A MULTICS BIBLIOGRAPHY

A. Manuals which are Generally Available.

1. Multics Programmers' Manual. An updated reference manual giving calling sequences and reference information for all user callable subroutines and commands. Includes an introduction to the Multics programming environment and a guide to typical ways of using the system. app. 800 pages.

2. A Guide to Multics for Subsystem Writers, by E. I. Organick. A hard cover book describing in some detail how Multics works. The description is from the point of view of a programmer developing a large program or subsystem, who wishes to gain the extra insight to help him intelligently choose among available alternatives of his implementation. (In preparation: M.I.T. Press edition available in February, 1972; early drafts of chapters 1-8 are in documentation rooms for reference only). ca. 600 pages.

3. A User's Guide to the Multics FORTRAN Implementation, by R. A. Freiburghouse. A document which provides the prospective Multics FORTRAN user with sufficient information to enable him to create and execute FORTRAN programs on Multics. It contains a complete definition of the Multics FORTRAN language as well as a description of the FORTRAN command and error messages. It also describes how to communicate with non-FORTRAN programs, and discusses some of the fundamental characteristics of Multics which affect the FORTRAN user. -68 pages.

4. Multics PL/I Language Specification. A reference manual which specifies precisely the subset of the PL/I language used on Multics. -174 pages.

5. User's Guide to the Multics PL/I Implementation, by R. A. Freiburghouse et al. Provides detailed information about how the PL/I language is embedded in the Multics programming environment. -53 pages.

6. Graphic Users' Supplement to the Multics Programmers' Manual. In the same format as the Multics Programmers' Manual, this supplement gathers in one place descriptions of the Multics Graphics System, and the commands and subroutines needed to use it. -55 pages, illustrated.

B. Manuals which may be examined in the Project MAC or Information Processing Center Document Rooms.

1. Multics System Programmers' Manual. In principle, a complete reference manual describing how the system works inside. In fact, this document contains many sections which are inconsistent, inaccurate, or obsolete; it is in need of much upgrading. However, its overview sections are generally accurate and valuable if insight into the internal organization is desired. ca. 3,500 pages.

2. System Programmers Supplement to the Multics Programmers' Manual. This updateable reference manual, in the same format as the Multics Programmers' Manual, provides calling sequences of every system module. -850 pages.

3. EPLBSA Programmer's Reference Handbook, by D. J. Riesenberg. A manual describing the assembly (machine) language for the GE-645 computer. The language has been renamed ALM since the publication of this manual. (Needed only by programmers with some special reason to use 645 machine language.) -85 pages.

4. GE-645 Processor Manual. A hardware description, including opcodes, addressing modifiers, etc. Of interest only to dedicated machine language programmers. 175 pages.

5. Subsystem Writers' Supplement to the Multics Programmers' Manual. A manual giving calling sequences of internal interfaces of the system which are user-accessible. For the sophisticated subsystem writer who feels that it is important to bypass some standard Multics facility, this manual provides some help in using interfaces one level deeper into the system. This manual is definitely not for the casual user. -50 pages.

C. Technical Papers About Multics.

1. Corbato, F. J., and Vyssotsky, V. A., "Introduction and Overview of the Multics System", AFIPS Conf. Proc. 27 (1965 FJCC). Spartan Books, Washington, D.C., 1965, pp. 185-196.

2. Glaser, E. L., et al., "System Design of a Computer for Time-Sharing Application", AFIPS Conf. Proc. 27 (1965 FJCC), Spartan Books, Washington, D.C., 1965, pp. 197-202.

3. Vyssotsky, V. A., et al., "Structure of the Multics Supervisor", AFIPS Conf. Proc. 27 (1965 FJCC), Spartan Books, Washington, D.C., 1965) pp. 203-212.

4. Daley, R. C., and Newmann, P. G., "A General-Purpose File System for Secondary Storage", AFIPS Conf. Proc. 27 (1965 FJCC), Spartan Books, Washington, D.C., 1965, pp. 213-229.

5. Ossanna, J. F., et al., "Communication and Input/Output Switching in a Multiplex Computing System", AFIPS Conf. Proc. 27 (1965 FJCC), Spartan Books, Washington, D.C., 1965, pp. 231-241.

6. David, E. E., Jr., and Fano, R. M., "Some Thoughts About the Social Implications of Accessible Computing", AFIPS Conf. Proc. 27 (1965 FJCC), Spartan Books, Washington, D.C., 1965, pp. 243-247.

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8. Clingen, C. T., "Program Naming Problems in a Shared Tree-Structured Hierarchy", NATO Science Committee Conference on Techniques in Software Engineering, 1, Rome, Italy (October 27-31, 1969).

9. Graham, R. M., "Protection in an Information Processing Utility", Comm. ACM, 11, 5 (May, 1968) pp. 365-369.

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11. Corbato, F.J., and Saltzer, J.H., "Some Considerations of Supervisor Program Design for Multiplexed Computer Systems", Proc. IFIP Conf. 1968 Invited Papers, pp. 66-72.

12. Corbato, F. J., "PL/I as a Tool for System Programming", Datamation, 15, 6 (May, 1969), pp. 68-76.

13. Corbato, F. J., "A Paging Experiment with the Multics System", In Honor of P. M. Morse, M.I.T. Press, Cambridge, Massachusetts, 1969, pp. 217-228.

14. Saltzer, J.H., and Gintell, J.W., "The Instrumentation of Multics", ACM Second Symposium on Operating System Principles (October 20-22, 1969) Princeton University, pp. 167-174. Also in Comm. ACM, 13, 8 (August, 1970) pp. 495-500.

15. Spier, M. J., and Organick, E. I., "The Multics Inter-Process Communication Facility", ACM Second Symposium on Operating System Principles (October 20-22, 1969) Princeton University, pp. 83-91.

16. Freiburghouse, R. A., "The Multics PL/I Compiler" AFIPS Conf. Proc. 35 (1969), AFIPS Press, 1060, pp. 187-199.

17. Grochow, J. M., "Real-Time Graphic Display of Time-Sharing System Operating Characteristics", AFIPS Conf. Proc. 35 (1969 FJCC), AFIPS Press, 1969, pp. 379-385.

18. Saltzer, J.H., and Ossanna J.F., "Remote Terminal Character Stream Processing in Multics", AFIPS Conf. Proc. 36 (1970 SJCC), AFIPS Press, 1970, pp. 621-627.

19. Ossanna, J.F., and Saltzer, J.H., "Technical and Human Engineering Problems in Connecting Terminals to a Time-Sharing System", AFIPS Conf. Proc. 37 (1970 FJCC), AFIPS Press, 1970, pp. 355-362.

20. Clark, D. D., Graham, R. M., Saltzer, J. H., and Schroeder, M. D., "Classroom Information and Computing Service", M.I.T. Project MAC Technical Report TR-80. (January 11, 1971).

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D. M. I. T. Theses Related to Multics

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3. Deitel, H., "Absentee Computations in a Multiple-Access Computer System", S.M., 1968. (MAC-TR-52).

4. Greenbaum, J., "A Simulator of Multiple Interactive Users to Drive a Time-Shared Computer System", S.M., 1968. (MAC-TR-58).

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