
DARKSTAR FLIGHT TEST DATA

Table B.1 contains information on the DarkStar flight test program. Data include sortie numbers, sortie dates, flight hours, objectives, results of the mission, and additional comments regarding significant events during the test. These data were used to create the charts used in Chapter Three.

The data in the table were derived from the flash reports and quick-look reports that documented the results of each sortie.

Table B.1
DarkStar Flight Test Data

Sortie Number	Date	Air Vehicle	Official Sortie Designation	Flight Time (hours)	Cumulative Flight Hours	Phase	Objective	Results	Comments
1	3/29/96	AV01				II	Airworthiness, instrument calibration		"Wheelbarrowing" down runway; discrepancy between model predictions and flight test data.
2	4/22/96	AV01				II	Airworthiness, instrument calibration	Objectives not met	CRASH.
3	6/29/98	AV02	696 F2-1	0.73	0.73	II	Airworthiness, instrument calibration	Objectives met	Oscillation and climb rate problems.

Table B.1—continued

Sortie Number	Date	Air Vehicle	Official Sortie Designation	Flight Time (hours)	Cumulative		Phase	Objective	Results	Comments
					Flight Hours	Flight Hours				
4	9/13/98	AV02	696 F2-2	0.77	1.50		II	Pitch oscillation investigation	Objectives met	Wing loads near limit during flight and landing; brake pulsing; climb rate problem; oscillation better.
5	9/30/98	AV02	696 F2-3	0.77	2.26		II	Mission replan demonstration; fleet SATCOM demonstration; flight envelope expansion	Objectives not met	Oscillation continued; mission abort decision after fault message received on replan execute command.
6	10/27/98	AV02	696 F2-4	1.17	3.43		II	Fleet SATCOM demonstration; envelope expansion	Objectives partially met	Initial climb rate still problem.

Table B.1—continued

Sortie Number	Date	Air Vehicle	Official Sortie Designation	Flight Time (hours)	Cumulative Flight Hours	Phase	Objective	Results	Comments
7	1/9/99	AV02	696 F2-5	2.63	6.06	II	Envelope expansion	Objectives not met	Brake system continued to fail; climb rate; aircraft kept reaching flight limits on attempted envelope expansion tests; flight termination signal tested on ground due to detection of spurious signal from elsewhere on range.
8	1/29/99	AV02	696 F2-6	n/a	n/a	II	n/a	n/a	Stop work order/program termination.

SOURCE: HAE UAV JPO flash reports, quick-look reports, and flight test summary data charts.