

David Canright
Publications and Presentations

Books

M.K. SMITH, M.J. MIKSI, G.B. MCFADDEN, G.P. NEITZEL AND D. CANRIGHT (editors), *Interfaces for the 21st Century*, Imperial College Press, London, 2002.

Chapters In Books none

Refereed Journal Papers

S. MORRIS AND D. CANRIGHT, “A Boundary-Layer Analysis of Bénard Convection in a Fluid of Strongly Temperature-Dependent Viscosity,” *Physics of the Earth and Planetary Interiors* **36**:355-373, 1984.

D. CANRIGHT AND S. H. DAVIS, “Similarity Solutions for Phase-Change Problems,” *Metallurgical Transactions* **20A**:225-235, 1989.

D. CANRIGHT AND S. H. DAVIS, “Buoyancy Effects of a Growing, Isolated Dendrite,” *Journal of Crystal Growth* **114**:153-185, 1991.

C. L. SCANDRETT AND D. CANRIGHT, “Acoustical Interactions in Arrays of Spherical Elastic Shells,” *Journal of the Acoustical Society of America* **90**:589-595, 1991.

D. CANRIGHT AND S. H. DAVIS, “Buoyant Convection near a Solidifying Dendrite,” in S. H. Davis et al. (editors), *Interactive Dynamics in Convection and Solidification* 77-80, Kluwer, Boston, 1992.

D. CANRIGHT AND S. MORRIS, “Buoyant Instability of a Viscous Film Over a Passive Fluid,” *Journal of Fluid Mechanics* **255**:349-372, 1993.

D. CANRIGHT, “Thermocapillary Flow Near a Cold Wall,” *Physics of Fluids* **6**:1415-1424, 1994.

D. CANRIGHT, “Estimating the Spatial Extent of Attractors of Iterated Function Systems,” *Computers and Graphics* **18**:231-238, 1994.

C. L. SCANDRETT AND D. CANRIGHT, “Low Frequency Active Array Calculations in a Shallow Channel,” *Journal of the Acoustical Society of America* **96**:557-563, 1994.

P. BEAVER AND D. CANRIGHT, “The Quasimonotonicity of Linear Differential Systems,” *Applicable Analysis* **70**(1–2):67-73, 1998.

D. CANRIGHT AND M. HUBER, “A Boundary-Layer Model of Thermocapillary Flow in a Cold Corner,” *Physics of Fluids* **14**(9):3272-3279, 2002.

P. BEAVER AND D. CANRIGHT, “The Quasimonotonicity of Linear Differential Systems—The Complex Spectrum,” *Applicable Analysis* **80**:127-131, 2002.

Non-Refereed Journal Papers none

Refereed Conference Papers

D. CANRIGHT, V. HENSON, "Towards and FAC-FVE Approach to Determining Thermocapillary Effects on Weld Pool Shape," Copper Mountain Conference on Multigrid Methods, Copper Mountain, CO, 4-9 April. (Paper published in the conference proceedings, 1995.)

D. CANRIGHT, "A Very Compact S-Box for AES," in *Workshop on Cryptographic Hardware and Embedded Systems (CHES2005)*, Lecture Notes in Computer Science **3659**, pp. 441-455, 2005, Springer-Verlag.

D. CANRIGHT AND L. BATINA, "A Very Compact 'Perfectly Masked' S-Box for AES," in *Applied Cryptography and Network Security (ACNS2008)*, Lecture Notes in Computer Science **5037**, pp. 446-459, 2008, Springer-Verlag.

Invited Conference Papers

D. CANRIGHT, "Maple in Discretizing Equations by the Finite Volume Element Method," Conference on Maple V & Theorist, Stockton, CA, 10-13 August, 1995.

D. CANRIGHT, "Calculus I with Maple V," Conference on Maple V & Theorist, Stockton, CA, 10-13 August, 1995.

Presentations

S. MORRIS AND D. CANRIGHT, "A Systematic Treatment of Cellular Convection with Rheological Boundary-Layers," 14th International Conference on Mathematical Geophysics, Loen Norway 24-30 June. (Abstract published in 1984 *TERRA Cognita* **4**: 243, 1984.)

D. CANRIGHT AND S. MORRIS, "Nonlinear Analysis of the Rayleigh-Taylor Instability in Creeping Flow," 39th Annual Meeting of the Division of Fluid Dynamics of the American Physical Society, Columbus OH 23-25 November. (Abstract published in 1986 *Bulletin of the American Physical Society* **31**(10):1695, 1986.)

D. CANRIGHT AND S. MORRIS, "Nonlinear Analysis of the Buoyant Instability of a Thermoviscous Fluid below an Impulsively Cooled Boundary," 40th Annual Meeting of the Division of Fluid Dynamics of the American Physical Society, Eugene OR 22-24 November. (Abstract published in 1987 *Bulletin of the American Physical Society* **32**(10):2055, 1987.)

