-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4331
ITEM: LH2 RECIRC DISCONNECT VALVE CLOSING SOLENOID (LV51)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4332
NASA FMEA #: 0216-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4332
ITEM: LH2 RECIRC DISCONNECT VALVE CLOSING SOLENOID (LV51)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-4332A
NASA FMEA #: 0216-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4332
ITEM: LH2 RECIRC DISCONNECT VALVE CLOSING SOLENOID (LV51)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[ ]	[ ]	[ ]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

	[3 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
TWO FAILURES ARE REQUIRED BEFORE THE DISCONNECT VALVE WILL CLOSE. ANOTHER FAILURE IS REQUIRED TO CAUSE LOSS OF CREW OR VEHICLE.
SEE RI/NASA 0405-2.
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4340
NASA FMEA #: 0245-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4340
ITEM: LH2 FEED RTLS INBOARD DUMP VALVE OPENING SOLENOID (LV72)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA DOES NOT SHOW A 1/1 CRITICALITY FOR ABORT.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4340A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4340
ITEM: LH2 FEED RTLS INBOARD DUMP VALVE OPENING SOLENOID (LV72)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4340B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4340
ITEM: LH2 FEED RTLS INBOARD DUMP VALVE OPENING SOLENOID (LV72)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4341
NASA FMEA #: 0245-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4341
ITEM: LH2 FEED RTLS INBOARD DUMP VALVE OPENING SOLENOID (LV72)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE RI/NASA ANALYSIS DOES NOT SHOW A 1/1 CRITICALITY FOR ABORT.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4342
NASA FMEA #: 0245-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4342
ITEM: LH2 FEED RTLS INBOARD DUMP VALVE OPENING SOLENOID (LV72)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4342A
NASA FMEA #: 0245-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4342
ITEM: LH2 FEED RTLS INBOARD DUMP VALVE OPENING SOLENOID (LV72)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4350
NASA FMEA #: 0245-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4350
ITEM: LH2 FEED RTLS OUTBOARD DUMP VALVE OPENING SOLENOID (LV73)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA SHOULD INDICATE 1/1 FOR ABORT.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4350A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4350
ITEM: LH2 FEED RTLS OUTBOARD DUMP VALVE OPENING SOLENOID (LV73)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4350B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4350
ITEM: LH2 FEED RTLS OUTBOARD DUMP VALVE OPENING SOLENOID (LV73)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4351
NASA FMEA #: 0245-1

NASA DATA:
BASELINE [ ]
NEW [ ]

SUBSYSTEM: MPS
MDAC ID: 4351
ITEM: LH2 FEED RTLS OUTBOARD DUMP VALVE OPENING SOLENOID (LV73)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA SHOULD INDICATE 1/1 FOR ABORT.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4352
NASA FMEA #: 0245-2

NASA DATA:
BASELINE [ ]
NEW [ ]

SUBSYSTEM: MPS
MDAC ID: 4352
ITEM: LH2 FEED RTLS OUTBOARD DUMP VALVE OPENING SOLENOID (LV73)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4352A
NASA FMEA #: 0245-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4352
ITEM: LH2 FEED RTLS OUTBOARD DUMP VALVE OPENING SOLENOID (LV73)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4360
NASA FMEA #: 0246-1

NASA DATA:
BASELINE [ ]
NEW [ ]

