RESUME-2008 DAVID F. ANDERSEN

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Born: 1948

Married, three children

Educational Background

Sloan School of Management, M.I.T., Ph.D. Management 1977

Major Field: System Dynamics

Minor Field: Social Policy in Education

Westfield State College, Massachusetts State Teaching Certificate, 1971

Dartmouth College, AB., 1970 (Magna Cum Laude and with High Distinction)

Major Field: Mathematics and Social Sciences

Minor Field: Urban Studies

Honors and Awards: Phi Beta Kappa, 1969

M.I.T. Endowed Fellowship Award, 1972-1973 Jay W. Forrester Award for Best published work in The field of System Dynamics, 1978-1983 Fellow, New York State Academy for Public

Administration

Academic Appointments

Distinguished Service Professor of Public Administration, Public Policy, and Information Science, University at Albany, 2001-present.

Professor of Public Administration, Public Policy, and Information Science, University at Albany, 1991-2001

Associate Professor of Public Policy and Public Administration, University at Albany, 1983 -- 1991

Assistant Professor of Public Policy, University at Albany, Graduate School of Public Affairs, 1981-1983

Assistant Professor of Public Administration, University at Albany, Graduate School of Public Affairs, 1977-1983

Instructor, Northeastern University, Department of Industrial Engineering, Graduate School of Engineering, 1976-1977

Graduate Instructor, M.I.T., Center for Advanced Engineering Studies, 1976

Mathematics Teacher, Glenbrook Middle School, Longmeadow, Massachusetts, 1971 - 1973

Administrative Appointments

Chair, Department of Public Administration and Policy, University at Albany, 2008-present

Founding Chair, Informatics Faculty, College of Computing and Information, University at Albany, 2004-2006

Associate Dean, School of Information Science and Policy, University at Albany, 2003 - 2004

Interim Chair, Department of Public Administration and Policy, University at Albany, 1991-1993 and 1995-1996

Director, Nelson A. Rockefeller Institute of Government, University at Albany, August 1987 -- 1989

Dean, Graduate School of Public Affairs, Rockefeller College of Public Affairs and Policy, University at Albany, 1983 -- 1988

Director, Program in Planning and Policy Analysis, University at Albany, 1980 -- 1987

Publications - Books

<u>Government Information Management</u> (with Sharon Dawes), Prentice Hall, 1991, Englewood Cliffs, New Jersey.

<u>Introduction to Computer Simulation: The System Dynamics Modeling Approach</u> (with Nancy Roberts et al), Addison Wesley, 1982, recipient of the Forrester Award for best-published work in system dynamics 1978-1983.

Publications - Edited Volumes and Monographs

<u>Group Model Building</u> (with Jac A. M. Vennix and George P. Richardson), Special Issue of <u>System Dynamics Review</u> Vol. 13 (2) 1997.

Making Smart IT Choices: A Handbook (with Dawes, Kelly, Bloniarz, Cresswell, and Galvin), Center For Technology in Government, University at Albany, 1996.

<u>Approaches to Teaching Government Information Management</u> (with Sharon Dawes), Prentice Hall, 1991, Englewood Cliffs, NJ.

<u>System Dynamics 91: Proceedings of the 1991 System Dynamics Conference</u> (with Khalid Saeed and José Machuca), Bangkok, Thailand: System Dynamics Society, Cambridge, MA.

System Dynamics 90: Proceedings of the 1990 System Dynamics Conference (Volumes I-III) (with George Richardson and John Sterman), Chestnut Hill MA: System Dynamics Society, Cambridge, MA.

<u>Proceedings of the 1983 System Dynamics Research Conference</u>, (with John Morecroft), Chestnut Hill, MA: System Dynamics Society, Cambridge, MA.

<u>Proceedings of the 1981 System Dynamics Research Conference</u> (with John Morecroft), Rensselaerville, New York: System Dynamics Society, Cambridge, MA.

Publications - Journal Articles

"Integrating modes of policy analysis and strategic management practice: requisite elements and dilemmas" (with Colin Eden, Fran Ackermann, John M. Bryson, and George P. Richardson), <u>Journal of the Operational Research Society</u>, (forthcoming—2008)

Martinez-Moyano, I. J., E. H. Rich, S. H. Conrad, D. F. Andersen and T.R. Stewart (2008). "A Behavioral Theory of Insider-Threat Risks: A System Dynamics Approach." *ACM Transactions on Modeling and Computer Simulation* 18(2).

"Group Model Building: Problem Structuring, Policy Simulation and Decision Support," (with Jac A.M. Vennix, George P. Richardson, Etiënne A.J.A. Rouwette), <u>Journal of the Operational Research Society</u>, (2007) Vol 58 No. 5: 691-694.

"Anatomy of a Group Model Building Intervention: Building Dynamic Theory from Case Study Research" (with Luis Luna-Reyes, Ignacio Martinez-Moyano, Theresa Pardo, Anthony Creswell, and George Richardson), System Dynamics Review, (2007) doi:10.1002/sdr.349

"Integrating Modes of Systems Thinking into Strategic Planning Education and Practice: The Thinking Persons' Institute Approach" (with John Bryson, George Richardson, Fran Ackermann, Colin Eden, and Charles Finn), Journal of Public Affairs Education (2006), 12(3):265-293.

"Linking Event Thinking with Structural Thinking: Methods to Improve Client Value in Projects" (with Susan Howick and Fran Ackermann), <u>System Dynamics Review</u>, (2006), 22 (2): 113-140.

