

Appendices

Appendix A RLE Publications and Papers Presented

Appendix B Current RLE Personnel

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Appendix D RLE Research Support Index

Appendix A. RLE Publications and Papers Presented

The first section of this bibliography includes papers and talks presented by RLE faculty, staff and students during 1992 and is in alphabetical order by conference name. Reprints of these papers may be obtained by contacting the authors directly.

Section 2 includes an alphabetical listing by author of journal articles that were published and accepted or submitted for publication. Book chapters by RLE authors are listed in section 3. Section 4 of this bibliography lists RLE general publications and technical reports, and section 5 is a list of RLE theses submitted during 1992. Section 6 contains miscellaneous publications.

A.1 Meeting Papers

A.1.1 Papers Presented

ALAA Space Programs and Technologies Conference, Huntsville, Alabama, March 24-27, 1992.

Canizares, C.R., D. Dewey, E.B. Galton, T.H. Markert, H.I. Smith, M.L. Schattenburg, B.E. Woodgate, and S. Jordan. "The MIT High Resolution X-ray Spectroscopy Instruments on AXAF."

Acoustical Society of America Meeting, 123rd, Salt Lake City, Utah, May 11-15, 1992.

Baggeroer, A.B., and W.A. Kuperman. "Stochastic Matched Field Processing."

Chen, M.Y. "Acoustic Parameters of Nasal Utterances in the Hearing-impaired and Normal-hearing Speakers."

Johnson, M. "Using Beam Elements to Model the Vocal Fold Length in Breathly Voicing."

Manuel, S.Y. "Vowel Reduction and Perceptual Recovery in Casual Speech."

Acoustical Society of America Meeting, 124th, New Orleans, Louisiana, October 31-November 4, 1992.

Svirsky, M.A., and S.H. Svirsky. "A Multidimensional Mathematical Model of Vowel Perception by Users of Pulsatile Cochlear Implants."

Svirsky, M.A., K.N. Stevens, M.L. Matthies, and J.S. Perkell. "Tongue Surface Deformation During Obstruent Stop Consonants."

Wozniak, J.F., M.L. Matthies, J.S. Perkell, and H.L. Lane. "Timing and Magnitudes of Oral and Nasal Flow in Cochlear Implant Patients and Normals."

Advanced Heterostructure Transistors Conference, Keauhou-Kona, Hawaii, November 29 - December 4, 1992.

del Alamo, J.A., S.R. Bahl, and D.R. Greenberg. "In-P-Based High Breakdown Voltage HFETs."

Hu, Q., C. Eugster, and J.A. del Alamo. "Photon-assisted Quantum Transport in Quantum Point Contacts."

American Astronomical Society Meeting, Atlanta, Georgia, January 12-16, 1992.

Griffith, M., B.F. Burke, and A. Fletcher. "The Parkes-MIT-NRAO (PMN) Southern Sky Survey at 4850 MHz."

American Chemical Society Meeting, Washington, DC, August 24-28, 1992.

Pullman, D.P., Y.L. Li, J.J. Yang, and S.T. Ceyer. "Reaction Dynamics of F₂ on Xi(100)."

American Physical Society and the American Association of Physics Teachers Joint Meeting, Washington, DC, April 20-24, 1992.

Conde, M.E., G. Bekefi, and J.S. Wurtele. "Tests of a 33 GHz High Gradient Accelerating Structure."

American Physical Society Meeting, Indianapolis, Indiana, March 16-20, 1992.

Aalberts, D.P., and A.N. Berker. "Hard-Spin Mean-Field Theory: Variational Free Energy and First-Order Phase Transitions."

Arias, T.A., and J.D. Joannopoulos. "Impurity Segregation at Grain Boundaries."

Bailey, D.W., C.J. Stanton, M. Ulman, L.H. Acioli, and J.G. Fujimoto. "Tunable Pump-probe Nonlinear Absorption Spectroscopy in AlGaAs."

Berker, A.N., and R.R. Netz. "Smectic C Order, In-Plane Domains, and Nematic Reentrance in

- a Frustrated Microscopic Model of Liquid Crystals."
- Dal Pino, A., Jr., A.M. Rappe, and J.D. Joannopoulos. "Isovalent Impurities and Related Defects in Silicon."
- Hu, Q., R.A. Wyss, C.C. Eugster, and J. del Alamo. "Photon-Assisted Transport through Quantum Point Contacts."
- Joannopoulos, J.D. "The Enchanting Properties of Oxygen Atoms in Silicon" (invited talk).
- Kumar, A. "Electron States and Potentials in Quantum Dot Structures."
- Meade, R.D., K.D. Brommer, J.D. Joannopoulos, and A.M. Rappe. "Localization, Defects and Surfaces of Photonic Crystals."
- Netz, R.R. "Symmetry-Breaking Fields in Frustrated Ising Systems on Square and Cubic Lattices."
- Sanders, G.D., C.J. Stanton, and Y.C. Chang. "Theory of Optical Gain in Silicon Quantum Wire Lasers."
- Stanton, C.J., and D.W. Bailey. "Rate Equations for the Study of Intervalley Scattering in Compound Semiconductors."
- Zhao, Y., D.C. Tsui, K. Hirakawa, M. Santos, M. Shayegan, R. Ghanbari, D.A. Antoniadis, and H.I. Smith. "Far Infrared Magneto-Absorption by the 2 DEG in GaAs/AlGaAs Heterostructures with Grid Gates."
- American Physical Society, Division of Plasma Physics, Annual Meeting, Seattle, Washington, November 16-20, 1992*
- Bers, A., A.K. Ram, and G. Bekefi. "Linear Analysis of the Double Stream Cyclotron Maser."
- Chen, C. "Theory of Cyclotron Resonance Laser Accelerator."
- Migliuolo, S. "Impurity Modes in Sheared Magnetic Fields."
- Migliuolo, S., P.T. Bonoli, and M. Porkolab. "Fast Wave Heating in JET and SSAT; A Comparison."
- Nassi, M., B. Coppi, and L.E. Sugiyama. "Approach to Ignition by Compact Experiments."
- Ram, A.K., A. Bers, V. Fuchs, R.W. Harvey, and M.G. McCoy. "Current Drive by Lower Hybrid Waves in Presence of Fast Alfvén Waves."
- Sugiyama, L.E., and B. Coppi. "Heating Schemes for High Beta Tokamak Fusion Experiments."
- American Physical Society Meeting, Seattle, Washington, March 22-26, 1993.*
- Berker, A.N., and K. Hui. "Closed-Form Expression for the Global Phase Diagram of the Ising Model on the Square Lattice with Crossed Diagonal Bonds."
- Netz, R.R., and A.N. Berker. "Renormalization-Group Theory of an Internal Critical Endpoint Structure: The Blume-Emery-Griffiths Model with Biquadratic Repulsion."
- American Society of Mechanical Engineers, Annual Winter Meeting, Anaheim, California, November 8-13, 1992.*
- Srinivasan, M.A., and K. Dandekar. "Role of Fingertip Geometry in the Transmission of Tactile Mechanical Signals."
- Srinivasan, M.A., R.J. Gulati, and K. Dandekar. "In Vivo Compressibility of the Human Fingertip."
- Tan, H.Z., X.D. Pang, and N.I. Durlach. "Manual Resolution of Length, Force, and Compliance."
- American Vacuum Society Meeting, Chicago, Illinois, November 9-13, 1992.*
- Pullman, D.P., Y.L. Li, J.J. Yang, and S.T. Ceyer. "Reaction Dynamics of F₂ on Si(100)."
- Smith, H.I., and M.L. Schattenburg. "Proximity X-ray Nanolithography: Current Performance and Theoretical Limits."
- Applied Superconductivity Conference, Chicago, Illinois, August 23-28, 1992.*
- Lam, C-W., S.M. Ali, and D.E. Oates. "Modeling of the Nonlinear Resistance of Superconducting Striplines."
- Lee, L.H., S.M. Ali, W.G. Lyons, D.E. Oates, and J.D. Goettee. "Analysis of Superconducting Transmission-Line Structures for Passive Microwave Device Applications."
- Asilomar Conference on Signals, Systems, and Computers, 20th Annual, Pacific Grove, California, October 26-28, 1992.*
- Lim, J.S. "Design of HDTV System."
- Association for Research in Otolaryngology Meeting, 15th, St. Petersburg, Florida, February 2-6, 1992.*