SUBSYSTEM: MPS
MDAC ID: 4360
ITEM: LH2 FEED MANIFOLD RTLS PRESS VALVE (LV74,LV75)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA INDICATES 1/1 FOR ABORT. IOA CONCURS.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4361
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4361
ITEM: LH2 FEED MANIFOLD RTLS PRESS VALVE (LV74,LV75)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS 1/1 FOR RTLS ABORT AND NA FOR NOMINAL.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4362
NASA FMEA #: 0246-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4362
ITEM: LH2 FEED MANIFOLD RTLS PRESS VALVE (LV74,LV75)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4370
NASA FMEA #: 0244-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4370
ITEM: LO2 OVERBOARD BLEED VALVE CLOSING SOLENOID (LV76)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4370A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4370
ITEM: LO2 OVERBOARD BLEED VALVE CLOSING SOLENOID (LV76)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4370B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4370
ITEM: LO2 OVERBOARD BLEED VALVE CLOSING SOLENOID (LV76)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4371
NASA FMEA #: 0244-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4371
ITEM: LO2 OVERBOARD BLEED VALVE CLOSING SOLENOID (LV76)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[/]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4372
NASA FMEA #: 0244-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4372
ITEM: LO2 OVERBOARD BLEED VALVE CLOSING SOLENOID (LV76)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA INDICATES 1/1 CRITICALITY FOR A PRELAUNCH ABORT. IOA CONCURS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4372A
NASA FMEA #: 0244-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4372
ITEM: LO2 OVERBOARD BLEED VALVE CLOSING SOLENOID (LV76)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA INDICATES 1/1 CRITICALITY FOR A PRELAUNCH ABORT. IOA CONCURS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4380
NASA FMEA #: 0243-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4380
ITEM: LO2 POGO ACCUM RECIRC VALVE CLOSING SOLENOID (LV77,LV78)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA REPORTS A 1/1 CRITICALITY FOR PRELAUNCH ABORTS. IOA CONCURS.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4381
NASA FMEA #: 0243-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4381
ITEM: LO2 POGO ACCUM RECIRC VALVE CLOSING SOLENOID (LV77,LV78)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RI/NASA REPORTS A 1/1 CRITICALITY FOR PRELAUNCH ABORTS. IOA CONCURS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4382
NASA FMEA #: 0243-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4382
ITEM: LO2 POGO ACCUM RECIRC VALVE CLOSING SOLENOID (LV77,LV78)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LAUNCH SCRUB.
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4382A
NASA FMEA #: 0243-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4382
ITEM: LO2 POGO ACCUM RECIRC VALVE CLOSING SOLENOID (LV77,LV78)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 8-18-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4390
NASA FMEA #: 0250-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4390
ITEM: LH2 HI POINT BLEED VALVE OPENING SOLENOID (LV79)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4391
NASA FMEA #: 0250-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4391
ITEM: LH2 HI POINT BLEED VALVE OPENING SOLENOID (LV79)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4392
NASA FMEA #: 0250-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4392
ITEM: LH2 HI POINT BLEED VALVE OPENING SOLENOID (LV79)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R] [P] [F] [P] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4392A
NASA FMEA #: 0250-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4392
ITEM: LH2 HI POINT BLEED VALVE OPENING SOLENOID (LV79)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 10-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4400
NASA FMEA #: 0226-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4400
ITEM: LO2 PREVALVE REDUNDANT CLOSING SOLENOID (LV80,LV81,LV82)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4400A
NASA FMEA #: 0290-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4400
ITEM: LO2 PREVALVE REDUNDANT CLOSING SOLENOID (LV80,LV81,LV82)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4400B
NASA FMEA #: 0290-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4400
ITEM: LO2 PREVALVE REDUNDANT CLOSING SOLENOID
(LV80,LV81,LV82)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4401
NASA FMEA #: 0226-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4401
ITEM: LO2 PREVALVE REDUNDANT CLOSING SOLENOID
(LV80,LV81,LV82)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4402
NASA FMEA #: 0226-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4402
ITEM: LO2 PREVALVE REDUNDANT CLOSING SOLENOID
(LV80,LV81,LV82)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
NSTS 22206 2.3.2d PRECLUDES THE INCLUSION OF HPOT SEALS OR SSME RIV IN THE FAILURE SERIES. CRITICALITY 3/1R FOR DUMP IS VALID. REF: RI/NASA CIL WORKSHEET OF 11-20-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4402A
NASA FMEA #: 0226-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4402
ITEM: LO2 PREVALVE REDUNDANT CLOSING SOLENOID (LV80,LV81,LV82)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/12/88
ASSESSMENT ID: MPS-4410
NASA FMEA #: 0225-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4410
ITEM: LO2 PREVALVE REDUNDANT OPENING SOLENOID (LV83,LV84,LV85)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[P]	[P]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
NSTS 22206 2.3.2d PRECLUDES THE INCLUSION OF HPOT SEALS OR SSME RIV IN FAILURE SERIES. CRITICALITY 3/1R FOR DUMP IS VALID.
REF: RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4411
NASA FMEA #: 0225-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4411
ITEM: LO2 PREVALVE REDUNDANT OPENING SOLENOID
(LV83,LV84,LV85)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4412
NASA FMEA #: 0225-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4412
ITEM: LO2 PREVALVE REDUNDANT OPENING SOLENOID (LV83,LV84,LV85)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4412A
NASA FMEA #: 0225-5