"Financing a Competitive Recycling Initiative in Switzerland" (with Silvia Ulli-Beer and George Richardson), <u>Ecological Economics</u> (2006): doi:10.1016/j.ecolecon.2006.09.017.

"The 2004 Jay Wright Forrester Award: Citation for the Winner: Eric F. Wolstenholme," <u>System Dynamics Review</u>, Vol. 20, no. 4 (Winter 2004), 337-340.

"Using Simulation Models to Address "What If" Questions about Welfare Reform" (with Zagonel, Rohrbaugh, and Richardson), <u>Journal of Policy Analysis and Management</u>, Vol. 23 no 4 (Fall 2004), 890-901.

"Using Digest to Implement the Pathway Method for Detecting Influential System Structure" (with Mohammad Mojahezadeh and George P. Richardson), <u>System Dynamics Review</u>, Vol. 20, no. 1 (2003), 1-20.

Foreword: "Group Model Building, Art, and Science" (with Vennix and Richardson), <u>System Dynamics Review</u>, Vol. 13 no.2 (1997), 103-106.

"A Framework for Evaluating Systems Thinking Interventions: An Experimental Approach to Mental Health System Change" (with Huz, Richardson, and Boothroyd), <u>System Dynamics Review</u>, Vol. 13, no. 2 (1997), 149-169.

"Group Model Building: Adding More Science to the Craft" (with Vennix and Richardson) <u>System</u> Dynamics Review, Vol. 13, no. 2 (1997), 187-201.

"Scripts for Group Model Building" (with Richardson), <u>System Dynamics Review</u>, Vol. 13, no. 2 (1997), 107-129.

- "Teamwork in Group Model Building" (with Richardson), <u>System Dynamics Review</u>, Vol. 11 no. 2 (Summer 1995), (pp. 113-137) also reprinted in <u>Modeling for Management</u> (G.P. Richardson, ed), Dartmouth Publishing, Alderhot, UK, 1996 (pp. 349-373).
- "Strategic Information Management: Conceptual Frameworks for the Public Sector" (with Sal Belardo and Sharon Dawes), <u>Public Productivity and Management Review</u>, vol. XVII no. 4, summer 1994, (pp. 335-353).
- "Model Building for Group Decision Support: Issues and Alternatives in Knowledge Elicitation," <u>European Journal of Operational Research</u> Vol. 59, No 1, 1992.
- "Some Conceptual and Technical Problems in Integrating Models of Judgment with Simulation Models" (with John Rohrbaugh), <u>IEEE Transactions on Systems, Man, and Cybernetics</u>, Vol. 22, No. 1, January/February 1992, pp. 21-34.
- "The NASPAA Alumni Survey Pilot" (with Anand Desai, David DeShon, and Brian Fry), <u>American Review of Public Administration</u> (Special Symposium on Outcomes Assessment), Vol. 21, No 3, September 1991, pp 205-236.
- "The Size and Scope of Strategic Planning in State Agencies: The New York Experience," <u>American Review of Public Administration</u>, Vol. 21, No. 2, June 1991, pp. 119-137.
- "The Implementation of Welfare Reform Initiatives: A Preliminary System Dynamics Model" (with Sauwakon Ratanawijitrasin, George Richardson, and Irene Lurie), <u>System Dynamics: An International Journal of Policy Modeling</u>, Vol. 3, No 1&2, 1990, pp. 49-68.
- "Analyzing Who Gains and Who Loses: The Case of School Finance Reform in New York State," <u>System Dynamics Review</u>, Vol. 6 (1), 1990, pp. 21-43 also reprinted in Modeling for Management (G.P. Richardson, ed), Dartmouth Publishing, Alderhot, UK, 1996 (pp. 257-279).
- "Bureaucrats and Choice: The Use of System Dynamics Models in Public Sector Decision Making," System Dynamics: An International Journal of Policy Making, Vol. 2 (1) 1989, pp. 43-56.
- "Synthetic Data Experiments Using System Dynamics Models: A Survey of Results and a Research Agenda" (with Catherine Crawford and George Richardson," <u>System Dynamics Review</u>, 4 (no. 2, Summer 1989), pp. 199-208)
- "Chaos in System Dynamics Models," System Dynamics Review, Vol. 4 (1-2), 1988 pp. 3-13.
- "Chaotic Structures in Generic Management Models," (with Sturis), <u>System Dynamics Review</u>, Vol. 4 (1-2), 1988 pp. 218-245.
- "Modeling Complexity: Using Dynamic Simulation to Link Regression and Case Studies" (with McCaffrey, McCold, and Kim), Journal of Policy Analysis and Management, Vol. 4 (2), 1985.
- "A System Dynamics Simulation of Educational Finance Policies," Simulation, Vol. 40 (6), 1983.
- "Disentangling Statistical Artifacts from Hard Conclusions," <u>Journal of Policy Analysis and Management</u>, Vol. 2 (2), Winter 1983.
- "Specifying Dynamic Objective Functions: Problems and Possibilities" (with Rohrbaugh), <u>Dynamica</u>, Vol. 9 (1), Summer 1983.
- "Problems in Estimating the Costs of Special Education in Urban Areas: The New York City Case," <u>Journal of Education Finance</u>, Vol. 7 (4), Spring 1982.