- Merchant, S.N., M.E. Ravicz, and J.J. Rosowski. "The Acoustic Input Impedance of the Stapes and Cochlea in Human Temporal Bones" (poster presentation).
- Association for Research in Vision and Ophthalmology*, Sarasota, Florida, May 3-8, 1992.
- Hee, M.R., E.A. Swanson, D. Huang, J.A. Izatt, C.P. Lin, J.S. Schuman, C.A. Puliafito, and J.G. Fujimoto. "Optical Coherence Tomography."
- Izatt, J.A., E.A. Swanson, M.R. Hee, D. Huang, J. Schuman, C.P. Lin, C.A. Puliafito, and J.G. Fujimoto. "Quantitative Assessment of Cataract Development with Optical Coherence Domain Reflectometry and Optical Coherence Tomography."
- CLEO/QELS-Conference on Lasers and Electro-Optics/Quantum Electronics and Laser Science*, Anaheim, California, May 10-15, 1992.
- Brener, I., M. Zahler, G. Lenz, J. Salzman, E. Cohen, and L. Pfeiffer. "Experimental Evidence of Bragg Confinement of Carriers in a Quantum Barrier."
- Doerr, C.R., K. Bergman, M. Shirasaki, and H.A. Haus. "Stabilization of Squeezing with a Non-linear Fiber Interferometer."
- Hall, K.L., G. Lenz, and E.P. Ippen. "Novel, Heterodyne Pump-Probe Measurement of Femtosecond Nonlinearities in Waveguides."
- Hon, S., K. Bergman, A. Mecozzi, and H.A. Haus. "Noise Spectra of Mode-Locked Laser Pulses."
- Hultgren, C.T., D.J. Dougherty, and E.P. Ippen. "Femtosecond Gain and Refractive Index Nonlinearities in AlGaAs Diode Laser Amplifiers."
- Jacobson, J.M., A.G. Jacobson, K. Naganuma, H.A. Haus, and J.G. Fujimoto. "Generation of 28 fs Pulses from a Ti:Al₂O₃ Laser Using Second and Third Order Intracavity Dispersion Compensation."
- Pang, L.Y., J.G. Fujimoto, and E.S. Kintzer. "High-Power Mode-Locked Diode Array Using Intracavity Nonlinearity."
- Pritchard, D.E. "Atom Interferometry."
- Swanson, E., M. Hee, D. Huang, J.A. Izatt, J.G. Fujimoto, C.P. Lin, J.S. Schuman, and C.A. Puliafito. "Optical Coherence Tomography."
- Ulman, M., L.H. Acioli, C.J. Stanton, E.P. Ippen, and J.G. Fujimoto. "Studies of Intervalley Scattering Using Tunable Femtosecond Pulses."
- Ulman, M., L.H. Acioli, F. Vallee, E.P. Ippen, D. Bailey, C.J. Stanton, and J.G. Fujimoto. "Femtosecond Carrier Dynamics in AlGaAs."
- Conference on the Role of Wavelets in Signal Processing Applications*, Wright-Patterson Air Force Base, Ohio, March 11-13, 1992.
- Wornell, G.W., and A.V. Oppenheim. "Wavelets, Self-Similar Signals, and Fractal Modulation."
- Conference on Imaging in Ophthalmology*, San Antonio, Texas, June 26-27, 1992.
- Huang, D., E.A. Swanson, J.A. Izatt, M.R. Hee, C.P. Lin, J. Schuman, T. Flotte, C.A. Puliafito, and J.G. Fujimoto. "Optical Coherence Tomography."
- Convention of the Association for Late Deafened Adults*, Annual, Boston, Massachusetts, September 10-13, 1992.
- Reed, C.M., and L.A. Delhorne. "Field Study of Deaf Adult Users of Tactaid II and Tactaid VII."
- Czechoslovak Society of Arts and Sciences (SVU)*, Prague and Bratislava, Czechoslovakia, June 26 - July 2, 1992.
- Bekefi, G. "The Free Electron Laser—A New Source of Coherent Photons."
- DARPA Automatic Sensor Interpretation Workshop*, Fairfax, Virginia, October 1-2, 1992.
- Wornell, G.W. "Detection of Fractal Signals Using Wavelets."
- DARPA Symposium on Photonics Systems for Antenna Applications*, Third Annual, Monterey, California, January 20-22, 1993.
- Haus, H.A., and E.P. Ippen. "Optically Controlled Phased Array Radar."
- DARPA Meeting*, Semi-Annual, Daytona Beach, Florida, September 21-25, 1992.
- Devadas, S. "Synthesis for Testability and Low Power."
- DARPA Meeting*, Washington, DC, January 14-16, 1992.
- Lim, J.S. "Design of an HDTV System."

DARPA Semi-Annual Contractors Meeting, Salt Lake City, Utah, January 6-7, 1992.