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4412
ITEM: LO2 PREVALVE REDUNDANT OPENING SOLENOID (LV83,LV84,LV85)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE OF BOTH OPENING SOLENOIDS CAN PREVENT PREVALVE CLOSURE AT MECO, REGARDLESS OF THE OPERATION OF THE CLOSING SOLENOIDS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-14-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4420
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4420
ITEM: LO2 TANK GND PRE-PRESS (ORB/GND) DISC. (ORB HALF) (PD9)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE DISCONNECT WAS PREVIOUSLY ANALYZED UNDER IOA 1061-1064 AND RI/NASA 0517. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4421
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4421
ITEM: LO2 TANK GND PRE-PRESS (ORB/GND) DISC. (ORB HALF) (PD9)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE DISCONNECT WAS PREVIOUSLY ANALYZED UNDER IOA 1061-1064 AND RI/NASA 0517. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4422
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4422
ITEM: LO2 TANK GND PRE-PRESS (ORB/GND) DISC. (ORB HALF) (PD9)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE DISCONNECT WAS PREVIOUSLY ANALYZED UNDER IOA 1061-1064 AND RI/NASA 0517. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4430
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4430
ITEM: LH2 TANK GND PRE-PRESS (ORB/GND) DISC. (ORB HALF) (PD10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE DISCONNECT WAS PREVIOUSLY ANALYZED UNDER IOA 2221 AND 2222, AND RI/NASA 0501. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4431
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4431
ITEM: LH2 TANK GND PRE-PRESS (ORB/GND) DISC. (ORB HALF) (PD10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE DISCONNECT WAS PREVIOUSLY ANALYZED UNDER IOA 2221 AND 2222, AND RI/NASA 0501. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4432
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4432
ITEM: LH2 TANK GND PRE-PRESS (ORB/GND) DISC. (ORB HALF) (PD10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THE DISCONNECT WAS PREVIOUSLY ANALYZED UNDER IOA 2221 AND 2222, AND RI/NASA 0501. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4460
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4460
ITEM: TEST PORT, PNEU HE OUTLET (TP1)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE LINE ON IOA ANALYSIS 4630 AND RI/NASA 0236. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4470
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4470
ITEM: TEST PORT, LH2 REPRESS REG OUTLET (TP3)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE LINE ON IOA WORKSHEET 4640. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4480
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4480
ITEM: TEST PORT, LO2 REPRESS REG OUTLET (TP4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE LINE ON IOA WORKSHEET 4640. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4490
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4490
ITEM: TEST PORT, LO2 PREPRESS DISC. CHECK VALVE (TP9)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE LINE ON IOA WORKSHEET 264 AND RI/NASA ANALYSIS 0510. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4500
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4500
ITEM: TEST PORT, LH2 PREPRESS DISC. CHECK VALVE (TP10)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE LINE ON IOA WORKSHEET 346 AND RI/NASA 0511. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4510
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4510
ITEM: TEST PORT, PNEU SUPPLY HELIUM (TP29)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE LINE ON IOA ANALYSIS 4620. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4520
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4520
ITEM: TEST PORT, CHECK VALVE CV24 LEAKAGE (TP36)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS FAILURE IS COVERED UNDER LEAKAGE OF THE LINE ON IOA ANALYSIS 4640 AND RI/NASA 0634. THIS IOA ANALYSIS SHOULD BE DELETED.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4530
NASA FMEA #: 0239-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4530
ITEM: PNEU VALVE HE SUPPLY REGULATOR (PR4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /]	[ ]	[N]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[2 /1R]	[P]	[P]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
SECOND FAILURE (LV10) WILL PREVENT VALVE OPERATIONS FOR DUMP. RELIEF SYSTEMS WILL PROTECT AGAINST MANIFOLD RUPTURE. VENTING HYDROGEN WILL CREATE A FIRE HAZARD DURING ENTRY/LANDING.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4530A
NASA FMEA #: 0239-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4530
ITEM: PNEU VALVE HE SUPPLY REGULATOR (PR4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4531
NASA FMEA #: 0239-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4531
ITEM: PNEU VALVE HE SUPPLY REGULATOR (PR4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RELIEF VALVE WILL DUMP HELIUM INTO AFT COMPARTMENT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4540
NASA FMEA #: 0602-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4540
ITEM: LO2 MANIF REPRESS REGULATOR (PR5)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REPRESSURIZATION IS NOT ESSENTIAL FOR MPS DUMP. DEGRADED DUMP. RELIEF SYSTEMS WILL PROTECT AGAINST MANIFOLD RUPTURE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4540A
NASA FMEA #: 0602-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4540
ITEM: LO2 MANIF REPRESS REGULATOR (PR5)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LO2 LEAKAGE FROM SENSE LINE THROUGH REGULATOR.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4541
NASA FMEA #: 0602-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4541
ITEM: LO2 MANIF REPRESS REGULATOR (PR5)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REPRESS VALVES ARE OPEN FOR 90 SEC DURING DUMP. HAZARD DURING ENTRY REPRESS ONLY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4550
NASA FMEA #: 0629-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4550
ITEM: LH2 MANIF REPRESS REGULATOR (PR6)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REPRESSURIZATION IS NOT ESSENTIAL FOR MPS DUMP. DEGRADED DUMP. RELIEF SYSTEMS WILL PROTECT AGAINST MANIFOLD RUPTURE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4550A
NASA FMEA #: 0629-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4550
ITEM: LH2 MANIF REPRESS REGULATOR (PR6)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[F]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
LH2 LEAKAGE FROM SENSE LINE THROUGH REGULATOR.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4551
NASA FMEA #: 0629-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4551
ITEM: LH2 MANIF REPRESS REGULATOR (PR6)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REPRESS VALVES ARE OPEN FOR 88 SEC DURING DUMP. HAZARD DURING ENTRY REPRESS ONLY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4560
NASA FMEA #: 0251-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4560
ITEM: PNEU VALVE HE SUPPLY RELIEF VALVE (RV4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[NA]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[ ]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4561
NASA FMEA #: 0251-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4561
ITEM: PNEU VALVE HE SUPPLY RELIEF VALVE (RV4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4561A
NASA FMEA #: 0251-4