- "Introductory Curriculum in System Dynamics: (with Roberts, et al), <u>Dynamica</u>, Vol. 8 (2), Winter 1982.
- "Using Feedback Models to Test the Robustness of Statistical Program Evaluation Design," <u>Dynamica</u>, Vol. 8 (2), Winter 1982.
- "Analyzing US Military Retirement Policies," Simulation, Vol. 39 (5), 1982, pp. 151-158.
- "Analyzing Retirement Policies in the Public Sector: Interactions between Retirement and Other Personnel Management Policies" (with Emmerichs), <u>Simulation</u>, November 1982.
- "Attrition versus Layoffs: How to estimate the Costs of Holding Employees on Payroll when Savings are Needed: (with Feldt), <u>Public Administration Review</u>, Vol. 42 (3), May-June 1982. Also reprinted in Rockefeller Institute Reprint Series, Number 1, September 1982.
- "Redefining the Implementation of Special Education Programs in Fiscal Terms," <u>Human Systems</u> Management, Vol. 2, 1982.
- "A Preliminary System Dynamics Model of the Allocation of State Aid to Education" (with Chen and Nguyen), <u>Dynamica</u>, Winter 1981.
- "A System Dynamic View of the Competing Values Approach to Organizational Life Cycles," <u>Public Productivity Review</u>, Vol. 5 (2), June 1981.
- "Kalman Filter Estimation of System States Compared to the General Regression Problem," International Journal of Policy Analysis and Information Systems, Vol. 5 (2), 1981.
- "Using Feedback Simulation to Test Educational Finance Policies," Policy Sciences, Vol. 12, 1980.
- "Toward a Pedagogy of System Dynamics" (with Richardson), <u>TIMS Studies in the Management Sciences</u>, special issue on System Dynamics, Vol. 14, 1980.
- "Teaching for Research in System Dynamics: (with Richardson), Dynamica, Vol. 5 (3) December 1979.
- "Combining Teaching and Research in System Dynamics" (with Richardson), <u>Modeling and Simulation</u>, Vol. 9, 1978, pp 537-542.
- "The Dynamics of Management by Objectives and Productivity in the R & D Environment" (with E.J. Poziomek and D.W. Rice), <u>IEEE Transactions in Engineering Management</u>, Vol. EM-24, No. 2, May 1977.

Publications - Book Chapters

- "Simulating the Dynamics of Social Program Management: The Case of JOBS Implementation" (with George Richardson, Irene Lurie, and Sauwakon Ratanawijitrasin), in <u>Modeling for Management</u> (G.P. Richardson, ed), Dartmouth Publishing, Alderhot, UK, 1996 (pp. 155-174)
- "Model Building for Group Decision Support: Issues and Alternatives in Knowledge Elicitation" (with George P. Richardson, Jac A. M. Vennix, John W. Rohrbaugh), in <u>Modeling for Learning Organizations</u>, John D. W. Morecroft and John D. Sterman eds., Productivity Press, Portland, Oregon.
- "Information Entrepreneurs: The Missing Link in Providing Services to Rural Families at Risk" (with Sharon Dawes) in <u>Sociocultural and Service Issues in Working with Rural Clients</u>, Rockefeller College Press, 1993.

"Eliciting Knowledge for Model Building" (With Vennix, Richardson, Rohrbaugh, and Wallace) in <u>Computer-Based Management of Complex Systems</u>, Erich Zahn and Peter Milling eds., Springer-Verlag, Berlin, 1989.

"Models, Simulation and System Dynamics" in <u>The Computer Culture: A Symposium to Explore the Computer's Impact on Society</u>, Denis P. Donnelly, ed., Associated University Presses, Cranbury, NJ, 1985.

"Formalization as Crisis: A Transition Planning Program for Young Organizations" (with R. Quinn) in Managing Organizational Transitional, John R. Kimberly and Robert E. Quinn, eds., Richard D. Irwin, 1984, Homewood, Illinois; also in New Futures: The Challenge of Managing Corporate Transitions, John R. Kimberly and Robert E. Quinn, eds., Dow Jones-Irwin, 1984, Homewood, Illinois.

"How Differences in Analytic Paradigms Can Lead to Differences in Policy Conclusions--Two Case Studies" in <u>Elements of the System Dynamics Method</u>, Jorgen Randers, ed., Cambridge, MA: M.I.T. Press, 1980; also in <u>The System Dynamics Method</u>, <u>Proceedings of the 1976 International Conference on System Dynamics</u>, August 8-15, Geilo, Norway.

Publications - Reviews

Book Review: "System Dynamics and the Analysis of Change, B.E. Paulre, editor," <u>Simulation</u>, September 1982.

"Developing New Concepts in System Dynamics: A Review of the 7th International Conference at Brussels," <u>Dynamica</u>, Vol. 8 (2), Winter 1982.

Published Proceedings and Working Papers

Modeling the Emergence of Insider Threat Vulnerabilities (with Ignacio Martinez-Moyano, Stephen Conrad, and Eliot Rich), <u>Proceedings of the 2006 Winter Simulation Conference</u>, L.F. Peronne, F.P. Wieland, J. Liu, B.G. Lawson, D.M. Nicol, and R.M. Fujimots, eds. (pp. 562-568) IEEE 2006

Emergence of the Governance Structure for Information Integration Across Governmental Agencies: A System Dynamics Approach" (with Luis F. Luna-Reyes, Mohammed T. Mojtahedzadeh, George P. Richardson, Anthony M. Cresswell, Carrie Schneider, Tamas Bodor, Sharon S. Daws, Fiona Thompson, G. Brian Burke, Fikret Demircivi, Yi Jung Wu, Donna Canestraro and Theresa A. Pardo), <u>Proceedings</u> of the 22 International Conference of the System Dynamics Society, Oxford, England, 25-29 July 2004.