Wyatt, J.L. "Analog VLSI for Robot Vision."

DARPA Ultra Electronics Program Review, Santa Fe, New Mexico, October 19-21, 1992.

Melngailis, J. "Nanofabrication by Focused Ion Beams."

DARPA Workshop on Computational Sensors, Philadelphia, Pennsylvania, May 11-12, 1992.

Wyatt, J.L. "Analog VLSI for Robot Vision."

Department of Defense Fiber Optic Conference, McLean, Virginia, March 23, 1992.

Haus, H.A., and K. Bergman. "Beating the Shot-Noise Limit with Squeezed Light."

Design Automation Conference, 29th, Anaheim, California, June 1992.

Devadas, S., K. Keutzer, S. Malik, and A. Wang. "Certified Timing Verification and the Transition Delay of a Circuit."

Ghosh, A., S. Devadas, K. Keutzer, and J. White. "Estimation of Average Power Dissipation in Combinational and Sequential Circuits."

Digital Signal Processing Workshop, Fifth, Starved Rock State Park, Illinois, September 13-16, 1992.

Isabelle, S.H. "Properties of a Class of Chaotic Signals."

Richard, M.D. "State Estimation with Chaotic Maps."

Wornell, G.W., and W.W. Lam. "Spectral Analysis on a Log-Frequency Scale and the Modeling of Scaling Behavior in Fractal Signals."

Division of Atomic, Molecular, and Optical Physics, Annual Meeting, Chicago, Illinois, May 20-22, 1992.

Paine, S., P. Chang, R. Lutwak, J. Holley, and D. Kleppner. "Millimeter-Wave Measurement of the Rydberg Frequency."

Drexel Symposium on Quantum Nonintegrability, Philadelphia, Pennsylvania, May 20-22, 1992.

Kleppner, D.E. "Quantum Chaos."

European Solid-State Circuits Conference, Copenhagen, Denmark, September 1992.

Hakkarainen, J.M., and H-S. Lee. "A 40x40 CCD/CMOS AVD Processor for Use in a Stereo Vision System."

Yu, P.C., and H-S. Lee. "A CMOS Resistive-fuse Processor for 2-D Image Acquisition, Smoothing and Segmentation."

European Space Agency Symposium on Targets for Space-Based Interferometry, Beaulieu, France, October 1992.

Burke, B.F. "Searching for Exoplanets."

Europhysics Topical Conference on RF Heating and Current Drive of Fusion Plasmas, Brussels, Belgium, July 7-10, 1992.

Harvey, R.W., M.G. McCoy, A.K. Ram, A. Bers, and V. Fuchs. "Scaling of Lower Hybrid Current Drive with Temperature."

Ram, A.K., A. Bers, V. Fuchs, R.W. Harvey, and M.G. McCoy. "Effects of Fast Alfvén Waves in Lower Hybrid Current Drive."

Frontiers in Education Conference, Nashville, Tennessee, November 12-15, 1992.

Troxel, D.E. "Digital Design Tools."

Future Vision 2002, Princeton, New Jersey, October 4-6, 1992.

Wyatt, J.L. "Analog VLSI for Robot Vision and Visual Prosthesis."

General Conference of the Condensed Matter Division of the European Physical Society, 13th, Regensburg, Germany, March 29-April 2, 1993.

Netz, R.R., and A.N. Berker. "Renormalization-Group Theory of the Blume-Emery-Griffiths Model with Repulsive Biquadratic Coupling."

Gordon Conference on Lasers in Medicine and Biology, New London, New Hampshire, July 6-10, 1992.

Fujimoto, J.G. "Optical Coherence Tomography."

Ground Target Modeling and Validation Conference, Third, Houghton, Michigan, August 18-20, 1992.

Hsu, C.C., Y.E. Yang, R.T. Shin, J.A. Kong, C. Kohler, T. Nguyen, H. Nguyen, and J. Ho. "Applications of EMSARS Background Model to MMW Vegetation Scattering Simulation."

- Hawaii International Conference on System Sciences*, 26th, Wailea, Hawaii, January 1993.
- Camposano, R., S. Devadas, K. Keutzer, S. Malik, and A. Wang. "Implicit Enumeration Techniques Applied to Asynchronous Circuit Verification."
- I.A.E.A. International Conference on Plasma Physics and Controlled Nuclear Fusion Research*, 14th, Wurzberg, Germany, September 30-Oct. 7, 1992.
- Coppi, B., P. Detragiache, S. Migliuolo, M. Nassi, B. Rogers, L. Sugiyama, and L. Zakharov. "Reconnection and Transport in High Temperature Regimes."
- IBM International Digital Video/HDTV/Multimedia Conference*, Somers, New York, December 8-10, 1992
- Lim, J.S. "HDTV/Digital TV Alliances and Consortia."
- IEEE International Conference on Acoustics, Speech, and Signal Processing*, San Francisco, California, March 23-26, 1992.
- Ayazifar, B, and J.S. Lim. "Pel-Adaptive Model-Based Interpolation of Spatially Subsampled Images."
- Beckmann, P.E., and B.R. Musicus. "A Group-Theoretic Framework for Fault-Tolerant Computation."
- Isabelle, S.H., A.V. Oppenheim, and G.W. Wornell. "Effects of Convolution on Chaotic Signals."
- Jachner, J., and H. Lee. "Cramer Rao Bounds on Direction Estimates for Closely Spaced Emitters in Multi-Dimensional Applications."
- Myers, C., A.C. Singer, F. Shin, and E. Church. "Modelling Chaotic Systems with Hidden Markov Models."
- Oppenheim, A.V., E. Weinstein, K.C. Zangi, M. Feder, and D. Gauger. "Single Sensor Active Noise Cancellation Based on the EM Algorithm."
- Oppenheim, A.V., G.W. Wornell, S.H. Isabelle, and K.M. Cuomo. "Signal Processing in the Context of Chaotic Signals."
- Preisig, J.C. "Optimal Minmax Estimation and the Development of Minmax Estimation Error Bounds."
- Singer, A.C., G.W. Wornell, and A.V. Oppenheim. "Codebook Prediction: A Non-linear Signal Modeling Paradigm."
- IEEE International Conference on Consumer Electronics*, Chicago, Illinois, June 2-4, 1992.
- Lim, J.S., P.A. Monta, J. Nicolas, J. Apostolopoulos, S. Cheung, W. Paik, E. Krause, and V. Liu. "Channel-Compatible Digicipher HDTV System."
- IEEE International Electronics Technical Conference (ELECTRO/92)*, Boston, Massachusetts, May 13, 1992.
- McIlrath, M.B. "Semiconductor Process Representation and Device Design."
- IEEE International Plasma Science Conference*, 19th, Tampa, Florida, June 1-3, 1992.
- Bekefi, G. "Double Stream Cyclotron Maser."
- Conde, M.E., and G. Bekefi. "A High-Efficiency 33 GHz Free-Electron Laser with a Reversed Axial Magnetic Field."
- Ram, A.K., C. Chen, A. Bers, W. Hu, and G. Bekefi. "Linear and Nonlinear Analysis of the Double Stream Cyclotron Maser" (poster session).
- Taylor, C.J., M.E. Conde, G. Bekefi, G. Shvets, and J.S. Wurtele. "Observations of Frequency Upshifts in a Raman, Free-Electron Laser Amplifier" (poster session).
- IEEE Joint Symposia American Physical Society/Union of Radio Science/NEM Meeting*, Chicago, Illinois, July 18-25, 1992.
- Wornell, G.W. "Wavelet Representations for Self-Similar Signals and Systems."
- Xia, J., A.K. Jordan, and J.A. Kong. "Electromagnetic Profile Reconstruction Using the Riccati Equation Approach."
- IEEE MTT-S International Microwave Symposium*, Albuquerque, New Mexico, June 1-5, 1992.
- Lam, C.W., D.M. Sheen, S.M. Ali, and D.E. Oates. "Nonlinear Model of Superconducting Strip Transmission Lines."
- IEEE Systems Readiness and Automatic Testing Conference*, Dayton, Ohio, September 21-24, 1992.
- Chu, A., H.M. Cronson, J.F. Devine, S. Soares, M.N. Solomon, H.J. Lezec, and C.R. Musil. "RF Built-In Test and Enabling Technologies for Integrated Diagnostics."

