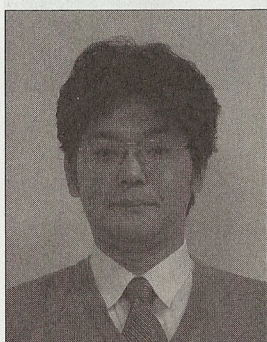


2003 Outstanding Young Engineer Award

Tatsuya Hirose, Joy Laskar and Gabriel M. Rebeiz

The Outstanding Young Engineer Award was established to recognize an outstanding young MTT-S Member(s), who has distinguished him/herself through achievement(s), which may be technical (within the MTT-S Field of Interest), may be exemplary service to the MTT-S, or may be a combination of both. Nominee must be no more than 38 years of age (i.e., must not have reached their 39th birthday) and must be an MTT member at time of nomination. This year's recipients are Tatsuya Hirose, Joy Laskar and Gabriel Rebeiz.

Hirose's citation reads: ***"For outstanding contributions to W-band millimeter-wave monolithic integrated circuits technology."***

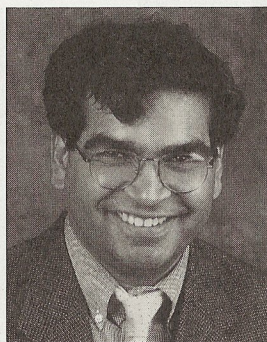


Tatsuya Hirose

Tatsuya Hirose (M'02) was born in Kanagawa, Japan in 1964. He received the B.E. degree from Tokyo Denki University, Tokyo, Japan, in 1987 and the M.E. degree in electrical engineering from Hokkaido University, Sapporo, Japan, in 1989. His master degree work focused on research on scattering mechanisms of two-dimensional electron gas in high-electron mobility transistors (HEMTs) including AlGaAs/GaAs and AlGaAs/InGaAs hetero structures.

After graduation from his masters course in 1989, he joined Fujitsu Laboratories, Ltd., Atsugi, Japan, where he was engaged in research on high-speed interconnection technologies for HEMT and HBT integrated circuits such as MMICs and LSIs. In the same period, he started device modeling and circuit design using HEMTs. In this work, he developed a very useful and accurate nonlinear HEMT model for circuit simulators. The model is being used for circuit design of HEMT LSIs and MMICs as a standard model in his laboratory. Recent results are 90-Gbit/s 2:1-MUX, 40-Gbit/s 4:1-MUX and 50-Gbit/s

1:4-DeMUX ICs for high-speed optical communications. From 1995 to 2000, he developed flip-chip HEMT MMICs for commercial-use 76-GHz automotive radar sensors. The MMIC chipsets are already utilized in Fujitsu's low-cost 76-GHz automotive radar sensors, and are being sold now. His recent research is focused on designing digital/analog integrated circuits, low-cost packages and modules based on HEMT technologies for high-speed applications such as optical fiber links, wireless communications and radar sensors. He is now working at Fujitsu Laboratories as a senior researcher in the research and development of high-speed digital and analog integrated circuit design using HEMT technologies.



Joy Laskar

Laskar's citation reads: ***"For outstanding contributions to the modeling and development of high frequency, high-performance communications modules."***

Dr. Joy Laskar was born in Kharaghpur, India and raised in Clemson, S.C. He received the B.S. degree (Computer Engineering with Math/Physics Minors, highest honors) from Clemson University in 1985. He received the M.S. and the Ph.D. degrees in Electrical Engineering from the University of Illinois at Urbana-Champaign in 1989 and 1991 respectively. Prior to joining Georgia Tech in 1995, Dr. Laskar held faculty positions at the University of Illinois and the University of Hawaii. At Georgia Tech, he holds the Joseph M. Pettit Professorship of Electronics, is currently the chair for the Electronic Design and Applications Technical Interest Group, the Director of Research for the state of Georgia's Yamacraw Design Center and the System Research Leader for the NSF Packaging Research Center.