Preliminary System Dynamics Maps of the Insider Cyber-Threat Problem" (with Dawn M. Cappelli, Jose J. Gonzalez, Mohammed T. Mojtahedzadeh, Jose-Maria Sarriequi, Elise A. Weaver, Andrew P. Moore, Aldo Zagonel, Elliot Rich and Jefferey M. Stanton), <u>Proceedings of the 22 International Conference of the System Dynamics Society</u>, Oxford, England, 25-29 July 2004.

"Scripts for Group Model Building: Modeling and Emergence of Governance for Information Integration across Government Agencies" (with Luis F. Luna-Reyes, Mohammed T. Mojtahedzadeh, George P. Richardson, Anthony M. Cresswell, Carrie Schneider, Tamas Bodor, Sharon S. Daws, Fiona Thompson, G. Brian Burke, Fikret Demircivi, Yi Jung Wu, Donna Canestraro and Theresa A. Pardo), <u>Proceedings</u> of the 22 International Conference of the System Dynamics Society, Oxford, England, 25-29 July 2004.

"Sterling Revisited: Practical Approaches to Merging Two Systems Thinking Streams" (with Fran Ackermann and Susan Howick), <u>Proceedings of the 22 International Conference of the System Dynamics Society</u>, Oxford, England, 25-29 July 2004.

- "Using a System Dynamics-SWM Model to inform Policymaking for Solid Waste Management at the Local Level" (with Sylvia Ulli-Beer and George P. Richardson), <u>Proceedings of the 22 International</u> Conference of the System Dynamics Society, Oxford, England, 25-29 July 2004.
- "A System Dynamics Choice Structure for Policy Compliance: Micro Behavior Explaining Aggregated Recycling Dynamics" (with Sylvia Ulli-Beer and George P. Richardson), <u>Proceedings of the 22 International Conference of the System Dynamics Society</u>, Oxford, England, 25-29 July 2004.
- "A Dynamic Theory of Collaboration: A Structural Approach to Facilitating Intergovernmental Use of Information Technology" (with Laura Black, Anthony Cresswell, Theresa Pardo, Fiona Thompson, Donna Canestraro, Meghan Cook, Luis Luna, Ignacio Martinez and George Richardson), <u>Paper accepted to the Hawaiian International Conference on System Sciences-36</u>, Hawaii, (Forthcoming).
- "Evolution of a Dynamic Theory of Collaboration: Modeling Intergovernmental Use of Technology" (with Anthony Cresswell, Laura J. Black, Donna Canestraro, Meghan Cook, Theresa Pardo, Fiona Thompson, Luis Luna, Ignacio Martinez-Moyano and George P. Richardson), <u>Proceedings of the 2002 International System Dynamics Conference</u>, Palermo, Italy, 28 July- 1 August 2002.
- "Misattribution in Welfare Dynamics: The Puzzling Dynamics of Recidivism" (with George P. Richardson), <u>Proceedings of the 2002 International System Dynamics Conference</u>, Palermo, Italy, 28 July-1 August 2002.
- "Modeling Intergovernmental Collaboration: A System Dynamics Approach" (with Anthony Cresswell, Theresa Pardo, Fiona Thompson, Donna Canestraro, Meghan Cook, Laura Black, Luis Luna, Ignacio Martinez and George Richardson), <u>Paper presented at the Hawaiian International Conference on System Sciences-35</u>, Hawaii, 2002.
- "Group Modeling of IT-Based Innovations in the Public Sector" (with Anthony Cresswell, Theresa Pardo, Luis Luna, Ignacio Martinez and George Richardson), <u>Proceedings of the 2001 International System Dynamics Conference</u>, Atlanta, Georgia, 23-27 July 2001.
- "The Use of Information of Critical Structure by System Dynamics Experts" (with Mohammad Mojtahedzadeh, George Richardson and Hassan Dibadj), <u>Proceedings of the 2001 International System Dynamics Conference</u>, Atlant, Georgia, 23-27 July 2001.
- "A Preliminary System Dynamics Model of Intergovernmental Collaboration" (with Anthony Cresswell, Donna Canestraro, Meghan Cook, Theresa Pardo, Fiona Thompson, Laura Black, Ignacio Martinez, Luis Luna and George Richardson), <u>Proceedings of the 2001 International System Dynamics Conference</u>, Atlanta, Georgia, 23-27 July 2001.
- "Workshop: Creating Public/Private Partnerships to Support Public Policy Initiatives" (with Roderick MacDonald and Kenneth Carpenter), <u>Proceedings of the 2001 International System Dynamics Conference</u>, Atlanta, Georgia, 23-27 July 2001.
- "The TPI Framework: An Integrated Approach to Strategy Development" (with Fran Ackermann, John Bryson, Colin Eden, Charles Finn and George Richardson), <u>Proceedings of the 2000 International System Dynamics Conference</u>, Bergen, Norway, 6-10 August 2000.
- "Using Group Model Building to Support Strategic Reform of the Real Property Tax System in New York State: A Case Study" (with Tom Griffen, George Richardson and Charles Finn), <u>Proceedings of the 2000 International System Dynamics Conference</u>, Bergen, Norway, 6-10 August 2000.
- The Art and Science of Constructing System Stories" (with Mohammad Mojtahedzadeh and George Richardson), <u>Proceedings of the 16th International Conference of the System Dynamics Society, Quebec City, Canada, 1998.</u>