D. CANRIGHT AND S.H. DAVIS, "Similarity Solutions for Solidification with Convection," 41st Annual Meeting of the Division of Fluid Dynamics of the American Physical Society, Buffalo NY 20-22 November. (Abstract published in 1988 *Bulletin of the American Physical Society* **33**(10):2291, 1988.)

D. CANRIGHT AND S.H. DAVIS, "Buoyant Convection near a Solidifying Paraboloid," Annual Meeting of the Society for Industrial and Applied Mathematics, San Diego CA 17-21 July. (Abstract published in the meeting Final Program, 1989.)

D. CANRIGHT, "Musical Aperiodic Binary Sequences," Annual Meeting of the Society for Industrial and Applied Mathematics, Chicago IL 16-20 July. (Abstract published in the meeting Final Program, 1990.)

D. CANRIGHT AND S.H. DAVIS, "Buoyant Convection near a Solidifying Dendrite," 43rd Annual Meeting of the Division of Fluid Dynamics of the American Physical Society, Ithaca NY 18-20 November. (Abstract published in 1990 *Bulletin of the American Physical Society* **35**(10):2237, 1990.)

C. SCANDRETT AND D. CANRIGHT, "Acoustical Interactions in Arrays of Spherical Elastic Shells," Second International Conference on Industrial and Applied Mathematics, Washington DC 8-12 July. (Abstract published in the conference Final Program, 1991.)

D. CANRIGHT AND S.H. DAVIS, "Buoyant Convection near a Solidifying Dendrite," Interactive Dynamics in Convection and Solidification (NATO workshop), Chamonix, France, 7-14 March. (Paper published in the conference proceedings, 1992.)

D. CANRIGHT, "Thermocapillary Convection Near a Cold Wall," 45th Annual Meeting of the Division of Fluid Dynamics of the American Physical Society, Tallahassee FL 22-24 November. (Abstract published in 1992 *Bulletin of the American Physical Society* **37**(10):1785-1786, 1992.)

D. CANRIGHT, V. HENSON, AND E. LITAKER, "Thermocapillary Flow in a Weld Pool: A Finite Volume Element Approach," 47th Annual Meeting of the Division of Fluid Dynamics of the American Physical Society, Atlanta GA 20-22 November. (Abstract published in 1994 *Bulletin of the American Physical Society* **39**(9):1977, 1994.)

D. CANRIGHT, "Calculus with Maple V," MAA Joint Northern and Southern California Section Meeting, 21 October, 1995.

D. A. DANIELSON, D. CANRIGHT, D. N. PERINI, AND P. W. SCHUMACHER, JR., "The Naval Space Command Automatic Differential Correction Process," AAS/AIAA Astrodynamics Specialist Conference, Girdwood, Alaska, 16-19 August. (Paper to appear in the conference proceedings, 1999.)

M. A. COUCH, E. R. WOOD, AND D. CANRIGHT, "Incorporating Unsteady Aerodynamics into Nonlinear Rotor Dynamics Simulations," 43rd AIAA/ASME/ASCE/AHS Structures, Structural Dynamics, and Materials Conference, Denver, Colorado, 22-25 April, 2002.

D. CANRIGHT AND M. HUBER, "Boundary-Layer Model for Thermocapillary Feedback Near a Cold Wall," SIAM 50th Anniversary and 2002 Annual Meeting, Philadelphia, Pennsylvania, 8-12 July, 2002.

D. CANRIGHT AND M. HUBER, "Thermocapillary Feedback Near a Cold Wall: A Boundary-Layer Model," 55th Annual Meeting of the Division of Fluid Dynamics of the American Physical Society, Dallas TX, 24-26 November. (Abstract published in 2002 *Bulletin of the American Physical Society* **47**(10):197, 2002.)

Refereed Technical Reports none

Non-Refereed Technical Reports

D. CANRIGHT AND S. MORRIS, "Rayleigh-Taylor Instability of a Viscous Film Overlying a Passive Fluid," Naval Postgraduate School Technical Report: NPS-53-89-012, 1989.

D. CANRIGHT AND S. H. DAVIS, "Buoyant Convection in Dendritic Solidification," Naval Postgraduate School Technical Report: NPS-53-90-005, 1990.

D. CANRIGHT, "Thermocapillary Flow Near a Cold Wall," Naval Postgraduate School Technical Report: NPS-MA-93-011, 1993.

D. CANRIGHT, "Estimating the Spatial Extent of Attractors of Iterated Function Systems," Naval Postgraduate School Technical Report: NPS-MA-93-017, 1993.

D. A. DANIELSON AND D. CANRIGHT, "Documentation of the Naval Space Command Automatic Differential Correction Process," Naval Postgraduate School Technical Report: NPS-MA-00-001, 1999.