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4561
ITEM: PNEU VALVE HE SUPPLY RELIEF VALVE (RV4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4570
NASA FMEA #: 0237-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4570
ITEM: PNEU VALVE HE SUPPLY TANK (TK4)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /2]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4580
NASA FMEA #: 0210-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4580
ITEM: LO2 PREVALVE PNEU ACCUMULATOR (AU5)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4590
NASA FMEA #: 0210-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4590
ITEM: LH2 PREVALVE PNEU ACCUMULATOR (AU6)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[2 /1R]	[P]	[P]	[P]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4600
NASA FMEA #: 0247-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4600
ITEM: LH2 FEED MANIF RTLS REPRESS ORIFICE (RP9)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA CIL OF 12-23-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4610
NASA FMEA #: 0145-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4610
ITEM: PNEU HE SUPPLY FILTER (FL5)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
RELIEF SYSTEM IS NOT A REDUNDANT ITEM. VENTING OF HYDROGEN DURING ENTRY/LANDING WILL CREATE A FIRE HAZARD.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4620
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4620
ITEM: PNEUMATIC HE FILL LINE (.50",.375",.625" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT ADDRESSES THE LINE FROM CHECK VALVE CV4 TO TANK TK4. POSSIBLE OVERPRESSURIZATION.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4620A
NASA FMEA #: 0234-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4620
ITEM: PNEUMATIC HE FILL LINE (.50",.375",.625" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT ADDRESSES THE LINE FROM THE DISCONNECT (PD8) TO THE CHECK VALVES (CV1, 2, 3, 4).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/15/88
ASSESSMENT ID: MPS-4620B
NASA FMEA #: 0252-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4620
ITEM: PNEUMATIC HE FILL LINE (.50",.375",.625" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT ADDRESSES THE LINES FROM THE HELIUM TANKS (TK1, 2, 3, 6, 7, 8, 9, 10, 11) TO THE CHECK VALVES (CV25, 26, 36, 37, 41, 42).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
IOA ATTEMPTED TO ANALYZE ALL 0.5 INCH HELIUM LINES UNDER ONE ANALYSIS WORKSHEET. RI/NASA TREATED THEM INDIVIDUALLY. IOA NOW BELIEVES THE RI/NASA APPROACH IS THE MORE APPROPRIATE ONE. HALF-INCH LINES WILL BE TREATED ON SUPPLEMENTAL ASSESSMENT SHEETS SUBSEQUENT TO THIS ONE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630A
NASA FMEA #: 0110-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE FROM CHECK VALVE CV9 TO ALL DOWNSTREAM SOLENOID INTERFACES ON THE ACCUMULATOR LEG.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630B
NASA FMEA #: 0113-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE FROM THE PNEUMATIC ISOLATION VALVES (LV7, 8) TO THE PNEUMATIC REGULATOR (PR4).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630C
NASA FMEA #: 0114-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE FROM THE REGULATOR (PR4) TO THE UPSTREAM CHECK VALVE (CV8).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630D
NASA FMEA #: 0190-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINES FROM THE RELIEF VALVE CLOSEING SOLENOIDS (LV24, 25) TO THE RELIEF VALVES (PV7, 8).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-9-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88 NASA DATA:
ASSESSMENT ID: MPS-4630E BASELINE [ ]
NASA FMEA #: 0143-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE CONNECTING THE BLOWDOWN VALVES (LV26, 27).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630F
NASA FMEA #: 0144-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[ ]	[ ]	[ ]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE FROM THE DOWNSTREAM BLOWDOWN VALVE (LV27) TO THE PURGE ORIFICE. RI/NASA INDICATES 1/1 FOR ABORT. IOA CONCURS. DEGRADED PURGE WILL HAVE NO EFFECT ON NOMINAL MISSION. INEFFECTIVE PURGE DURING RTLS OR TAL CAN CAUSE LOSS OF VEHICLE.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630G
NASA FMEA #: 0236-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE 0.5" LINES FROM THE UPSTREAM PNEUMATIC CHECK VALVE (CV8) TO ALL DOWNSTREAM SOLENOID INTERFACES ON THE NON-ACCUMULATOR LEG. A SINGLE FAILURE CAN CAUSE COMPARTMENT OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630H
NASA FMEA #: 0255-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE FROM THE FILTER (FL5) TO THE PNEUMATIC ISOLATION VALVES (LV7, 8).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88 NASA DATA:
ASSESSMENT ID: MPS-4630J BASELINE [ ]
NASA FMEA #: 0635-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE FROM THE DOWNSTREAM LO2 MANIFOLD REPRESS VALVE (LV41) TO THE CORRESPONDING REGULATOR (PR5). THE HAZARD EXISTS DURING PERIODS OF REPRESSURIZATION (DUMP, ENTRY) ONLY. AT OTHER TIMES IT IS 3/1R.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630K
NASA FMEA #: 0636-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE CONNECTING THE LO2 MANIFOLD REPRESSURIZATION VALVES (LV40, 41). THE HAZARD EXISTS DURING PERIODS OF REPRESSURIZATION (DUMP, ENTRY) ONLY. AT OTHER TIMES IT IS 2/1R.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630L
NASA FMEA #: 0637-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE FROM THE DOWNSTREAM LH2 MANIFOLD REPRESS VALVE (LV43) TO THE CORRESPONDING REGULATOR (PR6). THE HAZARD EXISTS DURING PERIODS OF REPRESSURIZATION (DUMP, ENTRY) ONLY. AT OTHER TIMES IT IS 3/1R.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4630M
NASA FMEA #: 0638-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESSURE LINE (.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE CONNECTING THE LH2 MANIFOLD REPRESSURIZATION VALVES (LV42, 43). THE HAZARD EXISTS DURING PERIODS OF REPRESSURIZATION (DUMP, ENTRY) ONLY. AT OTHER TIMES IT IS 2/1R.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640C
NASA FMEA #: 0236-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4630
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE 0.25 AND 0.38" LINES FROM THE UPSTREAM PNEUMATIC CHECK VALVE (CV8) TO ALL DOWNSTREAM SOLENOID INTERFACES ON THE NON-ACCUMULATOR LEG. A SINGLE FAILURE CAN CAUSE COMPARTMENT OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
IOA ATTEMPTED TO ANALYZE ALL 0.25 AND 0.38 INCH HELIUM LINES UNDER ONE ANALYSIS WORKSHEET. RI/NASA TREATED THEM INDIVIDUALLY. IOA NOW BELIEVES THE RI/NASA APPROACH TO BE THE MORE APPROPRIATE ONE. THESE LINES WILL BE TREATED ON SUPPLEMENTAL ASSESSMENT SHEETS SUBSEQUENT TO THIS ONE.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640A
NASA FMEA #: 0119-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[2 /1R]	[P]	[F]	[F]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
FAILURE OF THE LINE AND CHECKV ALVE CV30 WILL ALLOW LH2 LEAKAGE INTO THE AFT COMPARTMENT FOLLOWING THE OPENING OF THE RELIEF ISOLATION VALVE (PV8) AT MECO. THE FAILURE IS 1/1 DURING RTLS ONLY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640B
NASA FMEA #: 0122-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