- "Group Model Building to Support Welfare Reform Part II: Dutchess County" (with Tsuey Ping Lee, George P. Richardson, John W. Rohrbaugh and Aldo A. Zagonel-Santos), <u>Proceedings of the 16th International Conference of the System Dynamics Society</u>, Quebec City, Canada, 1998.
- A Judgment Approach to Estimating Parameters in Group Model-Building" (with Tsuey Ping Lee, George P. Richardson, John W. Rohrbaugh and Aldo Zagonel), <u>Proceedings of the 16th International Conference of the System Dynamics Society</u>, Quebec City, Canada, 1998.
- "Outcomes from an Evaluation of a Group Model Building Intervention for Public Sector System Change" (with George P. Richardson, Steven Huz, Roger Boothroyd, and Roberta L. Spencer), Proceedings of the 16th International Conference of the System Dynamics Society, Quebec City, Canada, 1998
- "An Approach to Teaching System Thinking in Public Sector Audiences" (with Deborah L. Anderson, Aldo Zagonel and George P. Richardson), <u>Proceedings of the 15th International System Dynamics</u> <u>Conference: Systems Approach to Learning and Education into the 21st Century</u>, Istanbul, Turkey, 1997.
- "Group Model Building to Support Welfare Reform in Cortland County" (with Jane Rogers, Robert Johnson, Aldo Zagonel, John W. Rohrbaugh, George P. Richardson and Tsuey Ping Lee), <u>Proceedings of the 15th International System Dynamics Conference: Systems Approach to Learning and Education into the 21st Century, Istanbul, Turkey, 1997.</u>
- "The Pathway Participation Metric: A Tool for Understanding the Connection Between Feedback Loop Structures and their Behavior" (with Mohammad T. Mojtahedzadeh and George P. Richardson), Proceedings of the 15th International System Dynamics Conference: Systems Approach to Learning and Education into the 21st Century, Istanbul, Turkey, 1997.
- "Assessing the System-Wide Impacts of Automated Voice Response Customer Service Technologies" (with Mohammad Mojtahedzadeh and George P. Richardson), <u>Proceedings of the 1996 International System Dynamics Conference</u>, Cambridge, Massachusetts, 1996.
- "Evaluating Group Model Building in Mental Health Vocational Services" (with Mohammad Mojtahedzadeh), <u>Proceedings of the 1996 International System Dynamics Conference</u>, Cambridge, Massachusetts, 1996.
- "Foundations of Mental Model Research" (with Terrence A. Maxwell, George P. Richardson and Thomas R. Stewart), <u>Proceedings of the 1994 International System Dynamics Conference</u>, Sterling, Scotland, 1994.
- "Mental Models and Dynamic Decision Making in a Simulation of Welfare Reform" (with Terrence A. Maxwell, George P. Richardson and Thomas R. Stewart), <u>Proceedings of the 1994 International System Dynamics Conference</u>, Sterling, Scotland, 1994.
- "Scripts for Group Model Building" (with George P. Richardson), <u>Proceedings of the 1994 International System Dynamics Conference</u>, Sterling, Scotland, 1994.
- "Group Model Building" (with George P. Richardson, John W. Rohrbaugh and William Stienherst), <u>Proceedings of the 1992 International System Dynamics Conference of the System Dynamics Society</u>, Utrecht, The Netherlands 1992.
- "Implementation of Welfare Reform Initiatives: A preliminary System Dynamics Model" (with Sauwakon Raranawijitrasin, Irene Laurie and George P. Richardson), <u>Proceedings of the 1990 International System Dynamics Conference</u>, Chestnut Hill, MA, 1990.

- "Issues in Designing Interactive Games Based on System Dynamics Models" (with Ik Jae Chung, George P. Richardson and Thomas R. Stewart), <u>Proceedings of the 1990 International System Dynamics Conference</u>, Chestnut Hill, MA, 1990.
- "Eliciting Group Knowledge for Model-Building" (with George P. Richardson, Jac A. Vennix, John W. Rohrbaugh and W. A. Wallace), <u>Proceedings of the Computer-Based Management of Complex Systems:</u> <u>International System Dynamics Conference</u>, Stuttgart, Germany, 1989.
- "Sensitivity of Econometric Estimates of System Parameters to Changes in Sampling Intervals, Measurement Error and Process Error" (with Ole Fagleberg), <u>Proceedings of the 1988 International System Dynamics Conference</u>, La Jolla California, 1988.
- "A Simulation Model of Occupational Inquiry and Illness Causation and Regulation" (with Catherine Crawford, Sue Faerman, and Erik Mosekilde), <u>Proceedings of the 1986 International Conference of the Systems Dynamics Society</u>, Sevilla, Spain, 1986.
- "Modeling School Finance Policy: Using Simulation to Test a Friori Assumptions" (with George P. Richardson and Robert E. Lamitie), <u>Proceedings of the International System Dynamics Conference</u>, Sevilla, Spain 1986.
- "Dynamic Systems, Ambiguous Variable, and Discrepant Findings" (with McCaffrey, McCold, and Kim), working paper, Rockefeller College of Public Affairs and Policy, State University of New York at Albany, 1984.
- "Regression and Case Studies of Public Programs: Discrepant Findings and a Suggested Bridge: (with McCaffrey, McCold and Kim), <u>Proceedings of the 1984 International System Dynamics Conference</u>, Oslo, Norway, August 2-5, 1984.
- "Bureaucrats and Choice: The Use of System Dynamics Models in Public Sector Decision Making," <u>Proceedings of the 7th International Conference on System Dynamics</u>, Universite Libre de Bruxelles, June 16-18, 1982, Brussels, Belgium.
- "The Impacts of Implementing a Cost-of-education Index on the Equalization of Education Expenditures Per Pupil" (with Chen and Nguyen), <u>Proceedings of the International Conferences on Cybernetics and Society</u>, Atlanta, Georgia, October 26-28, 1981.
- "Why Mathematical Models of Public Policy Issues Often Don't Work," <u>Proceedings of the 1981 System Dynamics Research Conference</u>, Rensselaerville, NY, October 14-17, 1981.
- "Dynamics of State Aid to Education: Interactions Between Special Education, Regular Education, and Non-Schooling Expenditures" (with Nguyen and Chen), <u>Proceedings of the International Conference on Cybernetics and Society</u>, Cambridge, MA, 1980.
- "A Markov Simulation of Reduction in Force Policies in the Public Sector" (with Feldt), <u>Proceedings of the Eleventh Annual Pittsburgh Conference</u>, Pittsburgh, PA, 1980.
- "A Preliminary System Dynamics Model of the Allocation of State Aid to Education" (with Chen and Nguyen), <u>Proceedings of the Eleventh Annual Pittsburgh Conference</u>, Pittsburgh, PA, 1980.
- "Teaching Dynamic Problem Solving at the Secondary School Level: (with Roberts, et al), <u>Proceedings</u> of the 1980 International Conference on Cybernetics and Society, Cambridge, MA.
- "A Core Curriculum in System Dynamics: (with Richardson), <u>Occasional Papers in Public Affairs</u>, State University of New York at Albany, Graduate School of Public Affairs, Occasional Papers Series, OPS 79-001, 1979.