IEEE Workshop on Visual Signal Processing and Communications, Raleigh, North Carolina, September 2-3, 1992.

Apostolopoulos, J.G., and J.S. Lim. "Coding of the Motion-Compensated Residual for an All-Digital System."

Intelligent Vehicles Symposium, Detroit, Michigan, June 29-July 1, 1992.

Wyatt, J.L., Jr., C. Keast, M. Seidel, D. Standley, B. Horn, T. Knight, C. Sodin, and H-S. Lee. "Small, Fast Analog VLSI Systems for Early Vision Processing."

International Center for Condensed Matter Physics Conference on Nonlinear and Quantum Optics, Brasilia, Brazil, October 19-23, 1992.

Fujimoto, J.G. "Femtosecond Pulse Generation in Solid State and Diode Lasers."

International Colloquium on X-ray Lasers, Third, Schliersee, Germany, May 18-22, 1992.

Basu, S., J. Goodberlet, M. Muendel, S. Kaushik, and P.L. Hagelstein. "Spectral Measurements of Ni-like Mo Plasma."

International Conference on the Fundamental Aspects of Quantum Theory, Columbia, South Carolina, December 9-12, 1992.

Pritchard, D.E. "Experiments Using Atom Interferometers."

International Conference on the Physics of Semiconductors, 21st, Beijing, China, August 10-14, 1992.

Zhao, Y., D.C. Tsui, K. Hirakawa, M. Santos, M. Shayegan, R. Ghanbari, D.A. Antoniadis, and H.I. Smith. "Far Infrared Magneto-Absorption by the 2 DEG in GaAs/AlGaAs Heterostructures with Grid Gates."

International Conference on Atomic Masses and Fundamental Constants, Ninth, Bernkastel-Kues, Germany, July 19-24, 1992.

Natarajan, V., K.R. Boyce, F. DiFilippo, and D.E. Pritchard. "Improved Precision Mass Comparison in a Penning Trap—Techniques and Results."

International Conference on Atomic Physics, 13th, Munich, Germany, August 3-7, 1992.

Joffe, M.A., W. Ketterle, A. Martin, and D.E. Pritchard. "Transverse Cooling and Deflection

of an Intense Atomic Beam Inside a Zeeman Slower."

International Conference on Computer Design: VLSI in Computers and Processors, Cambridge, Massachusetts, October 1992.

Devadas, S., H-F. Jyu, K. Keutzer, and S. Malik. "Statistical Timing Analysis of Combinational Logic Circuits."

International Conference on Computer-Aided Design, Santa Clara, California, November 7-12, 1992.

Allen, J. "Curriculum Change Plan: First Professional Degree in Five Years."

Armstrong, R.C., and J. Allen. "FICOM: A Framework for Incremental Consistency Maintenance in Multi-Representation, Structural VLSI Databases."

Devadas, S., K. Keutzer, S. Malik, and A. Wang. "Verification of Asynchronous Interface Circuits with Bounded Wire Delays."

Ghosh, A., A. Shen, S. Devadas, and K. Keutzer. "On Average Power Dissipation and Random Pattern Testability of Combinational Logic Circuits."

Kamon, M., M.J. Tsuk, C. Smithhisler, and J. White. "Efficient Techniques for Inductance Extraction of Complex 3-D Geometries."

Pillage, L., Z. Cendes, J. White. "Interconnect and Packaging Tutorial."

Shen, A., A. Ghosh, S. Devadas, and K. Keutzer. "On Average Power Dissipation and Random Pattern Testability of CMOS Combinational Logic Networks."

Van Aelten, F., S.Y. Liao, J. Allen, and S. Devadas. "Automatic Generation and Verification of Sufficient Correctness Properties for Synchronous Processors."

International Conference on Industrial Electronics, Control, and Instrumentation, San Diego, California, November 1992.

Masaki, I. "Function-oriented Vision Chips for Factory Automation."

International Conference on InP and Related Materials, Fourth, Newport, Rhode Island, May 21-24, 1992.

Bahl, S.R., B.R. Bennett, and J.A. del Alamo. "A High-Voltage, Doubly-Strained $\text{In}_{0.41}\text{Al}_{0.59}\text{As}/\text{n}^+-\text{In}_{0.65}\text{Ga}_{0.35}\text{As}$ HFET."

International Conference on Ion Beam Modification of Materials, Eighth, Heidelberg, Germany, September 7-11, 1992.

Melngailis, J. "Focused Ion Beam Lithography."

International Conference on Solid State Devices and Materials, Tsukuba, Japan, August 26-28, 1992.

Smith, H.I., and D.A. Antoniadis. "Mesoscopic Devices: Will They Supersede Transistors in ULSI?"

International Conference on Spoken Language Processing, Banff, Canada, October 12-16, 1992.

Bickley, C.A., and S. Hunnicutt. "Acoustic Analysis of Laughter."