D. CANRIGHT, "A Very Compact Rijndael S-box," Naval Postgraduate School Technical Report: NPS-MA-04-001, 2004.

D. CANRIGHT, "[A Very Compact Rijndael S-box \(revised\)](#)," Naval Postgraduate School Technical Report: NPS-MA-05-001, 2005.

D. CANRIGHT, "[Masking a Compact AES S-box](#)," Naval Postgraduate School Technical Report: NPS-MA-07-002, 2007.

Published Computer Programs

D. CANRIGHT, "Fractal Editor (FrEd)," educational computer program published as freeware (available from <http://www.redshift.com/~dcanright/fred/>), 1992.

D. CANRIGHT, "Public Key Encryption (PKE)," educational computer program published as freeware (available from <http://www.redshift.com/~dcanright/pke/>), 1998.

Book Reviews

D. CANRIGHT, "Review of MDEP," *C·ODE·E* Fall:13-14, 1992. (software review)

Other (articles on mathematics of musical harmony)

D. CANRIGHT, “[On Piano Retuning](#),” *1/1, the Journal of the Just Intonation Network* **1(4)**:10ff, 1985.

D. CANRIGHT, “[Pentatonics I Have Known](#),” *1/1, the Journal of the Just Intonation Network* **1(2)**:1ff, 1985.

D. CANRIGHT, “[Rational Notation](#),” *1/1, the Journal of the Just Intonation Network* **1(1)**:8ff, 1985.

D. CANRIGHT, “[A Justly-Tuned Guitar](#),” *1/1, the Journal of the Just Intonation Network* **2(2)**:8ff, 1986.

D. CANRIGHT, “[A Tour Up The Harmonic Series](#),” *1/1, the Journal of the Just Intonation Network* **3(3)**:8ff, 1987.

D. CANRIGHT, “[Harmonic-Melodic Diagrams](#),” *1/1, the Journal of the Just Intonation Network* **4(2)**:1ff, 1988.

D. CANRIGHT, “[Fibonacci Gamelan Rhythms](#),” *1/1, the Journal of the Just Intonation Network* **6(4)**:4ff, 1990.

D. CANRIGHT, “[Superparticular Pentatonics](#),” *1/1, the Journal of the Just Intonation Network* **9(1)**:10ff, 1995.

D. CANRIGHT, “[Fret Choices for Just Intonation Guitars \(or Fretting About Fretting\)](#),” *1/1, the Journal of the Just Intonation Network* **10(3)**:18ff, 2002.

The viral gp45 sliding clamp subunit protein contains two domains. Each domain consists of two alpha helices and two beta sheets – the fold is duplicated and has internal pseudo two-fold symmetry.[14] Three gp45 molecules are tightly associated to form a closed ring encircling duplex DNA. Gp45 sliding clamp, N-terminal. Identifiers. Symbol. DNA_pol_proc_fac. Pfam. PF02916. The MJ15022 and MJ15024 are PowerBase power transistors designed for high power audio, disk head positioners and other linear applications. Features. – High Safe Operating Area (100% Tested) – 2 A @ 80 V – High DC Current Gain – hFE = 15 (Min) @ IC = 8 Adc – Pb–Free Packages are Available*. – Preferred devices are recommended choices for future use and best overall value. Publication Order Number: MJ15022/D. Npn – MJ15022, MJ15024*.

– The MK-Ultra Program has been portrayed in books and movies, such as the 1990 film, Jacob's Ladder, 1997's Conspiracy Theory, 2015's American Ultra, and in the various Jason Bourne books and movies starring Matt Damon and written by Robert Ludlum. On television, it was portrayed in the 1998 Canadian series The Sleep Room, and in season 1 of Stranger Things where Dr. Martin Brenner was involved in MK-Ultra, and Eleven was born to an MK-Ultra test subject. The 2017 Netflix documentary Wormwood tells the story of Frank Olson. Stephen King's novel Firestarter is based on MK-Ult Marc Smith. G. Paul Neitzel. An isothermal liquid drop is suspended from the lower end of a vertical rod and held close to a solid planar surface. When the distance between the end of the rod and the surface reaches a critical value, the drop will wet the solid. – The physical mechanisms for the hydrothermal wave instability found in dynamic thermocapillary liquid layers by Smith and Davis [J. Fluid Mech. 132, 119 (1983)] are described. View. The Sedra/Smith, Microelectronic Circuits, Seventh Edition book is a product of Oxford University Press, not National Instruments Corporation or any of its affiliated companies, and Oxford University Press is solely responsi- ble for the Sedra/Smith book and its content. Neither Oxford University Press, the Sedra/Smith book, nor any of the books and other goods and services offered by Oxford University Press are official publications of National Instruments Corporation or any of its affiliated companies, and they are not affiliated with, endorsed by, or sponsored by National Instruments Corpor