- "The Dynamics of Municipal Debt Accumulation: Unintended Consequences of Deficit Financing: (with Runko and Richardson), <u>Proceedings of the 1979 Summer Computer Simulation Conference</u>, Toronto, 1979.
- "Objective Function Dynamics: Evaluating Urban Systems Through Time" (with Rohrbaugh), <u>Proceedings: International Conference on Cybernetics and Society</u>, IEEE Systems, Man and Cybernetics Society, Denver, 1979.
- "Specifying Dynamic Objectives Functions: Problems and Possibilities" (with Rohrbaugh), <u>Proceedings of the 1979 Summer Computer Simulation Conference</u>, Toronto, 1979.
- System Dynamics and Education (William Shaffer, ed.), Cambridge, MA: Pugh Roberts Associates, 1979.
- "A System Dynamics Simulation of Special Education Reimbursement Policies," <u>Occasional Papers in Public Affairs</u>, State University of New York at Albany, Graduate School of Public Affairs, Occasional Paper Series, OPS 79-004, 1979.
- "Teaching for Research in System Dynamics" (with Richardson) in <u>Modeling and Simulation, Volume 9: Proceedings of the 1978 Pittsburgh Simulation Conference</u>, Instrument Society of America, Pittsburgh, PA, 1978.
- "Theories of Decision Making: An Annotated Bibliography" (with D.L. Andersen), <u>Sloan School Working Papers</u>, WP 934-77, June 1977, M.I.T., Cambridge, MA 02139.
- "How Differences in Analytic Paradigms Can Lead to Differences in Policy Conclusions," <u>Proceedings of the 1976 International Conference on System Dynamics</u>, Geilo, Norway 1976.
- "Dynamic Parameter Sensitivity in Social System Models" (with Britting, Keneth R., Khilnani, and Arvind), <u>Proceedings of the 1975 Summer Computer Simulation Conference</u>, San Francisco 1975.
- "An Approach to the Analysis of the Military Personnel System," <u>System Dynamics Group Memo</u>, D-2369, E40-253, M.I.T.

<u>Possible Applications of Computerized Methods of Decision-Making in Rural New England Towns</u>, Boston, MA: The New England Regional Commission, 1970.

Consulting Reports and Presented Papers [Pre 1988]

- "Robustness of Econometric Estimation of Simple Linear Dynamical Structures" (with Ole Fagleberg), Norwegian School of Management, Norway, 1988.
- "System Dynamics and Econometrics: Lessons from Synthetic Data Experiments," invited lecturer, Bedriftsokonomisk Insitut, Bekkestua, Norway, May 1987.
- "Connecticut Educational Finance Modeling Project Final Report" (with Richardson), 1986.
- "Toward a System Dynamics Model of Economic Reforms in China," invited lecture, Shanghei Institute of Mechanical Engineering, Shanghei, Peoples Republic of China, November 1984.
- "International Developments in the Field of System Dynamics," invited lecture, National Chiao Tung University, Taipei, November 1984.

