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Memorandum 6M-4307

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Division 6 - Lincoln Laboratory
Massachusetts Institute of Technology
Lexington 73, Massachusetts

SUBJECT: EPSCOM BIWEEKLY REPORT FOR 20 APRIL 1956

To: Distribution List

From: R. P. Mayer

Date: 27 April 1956

Approved: K. E. McVicar
K. E. McVicar

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Abstract: EPSCOM, now in Group 66, with 37 people including a new secretary at Murphy Hospital, is being reorganized into 3 subsections.

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Equipment Program Services Committee (EPSCOM)

EPSCOM is now in Group 66.

EPSCOM is being reorganized into 3 subsections: a planning subsection; a specification and documentation subsection; and a coding and checking subsection. Memorandum 6M-4306 describes the functions of these subsections.

An interoffice memorandum, Preparing Computer Operation Requests, by S. L. Thompson, 11 April 1956, describes how EPSCOM programmers should fill out Group 67's forms for XD-1 computer operation.

A 35 mm film projector is available for inspecting films from the XD-1 and MTC display cameras. This projector is now in the Lincoln EPSCOM office, but arrangements can be made for having it at Murphy if programmers want it there.

Two BTL programmers, Barbara Awad and Catherine Toohig, have been added to EPSCOM. Margaret Varga (BTL) is now the official EPSCOM secretary at Murphy Hospital. Howard Rundquist (Lincoln) has left EPSCOM to do liaison work with Group 67. The EPSCOM manpower now stands at 25 BTL, Lincoln, and Rand people (permanent, including secretary); 12 Western Electric people (subject to rotation); or a total of 37 people.

(R. P. Mayer)

Maintenance Program for SAGE External Equipment

Planning for the Maintenance Program is moving ahead. The basic problem is becoming increasingly clearer as more information is gathered. However, the implications of the problem are becoming more and more complex.

Our present aim is: with the aid of the central computer, automatize the maintenance procedures to its utmost.

(James P. Wong, Jr.)

Height Finding

Work on the Height Integration program has not yet commenced.

(Nancy Mardirosian)

Quick Tests

A program called, "Quick Radar Input Drum Test" has been written and debugging has been started. A memo will be written about this program when it runs correctly.

(Nancy Mardirosian)

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Tracking

Approximately two-thirds of the SAGE (and ESS) version of the single-track tracking program has been compiled and checked out on XD-1. Some minor errors were found and corrected.

Work is still incomplete on the coding of the new print-out routine of the program. This new print-out routine is to include range-azimuth and % return deviation "errors," features which are not included in the existing tracking program #8002.

Because this new version of the tracking program has not yet been checked out in its entirety on XD-1, work on the combined height-finding flight test tracking program is being delayed.

Some time has been spent recapitulating the programs required by Western Electric Co. for SAGE equipment testing. A partial list of all such programs and auxiliary programs required for their implementation has been prepared.

(Chris S. Sherrerd)

Mathematical and Miscellaneous Routines

A square root routine is in the final stages of being checked out and a memo to justify the method used is being written.

A "missing word" and a "matching extra" routine are being changed from compiler to assembly language and are being incorporated into the pattern checking program.

(Marcia J. Tobin)

We are still working on our routine for dual precision arithmetic. We have perfected addition, multiplication, and subtraction, and expect to finish division this week. We will then alter this routine to be used and stored as a subroutine and write a memo to clarify our work.

(Paula Titiev and
Elaine Collieran)

The sin-cos routine should be completely debugged today. I have now started work on the conversion equations of the tracking program and have started to do some of the coding for this.

(M. Tefft)

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Radar Orientation

The "Orientation" program has been initiated for the purpose of determining the accuracy of each radar site position and the constants involved in data processing by display comparison with known standards. A memo is being prepared to serve as a guidance for this program.

(Margaret Dolan)

Assembly Test Committee Programs

Progress is being made on the Situation Display Translation Program. At present I am waiting for some material on this program to come through.

(Ann B. Tebbetts)

We are in the process of making a detailed flow diagram for the Keyboard Input Simulation program. We are making considerable progress; and we are keeping in close contact with Howard Rundquist about it.

(Gertrude G. McNeil and
Jeanne E. Ouellette)

Pattern Checking

The preparation of the LRI-GFI Pattern checking program specifications is continuing. Detailed flow diagrams are about 50% complete.

A memo describing the program and the operational procedures is ready for issue.

Tabular specifications for wiring a printer board have been prepared.

(W. J. Marston)

Detailed flow diagrams are being prepared for the first portion of the Pattern Check program. Original plans of rewriting the Pattern Checking program for the compiler have been abandoned as there is a program being written for this purpose which is already near completion.

Additional corrections have been introduced in the display portion of the program. Slight modifications are expected to continue as each portion of the program is reviewed in detail.

The program will be converted and compiled as soon as the "conversion" program is ready for use.

(Glenn F. Paulsen, Jr.)

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Teletype Test

The teletype message test program has been successfully compiled this week. A first run was attempted without success due to inadequacies in the present read-in program with regard to reading the editor from tapes. It has been promised that this situation will be corrected next week, at which time another run will be tried.

Concurrently, preliminary documentation of the program is being written.

(George C. Cox)

During the past two weeks I have been working out a detailed flow diagram of our program from the card room listing. At present this flow chart is three-quarters completed.

(A. G. Thomas)

Signed:

R.P. Mayer (SLT)
R. P. Mayer

RPM:hpm

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