

Authors

Charles T. Baker

Data Processing Product Group, Poughkeepsie, New York

Mr. Baker is a member of the Applications Analysis group of the Data Processing Product Group staff. He joined IBM in 1951 at the Poughkeepsie laboratory, working in storage device development and system architecture. Subsequently he worked at the IBM Research Center and product development laboratories. Since 1975 he has been engaged in several studies of the properties of distributed data processing systems. Mr. Baker received the M.S. degree in electrical engineering from the University of Pennsylvania in 1951.

Eduardo B. Fernandez

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Dr. Fernandez is an advisory industry specialist—scientific, located at the IBM Data Processing Division's New Haven branch office. He joined IBM in 1973, at the Los Angeles Scientific Center, where he worked on data base security and performance until moving to his present assignment in September 1979. Before joining IBM Dr. Fernandez taught at the University of Chile in Santiago. He received his M.S.E.E. from Purdue University in 1963 and his Ph.D. in computer science from UCLA in 1972.

Edward S. Harrison

System Communications Division, Kingston, New York

Dr. Harrison is currently on assignment to the Kingston laboratory where he is working in the Distributed Systems Development Department in an advisory programmer position. He joined IBM in 1970 at the Hursley Programming Centre and has worked on communications design and development ever since. From 1970 to 1974, he played a major role in the communications design of DOS/VS VTAM and, from 1974 through 1975, was part of an architecture team that produced extensions to SNA to allow the interconnection of host VTAM and TCAM systems. Since 1976 he has been a lead designer in producing the SNA communications design associated with the 8100-DPPX system. For this work he received an IBM Division Award in 1978. Dr. Harrison received a B.S. (Honors) degree from King's College, London University in 1966 and a Ph.D. in computing science from the University of Newcastle upon Tyne in 1971.

Alan G. Konheim

Research Division, Yorktown Heights, New York

Dr. Konheim manages the probability theory group in the Mathematical Sciences Department, IBM Thomas J. Watson Research Center. He joined IBM in 1960 and has been involved with applications of probability theory in performance evaluation and cryptography. He received his B.E.E. and M.S. in mathematics from the Polytechnic Institute of Brooklyn in 1955 and 1957, respectively, and his Ph.D. in mathematics from Cornell University in 1960. Dr. Konheim is an adjunct professor at the Courant Institute, New York University, and he plays lead trumpet in the Kitchawan Kombo.

Marian H. Mack

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Miss Mack is an advisory programmer in the modeling and system design group, Mathematical Sciences Department, IBM Thomas J. Watson Research Center. She worked as an X-ray crystallographer at Phillips Laboratories before joining IBM in 1967 as a system programmer in the Computer Assisted Instruction Department at Yorktown. Since 1970 she has worked on the modeling of semiconductor devices and fluid flows. She received a Research Division Outstanding Contribution Award for her work on the implementation of IPS. Miss Mack received her B.S. in chemistry from Syracuse University and her M.S. in chemistry from the Polytechnic Institute of Brooklyn.

Robert K. McNeill

Research Division, Yorktown Heights, New York

Mr. McNeill is an advisory programmer in the Computing Systems Department, IBM Thomas J. Watson Research Center. On the staff of that department since joining IBM in 1966, he has worked as an application programmer and a systems programmer, and for some time he has been part of a group that offers consulting services and other assistance to users of the computing systems at Yorktown. He received an IBM Outstanding Contribution Award for his work on IPS. Mr. McNeill received his A.B. (1962) and M.S. (1966), both in mathematics, from New York University.

Rita C. Summers

Data Processing Division, Los Angeles, California

Ms. Summers is a senior programmer at the Los Angeles Scientific Center. Since joining IBM in 1964 she has designed and implemented systems for CAI, interactive applications, and numerical control, and she has worked on multicomputer operating systems and languages for data base access. She received two IBM Outstanding Contribution Awards for work on microcoded virtual memory systems. Ms. Summers has been working in data base security for several years. Before joining IBM she worked as a systems analyst and programmer at Ramo Wooldridge. She received her B.A. and M.A. degrees from UCLA.

Bryant Tuckerman

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Dr. Tuckerman has been a mathematician at the IBM Thomas J. Watson Research Center since joining IBM in 1957. Prior to that he did military research (1941-45), taught at Cornell University (1947-49) and Oberlin College (1949-52), and worked on the Electronic Computer Project at the Institute for Advanced Study (1952-57). He received his B.S. from Antioch College (1939) and his M.A. (1946) and Ph.D. (1947) from Princeton University, all in mathematics. Dr. Tuckerman's work has included automatic programming, computation of ancient planetary positions, character and speech recognition, integer arithmetic, computational number theory including a lower bound for odd perfect numbers and the discovery of the 24th Mersenne prime, speed-enhancing programming of computers, and cryptography, including analyzing the strengths of several cryptographic systems and devising the method of chaining. He received an IBM Outstanding Innovation Award for his contributions to IPS.

Gerald Waldbaum

Research Division, Yorktown Heights, New York

Dr. Waldbaum is manager of Consulting, Education, and Performance Management and is program manager of Systems Management Controls. From 1959 until joining IBM in 1966, he was a member of the technical staff of Bell Telephone Laboratories, working on the design and development of the Number 1 Electronic Switching System. From 1966 to 1970 he worked at Yorktown as a systems programmer, measuring and improving the performance of TSS (the Time Sharing System) and helping to implement the first version of APL that ran under OS. Since then he has been active in installation management areas dealing with performance, capacity, computer usage budgeting, planning, DP security, consulting, and education. Dr. Waldbaum has taught courses in computer science at Iona College Graduate School of Business and is coauthor of the book *Electronic Switching Theory and Circuits*. He received his B.A. and B.S.E.E. degrees from Columbia University and his M.S.E.E. and Ph.D. in operations research from New York University.

Christopher Wood

Data Processing Division, Los Angeles, California

Dr. Wood is located at the Los Angeles Scientific Center, where he has been working in data base security and performance since 1976. He joined IBM in 1970 as a systems engineer in London, England, specializing in the data base area. In 1966 he obtained a B.S. in physics from Imperial College, London University, and in 1969, a Ph.D. from Balliol College, Oxford University, in theoretical physics. Dr. Wood is a member of the Association for Computing Machinery and the Institute of Electrical and Electronics Engineers.

Asher Yuval

Mehish Computer Services, Ltd., Tel-Aviv, Israel

From September 1977 to May 1979, Mr. Yuval was with the computer sciences department at IBM's Thomas J. Watson Research Center as a visiting scientist from the Weizmann Institute of Science, Rehovot, Israel. The work described in his paper in this issue was developed during that period. Prior to that, he spent a year at the European Laboratories Computer Network (ELCN) group of the IBM laboratory in Hursley, England, working on teleprocessing lines monitoring. He joined the Weizmann Institute computing center in 1971, where he was in charge of the systems programming team and where, in parallel, he taught courses on operating systems and data management at the undergraduate and graduate levels. He is currently a systems and programming manager at Mehish Computer Services. Mr. Yuval received his B.S. degree from the Hebrew University of Jerusalem in 1967 and was appointed a Research Fellow at the Weizmann Institute in 1974.