- "System Dynamics: An Interdisciplinary Problem Solving Technique," invited plenary address, First Annual Computer Literacy Conference, October 25-27, Trinity College, Stowe, Vermont, 1983.
- "Modeling the Response of Local School Districts to Changes in State Policy and Changes in Demographic and Economic Conditions (with Dembowski, Chen, and McCarty) report to New York State Education Department, August 1982.
- "Using Models to Support Public Sector Decision Making," invited lecture at Institute Der Universitate Stuttgart, University of Stuttgart, Germany, June 22, 1982.
- "Kalman Filtering and Synthetic Data Experiments: Some Implications for Social Policy Research," invited lecture at Gesellschaft fur Mathematik und Datenverarbeitung, Bonn, Germany, June 21st 1982.
- "A Systems Dynamics Approach to School Finance Questions," paper presented to the American Educational Finance Association, March 1982, Philadelphia, PA.
- "Comments on Kathy Adams School District Response Report," for New York State Education Department, January 26, 1982.
- "Problems in Estimating the Costs of Special Education in Urban Areas: The New York City Case," paper presented to the American Education Research Association, March 20, 1982, New York, NY.
- "Models, Simulation, and System Dynamics," invited paper presented at The Computer Culture: A Symposium to Explore the Computer's Impact on Society," March 5-6, 1981, Siena College, Loudonville, NY.
- Administrative and Fiscal Options for a Plan to Provide School-Based Special Education Services in New York City, Public Education Association, New York, NY, July 1981.
- "New Approaches for Improving Organizational Effectiveness," Panel, 1980 International Personnel Management Association, Eastern Region, Atlantic City, June 2, 1980.
- "A Core Curriculum in System Dynamics" (with Richardson), paper presented at SUNY-Albany, Graduate School of Public Affairs, 1979.
- "A System Dynamics Simulation of Special Education Reimbursement Policies," paper presented at SUNY-Albany, Graduate School of Public Affairs, 1979.
- "Implementing Fiscal Policies for Special Education at the State Level," paper presented at the 1978 American Education Research Association Conference in Toronto; also abstracted in Resources in Education and Exceptional Child Education Resources, Volume II, No. 1, Spring 1979.
- "How Can Mainstreamed or De-Labeled Children be Funded for Special Needs?" Working Conference on Evaluating the Handicapped sponsored by New York State Psychological Association, Fordham University, February 1979.
- "Recommendations for a Package of Administrative and Fiscal Options, Project on School-Based Assessment and Service Delivery," Public Education Association, New York, NY, August 1979.
- "A System Dynamics Simulation of Special Education Reimbursement Policies," paper presented at National ASPA Conference, Baltimore, MD, April 1979.
- "Comprehensive Workforce Planning in New York State: A policy and Organizational Analysis (with Balk, Feldt, and Zimmerman), New York State Continuity of Employment Committee, July 1978.

"Cost Estimates for Alternative Reduction in Force Strategies: A Simulation" (with Feldt), paper presented at 1978 ASPA Conference, Region I & II, Albany, NY.

<u>Housing Market Study: Complete Analysis</u> (with Hoeh and Fisher), prepared for Central New Hampshire Regional Planning Commission, Public Decisions Research, Milwaukee, Wisconsin, 1973.

"Models for Self-Evaluation and Peer-Group Evaluation in Secondary School Mathematics," paper presented to the Connecticut Valley Section, Association of Teachers of Mathematics in New England, January 1973.

"Fitting Census Data to a Housing Model," paper co-presented to Census Users Conference for New England, New England Center for Health and Demographic Statistics, Durham, New Hampshire, February 1972.

Portions of ten to fifteen regional demographic, financial, and land-use studies completed for Vermont Regional Planning Agencies (copies available on request).

Professional Experience [Pre 1998]

1996-1998	Lead Faculty, Project on National Information Infrastructure, National Computerization Agency for Korea.
1995	Consultant, Project on National Information Infra-Structure, ETRI, Korea
1995	Consultant, United Nations, Project to Define Information System Needs for Ministry of Finance in Russia.
1995	Consultant, USAID, Project to Define National Information Policies for Lebanon.
1993-1997	Faculty Fellow, Center For Technology in government.
1993	Consultant, New York City, OMB Simulation Model of Homelessness policies
1993-1996	Consultant, Office of Mental Health, NYS Service Integration Project with VESID
1992	Consultant, State of Vermont Simulation Model of Medicaid Cost Expansion
1988-1990	Consultant, New York State Forum for Information Resource Management, Designed and Taught Seminar Series on Government Information Management
1988-1990	Consultant, Governor's Office of Employee Relations Design and Taught Seminars on Decision Making and Government Information Management.
March - June 1985	Consultant, Governor's Office of Employee Relations, Development of a computer-based model of costs and benefits of a long-term disability benefit in New York State.
December 1984 -	Consultant, New York State Office of the Aging,

June 1985	Development of a system dynamics costing model of a phased retirement plan for New York State.
June 1983 - June 1986	Consultant, Connecticut State Dept. of Education, Development of a school finance Simulation model.
January 1983 - January 1985	Consultant, New York State Civil Service Commission, Statistical Audit of Medical claims for prescription drugs and physician reimbursement claims.
May - August 1982	Project Co-director (with F. Dembowski), Grant from New York State Education Department, "Fiscal Response of School Districts to Changes in State Aid."
December 1981	Consultant, New York State Division for Youth. Simulation modeling of clients through facilities.
December 1981 January 1982	Project Director, Grant from Public Education Association, in New York City. "Development of a Model for School-Level Needs Evaluation."
June - December 1981	Consultant, New York State Education Department. Development of a long-range simulation model of school finance policies.
June 1980	Consultant, Brookhaven National Labs. Criteria for selecting sites for disposal of high level radioactive wastes.
September 1979	Curriculum Consultant, Lesley Education Development. Design and drafting of a basic system dynamics curriculum
January 1978 - March 1980	Project Director, Grant from NYS Division of Mental Health. "Analysis of Manpower Planning Needs in New York State."
August 1978 - January 1979	Consultant, Applied Management Science Silver Springs, MD. Study for determining the least restrictive environment (LRE) placement of handicapped children.
January 1976 - September 1977	Consultant, Division of Special Education, Massachusetts State Department of Education. Analysis of statewide reimbursement policies for special education using computer simulation model.
June 1975 January 1976	Consultant, Pugh Roberts Associates, Cambridge, Massachusetts. Internal management improvement project for Division of Special Education, State Department of Educationemphasis upon accounting procedures and information flow.
January -	Consultant Office of Assistant Secretary of Defense,

June 1975 MPP, Manpower and Reserve Affairs. Construction of

computer costing model of enlisted personnel

retirement system.

June - August 1974 Research Assistant, System Dynamics Group, Sloan

School of Management M.I.T. Simulation project of

demography within U.S. economy.

