

~~SECRET~~~~HEXAGON~~~~CORONA~~

BYE-110645-71
Copy // of 15
17 September 1971

MEMORANDUM FOR: Director of Special Projects

SUBJECT : Photo Reconnaissance Systems Report No. 110

I. CORONA

A. Accomplishments

CR-15 (Mission 1115) was successfully launched from VAFB 10 September 1971. The mission is proceeding smoothly with no major problems.

B. Problems

No major problems.

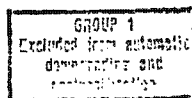
C. Projected Status

1. CR-16. R-25 Backup.
2. CR-8. Storage preps.

II. HEXAGON

A. General

1. The question of tapered film was fairly well resolved this week among PE, Headquarters and EK. EK has agreed to construct rolls in such a manner that a wedge of 0015 inches will not be exceeded in 26,000 feet. They have developed a measurement technique which gives us good assurance in determining the average taper of a particular segment. EK has computerized this process and they have also agreed to give us copies of the computer runs for each roll, thereby

~~HEXAGON~~ ~~CORONA~~
~~SECRET~~

HANDLE VIA BYEMAN
CONTROL SYSTEM ONLY

~~SECRET~~
~~HEXAGON CORONA~~

SUBJECT: Photo Reconnaissance Systems Report No. 110

allowing us to have a roadmap of each roll's wedge. Whereas Kodak is willing to do this and add this procedure to the specification, they will not agree to a firm statement that they will guarantee the minimum .015 wedge. The .015 will be a guideline. Any exceptions to this value will be identified on the computer run; and since this computer run is made before the roll is actually constructed, any segments which exceed the wedge requirement will be identified and can be reworked. The Project Office and the Perkin-Elmer representatives expressed confidence in Kodak's ability to do this. We feel that we have obtained about as much as we can from Kodak on this taper question. (EK ran a wedge build-up simulation on one of the flight rolls in SV-1. The maximum wedge seen was .019, but this roll was made using the old taper-control technique.)

2. EK reported the results of some of the studies they have conducted on mixed film rolls (color and black-and-white). These studies confirm that the mixed rolls will be considerably softer than a solid black-and-white roll. However, to determine the impact of these mixed roll characteristics, the Project Office ordered a worst-case roll for thermal and vibration testing at PE. The roll is to be delivered mid-November.

3. The Engineering Model tests on the mixed film roll at PE were not commenced on schedule this week because of mechanical problems in the film transport system. These are being corrected and the baseline run was to have been completed by today, 17 September.

4. SV-2 flight backup load has been completed by Kodak and was delivered to the west coast this week.

5. A sample of the corona-marked film (tarantulas) was shown to EK. They were requested to make cross-sectional micro studies and photographs to determine the direction of the corona. They agreed to do this.

6. The platen spare, the looper parts, and other mechanical spares were tech certified this week by the Project Office.

~~HEXAGON CORONA~~
~~SECRET~~

BYE-110645-71
Page Two

HANDLE VIA BYEMAN
CONTROL SYSTEM ONLY

Unclassified

~~SECRET~~

~~HEXAGON CORONA~~

SUBJECT: Photo Reconnaissance Systems Report No. 110

7. The RV-3 recovery operation is proceeding smoothly. The test recovery vehicle and the shipping container were delivered to San Diego. The hook will be delivered on 17 September. The White Sands has completed dry dock repairs and is being supplied. [redacted] from the Project Office and Ben Gerber from McDonnell Douglas will support the search operation. [redacted] was short one man on the crew (a civilian-manned ship) so that our people will stand regular watches. Len Molaskey from PE will support the recovery operations.

B. Advanced Planning & Management Support Activities

Rewrite of the basic work statement for the Advanced HEXAGON Study continues pursuant to guidance derived during recent internal reviews. Completion of a final draft for review is now scheduled for 24 September. Additional documentation for the data package has been ordered and is expected to be available in sufficient time for use by the study contractors.

C. West Coast Project Office

1. A series of tests have conclusively proven that Conversational Remote Job Entry (CRJE) and batch jobs are able to process concurrently with SSTC/2701 data transmission.