	[2 /1R]	[P]	[F]	[P]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LINE CONNECTING THE LH2 MANIFOLD RTLS REPRESSURIZATION VALVES (LV75, 75). TWO FAILURES ARE REQUIRED FOR A HELIUM LEAK TO OCCUR DURING NOMINAL FLIGHT, AND THREE FOR A HYDROGEN LEAK. THE FAILURE IS 1/1 DURING AN RTLS ABORT ONLY.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640D
NASA FMEA #: 0190-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR SEVERAL HELIUM LINES THAT CONNECT A SOLENOID VALVE TO A PROPELLANT VALVE IN ORDER TO OPERATE THE PROPELLANT VALVE. THESE ARE: LV50 TO PD3, LV46 TO PD1, OV48 TO PD2, LV18 TO PV4, LV20 TO PV5, OV22 TO PV6, LV12 AND LV83 TO PV1, LV14 AND LV84 TO PV2, LV16 AND LV85 TO PV3, LV76 TO PV19, LV65 TO THE PD1 LATCH AND LV67 TO THE PD2 LATCH. ALL OF THESE LINES ARE PRESSURIZED DURING ASCENT.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640E
NASA FMEA #: 0191-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[1 /1] [NA] [NA] [NA] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR SEVERAL HELIUM LINES THAT CONNECT A SOLENOID VALVE TO A PROPELLANT VALVE IN ORDER TO OPERATE THE PROPELLANT VALVE. THESE ARE: LV72 TO PV17, LV73 TO PV18, LV79 TO PV22, LV51 TO PD3, LV47 TO PD1, LV49 TO PD2, LV19 TO PV4, LV21 TO PV5, LV23 TO PV6, LV66 TO PD1 LATCH AND LV68 TO PD2 LATCH. ALL OF THESE LINES ARE UNPRESSURIZED (SOLENOID CLOSED) DURING ASCENT.
LINE RUPTURE AFTER OPENING THE SOLENOID CAN CAUSE OVERPREZZURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640F
NASA FMEA #: 0192-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[1 /1]	[NA]	[NA]	[NA]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/] [ ] [ ] [ ] [ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR HELIUM LINES IN THE LO2 PREVALVE CLOSING SYSTEM. THEY ARE: LV13 TO PV1, LV15 TO PV2, LV17 TO PV3, LV80 TO LV13, LV81 TO LV15 AND LV82 TO LV17.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640G
NASA FMEA #: 0193-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[P]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR SEVERAL HELIUM LINES THAT CONNECT THE FILL & DRAIN VALVES TO THEIR CLOSING SOLENOIDS. THESE ARE: LV33 TO PV11, LV35 TO PV12, LV29 TO PV9 AND LV31 TO PV10. THESE LINES ARE PRESSURIZED DURING ASCENT.
POSSIBLE AFT COMPARTMENT OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640H
NASA FMEA #: 0194-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]