June 1970 Research Assistant, Public Decisions Research,

Hanover, NH. Regional planning reports for Vermont and New Hampshire (concurrent with undergraduate

status).

Editorial Activities

Associate Editor, System Dynamics Review, 1993-2004

Associate Editor, Organizational Science, 1988-1992

Associate Editor for System Dynamics, Simulation, 1980-1992.

Editorial Board, Dynamica, 1980-1984.

Member, Publications Committee, The System Dynamics Review, 1984-1990.

Vice President for Publications, the System Dynamics Society, 1987-1990.

Co-Editor (with Richardson and Sterman), <u>System Dynamics 90: Proceedings of the 1990 System Dynamics Conference</u>, July 10-13, Pinor College, Chestnut Hill, MA.

Co-editor (with Morecroft), <u>Proceedings of the 1983 International System Dynamics Conference</u>, July 27-30, Pine Manor College, <u>Chestnut Hill</u>, MA.

Co-editor (with Morecroft), <u>Proceedings of the 1981 System Dynamics Research Conference</u>, October 14-17, Rensselaerville, NY.

Grant Activities (1990-2005)

Administrative Support for the System Dynamics Society (1996-2005) (with Richardson) System Dynamics Society (\$1,156,647)

System Dynamics Group Facilitation and Model Building Services-Systems Thinking Workshop (2005) (with Richardson and MacDonald)

New York Statewide Center for Healthy Schools Workshop (\$4,000)

System Dynamics Group Facilitation and Model Building Services Systems Thinking and Modeling Workshop (2003-2004) (with Richardson and Coleman) Northwater Capital and Ventana Systems Inc.-Basell Workshop (\$15,487)

System Dynamics Group Facilitation and Model Building Services (2002) (with Richardson) Korean Executive Program Sessions (\$5,000)

System Dynamics Group Facilitation and Model Building Services (2000-2001) (with Richardson) NYS Office of Real Property Securities (\$3,065)

System Dynamics Group Facilitation and Model Building Services (1998-1999) (with Richardson) NYS Office of Real Property Services (\$83,984)

System Dynamics Modeling for Welfare Reform (1997-1998) (with Rohrbaugh and Richardson) NYS Dept. of Social Services, SUNY Buffalo (\$109,850)

System Dynamics Group Modeling Seminar (1997) (with Richardson) A.T. Kearney, Ltd. (\$20,000)

Center for the Study of Issues in Public Mental Health (1997) (with Richardson) National Institute for Mental Health, NYS Office for Mental Health (\$2,500)

Managing Dynamic Policy Systems: Mental Models and Performance (1992-1994) (with Stewart) National Science Foundation (\$77,215)

Vermont Medicaid Policy Modeling Project (1991) (with Richardson) Agency of Human Services, State of Vermont (\$6,158)

Other Professional Activities

Vice President for Finance, System Dynamics Society 1998-present.

Member, Executive Committee, New York State Academy for Public Administration, 1993-1996.

Member, Executive Committee, Capital District Chapter ASPA,1992-1994.

Member, National Council for Pi Alpha Alpha (Public Administration National Honor Society), 1993-1997.

Charter Member. NASPAA Commission on Accreditation and Peer Review

Chair, NASPAA Commission on Peer Review and Accreditation, 1987-1988

Member, NASPAA Peer Review Committee, 1984-1986

Member, Association of Public Policy Analysis and Management

Institutional Representative to the APPAM Executive Council, 1984-1987

President, The System Dynamics Society, 1984-85

Member, Policy Council for capital District Chapter ASPA, 1984-1987 and 1990-1991

Member, American Society of Public Administration, Section on Management Science.

Program Co-Chair, The 1991 System Dynamics Conference, Bangkok, Thailand.

Conference Chair, System Dynamics 90: The 1990 System Dynamics Conference, Pine Manor College, Chestnut Hill, MA.

Program Co-chairman, 1983 International System Dynamics Conference, July 28-30, Pine Manor College, Chestnut Hill, MA.

Co-chairman, 1981 System Dynamics Research Conference, Rensselaerville, NY

Session Organizer: Applications in System Dynamics, 1981 IEEE Conference on Cybernetics, Man and Society, Atlanta, Georgia.

Session Chairman: "System Dynamics: Philosophy and Education," 1980 IEEE Conference on Cybernetics, Man and Society, Cambridge, MA.

Session Organizer: "Validation and Implementation of Dynamic Models," Summer Computer Simulation Conference, Toronto, 1979.

Panel Moderator, "Financing an Adequate Education in the Least Restrictive Environment" at Children in the Mainstream, Conference sponsored by the Public Education Association, New York, NY, November 1978.

University Service Prior to Appointment as Dean

Member, Curriculum Development Committee, Department of Public Affairs and Policy, 1981-1983

Member, Academic Policy Committee, G.S.P.A., 1981-1983

Director, Certificate Program in Planning and Policy Analysis, SUNYA, 1980-1990

Member of the Advisory Committee, Masters Program in Regional Planning, SUNYA, September 1981-1984

Chairman, Administrative Computing Committee of the Presidential Task Force on the Future of Computing at SUNYA, April to August 1982

Chairman, Computer Center Advisory Committee, SUNYA, 1979-1980

Member, Computer Center Advisory Committee, SUNYA, 1978-1979

Chairman, GSPA Grievance Committee, 1979

Chairman, Faculty Steering Committee, Program on Planning and Policy Analysis, SUNYA, 1978-1979

Member, Faculty Committee to Review MPA Program, September 1978 to June 1979

Member, Table Top Computer Selection Committee, 1978

Member, GSPA Committee To Design Public Affairs Undergraduate Major, January to September 1978