2. CRJE progress has been made:

a. User ID's and passwords for all authorized users of the system have been generated and implemented in the software.

b. P-95 formatted test tapes have been converted to CRJE data sets, updated using a CRJE terminal, and then written back to magnetic tape in the P-95 test tape format. These tapes have been successfully processed on the CDC computer.

c. The Computer Facility tape library system has been converted to the CRJE system. This will

~~HEXAGON CORONA~~
~~SECRET~~

BYE-110645-71
Page Three

HANDLE VIA EYEMAN
CONTROL SYSTEM ONLY

Unclassified

Unclassified
~~SECRET~~
~~HEXAGON CORONA~~

SUBJECT: Photo Reconnaissance Systems Report No. 110

provide a convenient means of updating the current status of magnetic tapes and will provide a history of the use of a particular tape by typing a request at one of the CRJE terminals.

3. All IBM bills covering from 1 July 1970 to 30 June 1971 for transportation, basic rental and additional billable time have been received. Total expenditures for FY 1971 were \$691,124.17.

4. The A-2 Chamber modification is proceeding satisfactorily. We are currently one day behind an 8 October need date for a 3 collimator readiness posture. It is expected that this day will be recovered during the next two weeks.

D. Model Status

1. SDV-III (Development Model)

The installation of platens A and B crossovers and film drives was completed. The system was turned over to LMSC for SPAT-II tests which are scheduled to begin on 6 October.

2. SV-2 (MS SN-002)

The first RV (with modified parachute) arrived on 15 September. PE R&I of this TUA will begin on 17 September. No other significant PE activity occurred this past week. The oil contamination problem in the aft section as reported last week has been resolved as having no effect on the camera.

3. SV-3 (MS SN-004)

The vehicle is in the Vertical Integration Stand (VIS) No. 1. No PE activity this past week while LMSC was conducting aft section tests. The first camera "creep" test is scheduled for 17 September.

~~HEXAGON CORONA~~
~~SECRET~~

BYE-110645-71
Page Four

HANDLE VIA EYEMAN
CONTROL SYSTEM ONLY

Unclassified
~~SECRET~~
~~HEXAGON CORONA~~

SUBJECT: Photo Reconnaissance Systems Report No. 110

4. SV-4 (MS SN-005)

The supply has been removed from the midsection and the vehicle has been turned over to LMSC for cable work. The camera Receiving and Inspection has been completed.

5. SV-5 (MS SN-006)

The Acceptance Team is involved in a meeting today at PE to review the data available from the acceptance tests to date and to discuss the nature of SN-006 problems. This is a data review and not an acceptance meeting. A plan to correct the problems should be forthcoming from this meeting.

6. SV-6 (MS SN-007)

Manufacturing buildup activity continued on schedule. The aft articulator vibration test was completed and the supply was installed in the midsection assembly. The two-camera assembly was installed in the alignment fixture and alignment verification is in progress.

III. Meetings Requiring Participation of Headquarters Personnel

<u>Date</u>	<u>Subject</u>	<u>Attendees</u>
<u>HQ</u>		
21 Sept	Briefing by GE re BETACOM usage for Film Exposure	Staff
21-23 Sept	Advanced HEXAGON Work Statement Meeting	<input type="text"/>
22 Sept	RV-3 Recovery Coordination Meeting	<input type="text"/>
23 Sept (PM)	Briefing to Mr. Colby	<input type="text"/>

~~HEXAGON CORONA~~

~~SECRET~~

BYE-110645-71
Page Five

HANDLE VIA EYEMAN
COMM-FIELD SYSTEM ONLY

Unclassified
~~SECRET~~
~~HEXAGON CORONA~~

SUBJECT: Photo Reconnaissance Systems Report No. 110

Pentagon

23 Sept Briefing to Dr. McLucas on Status of RV-3 Recovery Operations Brownman

22 Sept Spares Management Meeting

LMSC

24 Sept Managers Meeting

/s/

AD/PRS/OSP

- Distribution:**
- Cy 1 - D/OSP
 - Cy 2 - DD/OSP
 - Cy 3 - D/PRS/OSP
 - Cy 4 - SA/IS/OSP
 - Cy 5 - C/CS/OSP
 - Cy 6 - C/PAD/OSP
 - Cy 7 - AC/SB/OSP
 - Cy 8 - C/SS/OSP
 - Cy 9 - C/PPBB/OSP
 - Cy 10 - DC/D&AD/OSP
 - Cy 11 - RB/OSP
 - Cy 12 - PRS file
 - Cy 13 - PRS chrono
 - Cy 14 - NEPO
 - Cy 15 - WCPO

~~HEXAGON~~
~~SECRET~~

BYE-110645-71
Page Six
HANDLE WITH EXTREME
CONTROL SYSTEM ONLY