Manuel, S.Y., S. Shattuck-Hufnagel, M. Huffman, K.N. Stevens, R. Carlson, and S. Hunnicutt. "Studies of Vowel and Consonant Reduction."

Ross, K., M. Ostendorf, and S. Shattuck-Hufnagel. "Factors Affecting Pitch Accent Placement."

Shattuck-Hufnagel, S. "Stress Shift as Pitch Accent Placement: Within-Word Early Accent Placement in American English."

Stevens, K.N., S.Y. Manuel, S. Shattuck-Hufnagel, and S. Liu. "Implementation of a Model for Lexical Access Based on Features."

Williams, D.R., C.A. Bickley, and K.N. Stevens. "Inventory of Phonetic Contrasts Generated by High-Level Control of a Formant Synthesizer."

International Conference on Tactile Aids, Hearing Aids, and Cochlear Implants, Second, Stockholm, Sweden, June 9-12, 1992.

Reed, C.M., L.A. Delhorne, and N.I. Durlach. "Results Obtained with Tactaid II and Tactaid VII."

Reed, C.M., N.I. Durlach, and L.A. Delhorne. "Historical Overview of Tactile Aid Research."

International Conference on Thermodynamics and Statistical Mechanics, Berlin, Germany, August 2-8, 1992.

Berker, A.N. "Critical Behavior Induced by Quenched Disorder."

Netz, R.R., and A.N. Berker. "Smectic C/A₂ Order, Domains, Reentrance in a Microscopic Model of Liquid Crystals."

International Conference on Ultrafast Phenomena, Eighth, Antibes, Juan-Les-Pins, France, June 8-12, 1992.

Pang, L.Y., J.G. Fujimoto, and E.S. Kintzer. "Ultrashort Pulse Generation from High Power Diode Arrays Using Intracavity Nonlinearities."

International Electromagnetic Compatibility Symposium, Singapore, December 7-9, 1992.

Kong, J.A. "Progress in Electromagnetics and Future Developments."

International Free Electron Laser Conference, Kobe, Japan, August 1992.

Jerby, E., G. Bekefi, and T. Hara. "Self and Active Mode-locking in a Free-electron Laser Oscillator - Experiments and Theory."

International Geoscience and Remote Sensing Symposium, Houston, Texas, May 26-29, 1992.

Beaudoin, A., T. Le Toan, C.C. Hsu, H.C. Han, J.A. Kong, R.T. Shin. "Simulation of Forest Backscatter as a Function of Forest and Ground Parameters."

Han, H.C., J.A. Kong, R.T. Shin, S.V. Nghiem, and R. Kwok. "Application of Theoretical Models to Active and Passive Remote Sensing of Saline Ice."

Hsu, C.C., H.C. Han, R.T. Shin, J.A. Kong, A. Beaudoin, and T. LeToan. "Radiative Transfer Theory for Polarimetric Remote Sensing of Pine Forest."

Nghiem, S.V., R. Kwok, J.A. Kong, R.T. Shin, A.J. Gow, and S.A. Arcone. "Effective Permittivity of Saline Ice Under Thermal Variation."

International Organization for Standardization Coding of Moving Pictures and Associated Audio (ISO-MPEG), London, England, November 2-6, 1992.

Apostolopoulos, J., and J.S. Lim. "Position-Dependent Runlength Encoding."

International Quantum Electronics Conference, Vienna, Austria, June 14-19, 1992.

Huang, D., E.A. Swanson, M. Hee, J.A. Izatt, C.P. Lin, J.S. Schuman, C.A. Puliafito, and J.G. Fujimoto. "Optical Coherence Domain Reflectometry and Optical Coherence Tomography."

Kärtner, F.X., and H.A. Haus. "Classical and Quantum Dynamics of a Pulse Propagating through a Nonlinear Fiber."

- Wong, N.C., D. Lee, and L.R. Brothers. "Tunable Optical Frequency Division."
- International Radio Science Union Specialists Meeting on Microwave Radiometry and Remote Sensing*, Boulder, Colorado, January 24-26, 1992.
- Kong, J.A. "Theoretical Modeling for Passive Microwave Remote Sensing of Earth Terrain."
- Rosenkranz, P.W. "Emission and Absorption of Microwaves by Atmospheric Oxygen and Water Vapor."
- Staelin, D.H. "Passive Microwave Observations of Atmospheric Parameters from Space."
- International Sherwood Fusion Theory Conference*, Santa Fe, New Mexico, April 6-8, 1992.
- Coppi, B., and S. Migliuolo. "The Isotopic Effect and Impurity Drift Modes."
- Coppi, B., M. Nassi, and L. Sugiyama. "Physics Principles of Ignition Experiments."
- Detragiache, P., and B. Coppi. "Magnetic Topology Transitions in Collisionless Plasmas."
- Migliuolo, S. "Impurity Effects on Toroidal ITG Modes."
- Pegoraro, F., and B. Coppi. "Energy and Current Transport: Symmetry Breaking and Degradation."
- Ram, A.K., A. Bers, V. Fuchs, R.W. Harvey, and M.G. McCoy. "Current Drive by Lower Hybrid Waves in Combination with Fast Alfvén Waves."
- Sugiyama, L.E., and W. Park. "A Three Dimensional, Toroidal Two Fluid Model with Hot Particles."
- International Solid-State Circuit Conference*, San Francisco, California, February 1993.
- Yu, P.C., and H-S. Lee. "A High-Swing 2-V CMOS Operational Amplifier with Grain Enhancement Using a Replica Amplifier."
- International Symposium on Circuits and Systems*, San Diego, California, May 10-13, 1992.
- Wyatt, J.L., Jr., C. Keast, M. Seidel, D. Standley, B. Horn, T. Knight, C. Sodini, H-S. Lee, and T. Poggio. "Analog VLSI Systems for Early Vision Processing."
- International Symposium on Electron, Ion, and Photon Beams*, 36th, Orlando, Florida, May 26-31, 1992.
- Carter, J.M., D.B. Olster, M.L. Schattenburg, A. Yen, and H.I. Smith. "Spatially-coherent, Large-area, Free-standing Gratings for Atom Interferometry Produced Using Holographic Lithography."
- Chu, W., C.C. Eugster, A. Moel, E.E. Moon, J.A. del Alamo, and H.I. Smith. "Conductance Quantization in a GaAs Electron Waveguide Device Fabricated by X-ray Lithography."
- Ghanbari, R.A., M. Burkhardt, D.A. Antoniadis, H.I. Smith, M.R. Melloch, K.W. Rhee, and M.C. Peckerar. "Comparative Mobility Degradation in Modulation-doped GaAs Devices after E-beam and X-ray Irradiation."
- Ghanbari, R.A., W. Chu, E.E. Moon, M. Burkhardt, K. Yee, D.A. Antoniadis, H.I. Smith, M.L. Schattenburg, K.W. Rhee, R. Bass, M.C. Peckerar, and M.R. Melloch. "Fabrication of Parallel Quasi-one-dimensional Wires Using a Novel Conformable X-ray Mask Technology."
- Hector, S.D., M.L. Schattenburg, E.H. Anderson, W. Chu, U. Wong, and H.I. Smith. "Modeling and Experimental Verification of Illumination and Diffraction Effects on Image Quality in X-ray Lithography."
- Ku, Y.C., M.H. Lim, J.M. Carter, M.K. Mondol, A. Moel, and H.I. Smith. "Correlation of In-Plane and Out-of-Plane Distortion in X-ray Lithography Masks."
- Xu, X, A.D. Della Ratta, J. Sosonkina, and J. Melngailis. "Focused Ion Beam Induced Deposition and Ion Milling as a Function of Angle of Ion Incidence."
- Ion Cyclotron Radio Frequency Modeling and Theory Workshop*, Princeton, New Jersey, August 17-18, 1992.
- Ram, A.K., A. Bers, V. Fuchs, R.W. Harvey, and M.G. McCoy. "Effects of ICRF Waves on Lower Hybrid Current Drive."
- Issues in Advanced Hearing Aid Research*, Lake Arrowhead, California, May 25-29, 1992.
- Zurek, P.M., and J.E. Greenberg. "Current Research on Adaptive Beamforming for Hearing Aids."
- Journées Microelectronique et Optoelectronique III-V*, Fourth, Al Grande Motte, France, October 21-23, 1992.