RECOMMENDATIONS: (If different from NASA)

[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THREE HELIUM LINES THAT CONNECT A SOLEONID VALE TO A PROPELLANT VALVE IN ORDER TO OPERATE THE PROPELLANT VALVE. THESE ARE: LV36 TO PV14, 15, 16, LV77 TO PV20 AND LV78 TO PV21.
THESE LINES ARE UNPRESSURIZED DURING ASCENT AND REMAIN SO FOR THE REMAINDER OF THE MISSION.
RUPTURE DURING PRELAUNCH OPERATIONS CAN CAUSE LOSS OF VEHICLE FROM SHRAPNEL IMPACT ON OTHER COMPONENTS.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4640I
NASA FMEA #: 0194-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[1 /1]	[NA]	[NA]	[NA]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR FIVE HELIUM LINES THAT CONNECT A SOLEONID VALE TO A PROPELLANT VALVE IN ORDER TO OPERATE THE PROPELLANT VALVE. THESE ARE: LV39 TO PV13, LV32 TO PV11, LV34 TO PV12, LV28 TO PV9 AND LV30 TO PV10.
THESE LINES ARE UNPRESSURIZED DURING MAIN ENGINE ASCENT BUT PRESSURIZED DURING MPS DUMP OR INERT.
FAILURE CAN CAUSE AFT COMPARTMENT OVERPRESSURIZATION.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA CIL WORKSHEET OF 12-10-87.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/17/88
ASSESSMENT ID: MPS-4640J
NASA FMEA #: 0633-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LH2 HELIUM PRESSURIZATION FLEXIBLE HOSE ASSEMBLY (CV13, 14, 15 TO PR6).
THIS FAILURE IS 2/1R FOR LEAKAGE OF HYDROGEN (SECOND FAILURE - CV14 OR CV15) OR HELIUM (SECOND FAILURE - REGULATOR PR6).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/17/88 NASA DATA:
ASSESSMENT ID: MPS-4640K BASELINE [ ]
NASA FMEA #: 0604-1 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE LO2 HELIUM PRESSURIZATION FLEXIBLE HOSE ASSEMBLY (CV10 TO CV12 AND PR5).
THIS FAILURE IS 2/1R FOR LEAKAGE OF OXYGEN (SECOND FAILURE - CV10 OR CV12) OF HELIUM (SECOND FAILURE - REGULATOR PR5).
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/17/88
ASSESSMENT ID: MPS-4640L
NASA FMEA #: 0634-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4640
ITEM: PNEUMATIC HE PRESS VALVE ACTUATION LINE (.25",.38" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[2 /1R]	[P]	[F]	[P]	[X] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE REPRESSURIZATION LINE FROM CV13 TO CV24.
REF: RI/NASA CIL OF 12-23-87 AND RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/16/88
ASSESSMENT ID: MPS-4650
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4650
ITEM: PNEUMATIC HELIUM INTERCONNECT LINE
(.63",1.00",.50" DIA)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[1 /1]	[NA]	[NA]	[NA]	[X]
COMPARE	[N /N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