His research has focused on high frequency IC design and their integration. At Georgia Tech, Dr. Laskar heads a research group of 25 members with a focus on integration of high frequency electronics with optoelectronics and integration of mixed technologies for next generation wireless and optoelectronic systems. Since 1995, he has graduated 13 Ph.D. students with an additional 4 expected to receive their doctorate degrees by June 2003. Dr. Laskar's research is supported by numerous industry and federal agencies including: DARPA, NASA and NSF. He is a co-organizer and chair for the Advanced Heterostructure Workshop, serves on the IEEE Microwave Theory and Techniques Symposia technical program committee, and is a member of the North American Manufacturing Initiative roadmapping committee. Dr. Laskar has authored or co-authored more

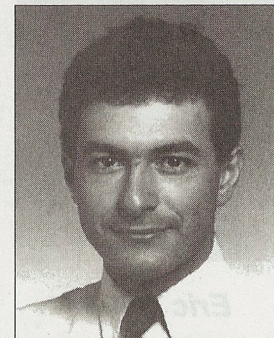
than 200 papers, several book chapters (including three textbooks in development), numerous invited talks and has 10 patents pending.

Dr. Laskar's research has produced numerous patents and transfer of technology to industry. Most recently his work has resulted in the formation of two companies. In 1998 he co-founded an advanced WLAN Company: RF Solutions, which is a recognized leader in the development of 802.11a/b/g RFICs. In 2001 Dr. Laskar co-founded a next generation interconnect company: Quellan. Quellan is developing collaborative signal processing solutions for enterprise applications. In addition, Dr. Laskar is a technical advisor to numerous industry and investor groups.

He is a 1995 recipient of the Army Research Office's Young Investigator Award, a 1996 recipient of the National Science Foundation's CAREER Award, the 1997 NSF Packaging Research Center Faculty of the Year, the 1998 NSF Packaging Research Center Educator of the Year, the 1999 co-recipient of the IEEE Rappaport Award (Best IEEE Electron Devices Society Journal Paper), the faculty advisor for the 2000 IEEE MTT IMS Best Student Paper award, 2001 Georgia Tech Faculty Graduate Student Mentor of the year, recipient of a 2002 IBM Faculty. Since July 2001, Dr. Laskar has been the Joseph M. Pettit Professor of Electronics in the School of Electrical and Computer Engineering at Georgia Tech.

Rebeiz's citation reads: ***"For achievements in microwave technology, outstanding teaching and mentoring and dedicated service to the Microwave Theory and Techniques Society."***

Gabriel M. Rebeiz (Fellow, IEEE) earned his Ph.D. degree in electrical engineering from the California Institute of Technology, Pasadena, in 1988. In September 1988, he joined the faculty of the University of Michigan and was promoted to Full Professor in 1998. His research interests include applying micromachining techniques and micro-electromechanical systems (MEMS) for the development of novel components and sub-systems for radars and wireless systems. He is also interested in SiGe RFIC design for receiver applications, and in the development of planar antennas and in microwave/millimeter-wave front-end electronics for communication systems, automotive collision-avoidance sensors and phased arrays. Prof. Rebeiz has graduated 22 Ph.D. students, and currently leads a group of 10 Ph.D. students in the above-mentioned areas.



**Gabriel M.
Rebeiz**

Prof. Rebeiz was the recipient of the National Science Foundation Presidential Young Investigator Award in April 1991 and the URSI International Isaac Koga Gold Medal Award for Outstanding International Research in August 1993. Together with his students, he is the winner of best student paper awards at IEEE RFIC (2002), IEEE-MTT (99-94, 92), and IEEE-AP (95, 92) and received the JINA'90 best paper award. Prof. Rebeiz was selected by the students as the 1997-1998 Eta-Kappa-Nu EECS Professor of the Year. In May 1998, he received the College of Engineering Teaching Excellence Award, and in October 1998, he received the Amoco Foundation Teaching Award, given yearly to one faculty member at the University of Michigan, for excellence in undergraduate teaching. Prof. Rebeiz is the co-recipient, with Scott Barker, of the IEEE 2000 Microwave Prize. The paper detailed the development of "Wideband MEMS Switches and True-Time Delay Phase Shifters". Prof. Rebeiz is the author of the book RF MEMS, Theory, Design and Technology, published by Wiley in January 2003.

2003 N. Walter Cox Award

The N. Walter Cox Award has been established in recognition of the qualities of N. Walter Cox and his service to the MTT Society prior to his untimely death in 1988. It is given to a Society volunteer whose efforts on behalf of MTT-S best exemplify Walter's spirit and dedication.

No recipient this year.