- Dumas, J.M., P. Audren, M.P. Favennec, S. Praquin, S.R. Bahl, and J.A. del Alamo. "Une Etude des Niveaux Profonds dans le Transistor à Effet de Champ de Puissance à Hétérostructure InAlAs/n⁺ - InGaAs"
- MIT/Brown Conference on Advanced Research in VLSI and Parallel Systems*, Providence, Rhode Island, March 25-27, 1992.
- Devadas, S., K. Keutzer, S. Malik, and A. Wang. "Event Suppression: Improving the Efficiency of Timing Simulation for Synchronous Digital Circuits."
- Van Aelten, F., J. Allen, and S. Devadas. "Compositional Verification of Systems with Synchronous Globally Timed Control."
- Materials Research Society Symposium*, San Francisco, California, April 27-May 1, 1992.
- Coronado, C.A., E. Ho, L.A. Kolodziejski, and C.A. Huber. "Laser-Assisted Growth of ZnSe by Metalorganic Molecular Beam Epitaxy."
- Materials Science Seminar*, Hanover, New Hampshire, January 14-15, 1993.
- Kolodziejski, L.A. "Photo-Assisted Metalorganic Molecular Beam Epitaxy of ZnSe."
- National Association of Broadcasters Meeting*, Las Vegas, Nevada, April 11-16, 1992.
- Lim, J.S. "HDTV Research at MIT-ATRP."
- National Center for Integrated Photonic Technology*, Annual Review of Photonics, Newport Beach, California, July 9-10, 1992.
- Haus, H.A. "Optically Controlled Phased Array Antennas and Components."
- Ippen, E.P. "Ultrafast Photonics (plenary talk)."
- National Center for Integrated Photonic Technology*, Fall Meeting, Columbia University, New York, New York, December 4-6, 1992.
- Haus, H.A. "Integrated Resonant Optical Filter and Some of Its Applications."
- Hultgren, C.T., D. Dougherty, K.L. Hall, G. Lenz, and E.P. Ippen. "Dynamic Nonlinearities in Active Waveguides."
- National Radio Science Meeting*, Boulder, Colorado, January 7-10, 1992.
- Xia, J., T.M. Habashy, R.T. Shin, and J.A. Kong. "The Renormalized STIE Approach Applied to Inversion of Soil Moisture Profiles."
- National Science Foundation Workshop on Spoken Language Understanding*, Arlington, Virginia, February 10-11, 1992.
- Stevens, K.N. "Review of Speech Recognition Research in Speech Group of RLE."
- National Science Foundation-Quantum Electronics, Waves, and Beams Workshop*, Third, New York, New York, June 4-5, 1992.
- Bers, A. "Waves and Chaos in the Electrodynamics of Plasmas."
- New England Molecular Beam Epitaxy Workshop*, Seventh, Cambridge, Massachusetts, May 13, 1992.
- Bahl, S.R., B.R. Bennett, and J.A. del Alamo. "High Quality Heterostructures for Doubly-Strained InAlAs/InGaAs HFETs."
- Optcon '92*, Boston, Massachusetts, November 15-20, 1992.
- Smith, H.I. "History of X-ray Lithography."
- Optical Fiber Communication Conference*, San Jose, California, February 2-7, 1992.
- Damask, J.N., and H.A. Haus. "Wavelength-Division (DE) Multiplexing Using Cascaded DFB Filters."
- Mecozzi, A., J.D. Moores, H.A. Haus, and Y. Lai. "Modulation and Filtering Control of Soliton Transmission."
- Optical Society of America Meeting*, Annual, Albuquerque, New Mexico, September 20-25, 1992.
- Bergman, K., C. Doerr, H.A. Haus, and M. Shirasaki. "Subquantum Limit Measurements with Optical Pulses."
- Fujimoto, J.G. "Femtosecond Lasers and Ultrafast Measurement Techniques."
- Haus, H.A. "Control Filters for Repeaterless Soliton Transmission (invited talk)."
- Pritchard, D.E. "Atom Optics and Atom Interferometers."
- Shapiro, J.H., and K-X. Sun. "Direct Detection of Gaussian State Light."
- Shapiro, J.H., and N.C. Wong. "Optical Amplifiers, Phase-Shift Keying, and Signal-to-Noise Ratio."
- Sun, K-X., N.C. Wong, and J.H. Shapiro. "Squeezed Amplification with Cavity Detunings: Mean-Field Behavior."