	[1 /1]	[NA]	[NA]	[NA]	[A] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THIS ASSESSMENT IS FOR THE HELIUM LINES FROM THE PNEUMATICS TANK (TK4) TO THE IN/OUT INTERCONNNECT VALVES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/17/88 NASA DATA:
ASSESSMENT ID: MPS-4660 BASELINE [ ]
NASA FMEA #: 0409-2 NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4660
ITEM: GN2 PURGE (ORB/GND) DISC. (ORB HALF) (PD14)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]

RECOMMENDATIONS: (If different from NASA)

[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/17/88
ASSESSMENT ID: MPS-4662
NASA FMEA #: 0409-3

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4662
ITEM: GN2 PURGE (ORB/GND) DISC. (ORB HALF) (PD14)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)
ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/17/88
ASSESSMENT ID: MPS-4664
NASA FMEA #: 0409-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4664
ITEM: GN2 PURGE (ORB/GND) DISC. (ORB HALF) (PD14)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
REF: RI/NASA FMEA/CIL REVIEW MEETING NOTES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/17/88
ASSESSMENT ID: MPS-4666
NASA FMEA #: NA

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: MPS
MDAC ID: 4666
ITEM: GN2 PURGE (ORB/GND) DISC. (ORB HALF) (PD14)

LEAD ANALYST: A.J.MARINO

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[/]	[ ]	[ ]	[ ]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[N /N]	[N]	[N]	[N]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
THESE FAILURE MODES ARE ALREADY ADDRESSED ON IOA WORKSHEETS 4660, 4662 AND 4664.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-5000
NASA FMEA #: 2182-2

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: EPD&C/MPS
MDAC ID: 5000
ITEM: LO2 PREVALVE CONTROL CIRCUIT

LEAD ANALYST: HOLDEN/LOWERY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /3]	[NA]	[NA]	[NA]	[ ] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/]	[ ]	[ ]	[ ]	[ ]
RECOMMENDATIONS: (If different from NASA)					
	[/]	[ ]	[ ]	[ ]	[ ] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
9 OPEN MDM BLOCKING DIODES.

APPENDIX C
ASSESSMENT WORKSHEET

ASSESSMENT DATE: 2/11/88
ASSESSMENT ID: MPS-5000A
NASA FMEA #: 2182-1

NASA DATA:
BASELINE [ ]
NEW [X]

SUBSYSTEM: EPD&C/MPS
MDAC ID: 5000
ITEM: LO2 PREVALVE CONTROL CIRCUIT

LEAD ANALYST: HOLDEN/LOWERY

ASSESSMENT:

	CRITICALITY FLIGHT HDW/FUNC	REDUNDANCY SCREENS A	B	C	CIL ITEM
NASA	[3 /1R]	[P]	[F]	[P]	[X] *
IOA	[3 /3]	[NA]	[NA]	[NA]	[ ]
COMPARE	[/N]	[N]	[N]	[N]	[N]

RECOMMENDATIONS: (If different from NASA)

[3 /3]	[NA]	[NA]	[NA]	[D] (ADD/DELETE)

* CIL RETENTION RATIONALE: (If applicable)

ADEQUATE [ ]
INADEQUATE [ ]

REMARKS:
9 OPEN MDM BLOCKING DIODES. FUNCTIONAL CRITICALITY DETERMINED BY LIKE AND UNLIKE REDUNDANCY.