- Sun, K-X., and J.H. Shapiro. "Squeezed Amplification with Cavity Detunings: Noise Behavior."
- Wong, N.C., and D. Lee. "Optical Frequency Division Using a Parametric Oscillator."
- Optical Society of America Topical Meeting on Non-linear Optics*, Maui, Hawaii, August 17-21, 1992.
- Haus, H.A., E.P. Ippen, and K. Tamura. "Additive Pulse Modelocking in Fiber Lasers."
- Optical Society of America Topical Meeting*, New Orleans, Louisiana, April 13-15, 1992.
- Ippen, E.P. "Ultrafast Waveguide Optics" (plenary talk)
- Xia, J.J., and J.A. Kong. "Electromagnetic Inverse Scattering in Remote Sensing."
- Optical Society of America Topical Meeting on Ultrafast Electronics and Opto-electronics*, San Francisco, California, January 25-27, 1993.
- Ippen, E.P. "Ultrafast Dynamics in Active Semiconductor Waveguides."
- Physical Electronics Conference*, Irvine, California, June 20-25, 1992.
- Li, Y.L., J.J. Yang, D.P. Pullman, and S.T. Ceyer. "Reaction Dynamics of F₂ on Xi(100)."
- Quantum Electronics and Laser Science Conference*, Baltimore, Maryland, May 2-7, 1993.
- Joneckis, L.G., and J.H. Shapiro. "Quantum Propagation in Single-Mode Fiber."
- SPIE Conference on Frequency Stabilized Lasers and Their Applications*, Boston, Massachusetts, November 15-20, 1992.
- Lee, D., and N.C. Wong. "A High-Performance Tunable Optical Parametric Oscillator."
- SPIE International Society for Optical Engineering*, Los Angeles, California, January 14-21, 1993.
- Bekefi, G., P. Catravas, C. Chen, and I. Mastovsky. "Experimental and Theoretical Studies of the Proposed MIT Relativistic Klystron Amplifier."
- Catravas, P., C. Chen, and G. Bekefi. "Dispersion Characteristics of a Two-Stream Relativistic Klystron Amplifier."
- Chen, C., W. Hu, and G. Bekefi. "Two-Dimensional Nonlinear Theory of Double-Stream Cyclotron Masers."
- SPIE International Society for Optical Engineering*, Los Angeles, California, January 19-24, 1992.
- Bekefi, G., A. Bers, and A. Ram. "Double Stream Cyclotron Maser."
- Chen, C., P. Catravas, and G. Bekefi. "Design Studies of a 3.3-GHz Relativistic Klystron Amplifier."
- Conde, M.E., and G. Bekefi. "Experimental Study of a 33.3 GHz Free-Electron Laser Amplifier with a Reversed Axial Guide Magnetic Field."
- SPIE International Symposium on Optical Applied Science and Engineering*, San Diego, California, July 19-24, 1992
- Elfadel, I.M., and A.L. Yuille. "Mean-Field Phase Transitions for Gibbs Random Fields."
- SPIE International Symposium on Optical Engineering and Photonics*, San Jose, California, March 7-9, 1992.
- Smith, H.I., and M.L. Schattenburg. "Why Bother with X-ray Lithography?"
- Sea Ice Workshop*, Hanover, New Hampshire, October 13-15, 1992.
- Kong, J.A. "Sea Ice Remote Sensing Modeling."
- Semiconductor Research Corporation/DARPA Computer-Integrated Manufacturing of Integrated Circuits Workshop*, Seventh Annual, Stanford, California, August 5-6, 1992.
- Boning, D.S., D.E. Troxel, M.B. McIlrath, M.L. Heytens, D.A. Antoniadis, and P. Penfield. "CAFE: A System for VLSI Technology Complexity Management."
- Ha, S., E. Sachs, and D.E. Troxel. "On-Line Control of Uniformity in Single Wafer Plasma Etch Process."
- McIlrath, M.B. "Process Representation for TCAD Frameworks."
- Troxel, D.E., D.P. McNabb, and M.B. McIlrath. "Dynamically Modified PFR Based Fabrication in a Realistic IC Laboratory."
- Semiconductor Research Corporation X-ray Lithography Review*, Stoughton, Wisconsin, October 20-22, 1992.
- Melngailis, J. "X-ray Lithography Masks Made by Focused Ion Beams."

Sub-Arcsecond Radio Astronomy Meeting, Manchester, England, July 20-24, 1992.

Burke, B.F. "Einstein Rings and Einstein Quads."

Conner, S., A. Fletcher, L. Herold, and B.F. Burke. "The MIT-Green Bank-VLA Gravitational Lens Search: Prospects for Detecting a Population of Small Angular Size Lens Systems" (poster session).

Symposium on Frequency Control, 46th Annual, Hershey, Pennsylvania, May 27-29, 1992.

Wong, N.C., and D. Lee. "Optical Parametric Division."

Symposium on VLSI Circuits, Seattle, Washington, June 1992.

Keast, C.L., and C.G. Sodini. "A CCD/CMOS Based Imager with Integrated Focal Plane Signal Processing."

Topical Meeting on Electrical Performance of Electronic Packaging, Tucson, Arizona, April 1992.

Lee, L.H., G. Arjavalingham, S.M. Ali, and T.R. Dinger. "Hybrid-mode Analysis of Coplanar Strips and Coplanar Waveguides."

U.S.-Japan Workshop on Ion Temperature Gradient Turbulence, University of Texas, Austin, Texas, January 11-14, 1993.

Migliuolo, S. "Ion Temperature Gradient Driven Impurity Modes."

U.S.-Japan Workshop on Non-Inductive Current Drive and Profile Control, Princeton, New Jersey, December 14-16, 1992.

Ram, A.K., A. Bers, V. Fuchs, R.W. Harvey, and M.G. McCoy. "Effect of ICRF Waves on Lower Hybrid Current Drive."

University of Maryland Department of Electrical Engineering Seminar, College Park, Maryland, December 11, 1992.

Melngailis, J. "Focused Ion Beam Microfabrication."

Workshop on Advanced Accelerator Concepts, Third, Port Jefferson, New York, June 14-20, 1992.

Conde, M.E., and G. Bekefi. "A High Efficiency 33 GHz Free Electron Laser with a Reversed Axial Magnetic Field."

Conde, M.E., G. Bekefi, J.S. Wurtele, P. Volfbeyn, and K. Ricci. "Tests of a 33 GHz High Gradient Accelerating Structure."

Workshop on Atom Optics and Atom Interferometry, Konstanz, Germany, June 9-12, 1992.

Ekstrom, C.R. "Squared Beam Experiments with a Three Grating Atom Interferometer."

Workshop on Compound Semiconductor Microwave Materials and Analog Devices, San Antonio, Texas, February 17-19, 1992.

Bahl, S.R., B.R. Bennett, and J.A. del Alamo. "Doubly-Strained InAlAs/n⁺-InGaAs HFETs."

Fonstad, C.G. "Quantum-Wave Tunnel Barrier n-n-n Transistors."

Workshop on High Power Ion Cyclotron Resonance Frequency Antenna Design and Physics, Sixth, Boulder, Colorado, January 20-22, 1993.

Sugiyama, L., M. Nassi, and B. Coppi. "Predicted Ignition Scenarios in Ignitor and the Role of ICRH."

Workshop on Nanostructure Fabrication for Opto/Electronics, Los Angeles, California, August 14-15, 1992.

Smith, H.I. "X-ray Nanolithography for Optoelectronic Integrated Circuits."

Workshop on Numerical Modeling of Processes and Devices for Integrated Circuits, Seattle, Washington, May 31-June 1, 1992.

Nabors, K., and J. White. "An Improved Approach to Including Conformal Dielectrics in Multipole-Accelerated Three-dimensional Capacitance."

Reicheit, M.W., J. White, and J. Allen. "Waveform Frequency-Dependent Overrelaxation for Transient Two-Dimensional Simulation of MOS Devices."

A.1.2 Papers to be Presented

IEEE MTT-S International Microwave Symposium, Atlanta, Georgia, June 1993.

Lee, L.H., S.M. Ali, W.G. Lyons, R.S. Withers, and T.P. Orlando. "Full-wave Analysis of Superconducting Microstrip Lines on Sapphire Substrates."

Summer School on Recent Developments in Statistical Physics, Istanbul, Turkey, July 26-August 6, 1993.

Berker, A.N. "Phase Transitions in Disordered Systems."

A.1.3 Published Meeting Papers

Bers, A., and A.K. Ram. "Lower Hybrid and Fast Wave Current Drive-Status of Theory." *Proceedings of the I.A.E.A. Technical Meeting on Fast Wave Current in Reactor Scale Tokamaks (Synergy and Complementarity with LHCD and ECRH)*, Arles, France, September 23-25, 1991.

Chow, C.C., A. Bers, and A.K. Ram. "Spatiotemporal Chaos in the Langmuir Decay and its Implications on the Saturation of SRS." *Proceedings of the 22nd Anomalous Absorption Conference*, Lake Placid, New York, July 12-17, 1992.

Conde, M.E., and G. Bekefi. "Experimental Study of a 33.3 GHz Free-Electron Laser Amplifier with a Reversed Axial Guide Magnetic Field." *Proceedings of SPIE*, Los Angeles, California, January 20-24, 1992. Vol. 1629 Intense Microwave and Particle Beams III 1629: 153-158 (1992).

Coppi, B., and F. Pegoraro. "Near-Term Experiments on Advanced Fusion." *Proceedings of the Enrico Fermi International School of Physics*, Course CXVII, Milan, Italy, July 1992.

Dron, L. "System-Level Design of Specialized VLSI Hardware for Computation Relative Orientation." *Proceedings of the IEEE Workshop on Applications of Computer Vision*, Palm Springs, California, November 30-December 2, 1992.

Lee, P.A. "Few Electron Nanostructures: A New Laboratory for Studying Strongly Correlated Systems." *Proceedings of the NATO Workshop*, Nordwig, the Netherlands, May 1992.

Lumsdaine, A., and J.K. White. "Accelerating Dynamic Iteration Methods with Application to Semiconductor Device Simulation." *Proceedings of the Copper Mountain Conference on Iterative Methods*, Copper Mountain, Colorado, April 1992.

Pritchard, D.E. "Atom Interferometers." *Proceedings of the International Conference on*

Atomic Physics, 13th, Munich, Germany, August 3-7, 1992.

Pritchard, D.E., and W. Ketterle. "Atom Traps and Atom Optics." *Proceedings of the Enrico Fermi International School of Physics*, Milan, Italy, July 1992.

Shattuck-Hufnagel, S., M. Ostendorf, and K. Ross. "Pitch Accent Placement Within Words." *Proceedings of the Institute for Research and Computer Science Workshop on Prosody in Natural Language*, Philadelphia, Pennsylvania, August 1992.

Srinivasan, M.A. "Computations in Tactile Sensing." *Proceedings of the Computation and Neural Systems (CNS '92) Meeting*, San Francisco, California, July 25-28, 1992.

Stevens, K.N. "Models for Production and Acoustics of Stop Consonants." *Proceedings of the Fourth Australian International Conference on Speech Science and Technology*, Brisbane, Australia, November 30-December 2, 1992.

Tan, H.Z., X.D. Pang, and N.I. Durlach. "Manual Resolution of Length, Force, and Compliance." *Proceedings of the American Society of Mechanical Engineers Annual Winter Meeting*, Anaheim, California, November 8-13, 1992. DSC-42: 13-18. Ed. H. Kazerooni. Book No. G00751.

Zangi, K. "A New Two Sensor Active Noise Cancellation Algorithm." *Proceedings of the IEEE International Conference on Acoustics, Speech, and Signal Processing*, San Francisco, California, March 23-26, 1992.

A.2 Journal Articles

A.2.1 Published Journal Articles

Tramo, M.J., P.A. Cariani, and B. Delgutte. "Representation of Tonal Consonance and Dissonance in the Temporal Firing Patterns of Auditory Nerve Fibers: Responses to Musical Intervals Composed of Pure Tones vs. Harmonic Complexes." *Soc. Neurosci. Abstr.* 18(1): 382 (1992).

Abernathy, D.L., S.G.J. Mochrie, D.M. Zehner, G. Grubel, and D. Gibbs. "Thermal Roughness of a Close-Packed Metal Surface: Pt(001)." *Phys. Rev. Lett.* 69: 941 (1992).

- Altshuler, B.L., and L.B. Ioffe. "Motion of Fast Particles in Strongly Fluctuating Magnetic Fields." *Phys. Rev. Lett.* 69: 2979 (1992).
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- Asher, P., A. Ghosh, and S. Devadas. "Boolean Satisfiability and Equivalence Checking Using General Binary Decision Diagrams." *Integration: VLSI J.* 13(1): 1-16 (1992).
- Bagwell, P.F., S.L. Park, A. Yen, D.A. Antoniadis, H.I. Smith, T.P. Orlando, and M.A. Kastner. "Magnetotransport in Multiple Narrow Silicon Inversion Channels Opened Electrostatically into a Two-dimensional Electron Gas." *Phys. Rev. B* 45(16): 9214-9221 (1992).
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- Baylon, D.M., and J.S. Lim. "Video Compression and Noise Reduction Using Transform/Subband Coding and Adaptive Amplitude Modulation." *SMPTE J.* 101(6): 404-406 (1992).
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A.2.2 Journal Articles Accepted for Publication

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