

NORMAN L. CHERVANY

Carlson Professor of Information and Decision Sciences

January 2010

EDUCATIONAL BACKGROUND

Dates	College/University	Major	Degree
1959 - 1963	Mount Union College	Mathematics	B.S.
1963 - 1965	Graduate School of Business, Indiana University	Quantitative Business Analysis	M.B.A.
1965 - 1968	Graduate School of Business, Indiana University	Quantitative Business Analysis	D.B.A.

Doctoral Thesis: A Simulation Analysis of Cash Flow Patterns Within a Manufacturing Organization, D.B.A. Thesis, Indiana University, 1968.

HONORS

Magna Cum Laude (1963)

Blue Key (1963)

Psi Kappa Omega (1963)

Beta Gamma Sigma (1965)

Ford Foundation Doctoral Fellowship (1965-66)

United States Steel Doctoral Fellowship (1966-67)

Outstanding Young Men of America (1973)

Outstanding Educators of America (1974)

Fellow, The Decision Sciences Institute (1983)

Rose Bowl Award, Excellence in Executive Education,

Curtis L. Carlson School of Management, University of Minnesota (1990, 1995)

MBA Teaching Honor Roll, Curtis L. Carlson School of Management,

University of Minnesota (1992)

Distinguished Service Award, The Decision Sciences Institute (1998)

Outstanding MBA Teaching, Information and Decision Sciences, Carlson School of Management, University of Minnesota, Fall 2002

Outstanding Faculty Service Award, Carlson School of Management, University of Minnesota, December 2003

Minnesota Executive Program Director Recognition, Carlson School of Management, University of Minnesota, December 2007

2007 Annual Faculty Excellence in Teaching Award, Carlson School of Management, University of Minnesota, September 2008

UNIVERSITY EXPERIENCE

1967 - Present Instructor, Assistant Professor, Associate Professor, Carlson Professor of Information and Decision Sciences, and Professor Operations and Management Sciences, Carlson School of Management, University of Minnesota

1984 - 2007 Faculty Director, Minnesota Executive Programs, Carlson School of Management, University of Minnesota

1989 - 1991 Director, Operations Management Center, Carlson School of Management, University of Minnesota

Winter 1990 Visiting Professor, Tuck School of Business Administration, Dartmouth College

1978 - 1982 Chair, Management Sciences Department, Carlson School of Management, University of Minnesota
 1982 - 1983 Director, Executive Development Center, Carlson School of Management, University of Minnesota
 1983 - 1988 Director, Professional Management Programs (MBA Programs and Executive Development Center), Carlson School of Management, University of Minnesota

PROFESSIONAL ACTIVITIES

Teaching Interests Managing information technology/information systems implementation; managing the information services function; developing organization and information technology strategy; general strategy
 Research Interests Effects of information technology/information systems on the work of individuals and the design of organizations; design and management of information technology/information systems introduction processes within large organizations; organizational and information technology strategy; the role of trust in organizational processes.
 Professional Societies The Decision Sciences Institute
 The Institute of Management Sciences
 Association for Information Systems

PROFESSIONAL ASSOCIATIONS, OFFICES HELD

President-Elect, Upper Midwest Chapter - TIMS/ORSA, 1970-1971
 President, Upper Midwest Chapter - TIMS/ORSA, 1971-1972
 Council Member, Decision Sciences Institute 1972-1973, 1975-1977
 Vice President, Planning and Development, Decision Sciences Institute 1973-1974
 President, Midwest Region, Decision Sciences Institute 1974-1975
 National Program Co-Chairman, Decision Sciences Institute, 1977
 Member, National Programs and Meetings Committee, Decision Sciences Institute, 1977-1978
 Vice-President, Decision Sciences Institute, 1978-1979
 President-Elect, President-Elect, Decision Sciences Institute, 1979-1981
 President, Decision Sciences Institute, 1981-1982
 Past-President, Decision Sciences Institute, 1982-1983
 Chair, National Nominating Committee, Decision Sciences Institute, 1982-1983
 Fellows Committee, Decision Sciences Institute, Member, 1984-1985, 1987-1988, 1993-1994; Chair, 1985-1986, 1995-1996, 2001-2003
 Chair, Foundation Committee, Decision Sciences Institute, 1987-1988
 Member, Development Committee, Decision Sciences Institute, 1996-present
 Member, Panel on Immigration Statistics, Committee on National Statistics, National Academy of Science, Washington, D.C., 1982-1984
 Associate Editor, Managerial and Decision Economics, 1990-1993
 Associate Editor, Decision Sciences, 2001 - present
 Active Reviewer for MIS Quarterly and Decision Sciences

CONSULTING EXPERIENCE

Consulting activities have involved three major areas:
 1. development and facilitation of the strategic planning process
 2. design and implementation of user-oriented management information systems
 3. design and implementation of large-scale statistical studies

Clients include:

ADC Telecommunications
 Apogee Enterprises
 Association of American Railroads
 R. L. Banks and Associates

Bemis Corporation
Braas Company
Burlington Northern Railroad
The Carlson Companies
Center for Diagnostic Imaging
Control Data Corporation
Dayton-Hudson Corporation
Enclos
Golden Valley Microwave Products
Harmon Glass/Glass Depot/Harmon Autoglass Group
Harmon Glass Ltd
Honeywell
Kahler Corporation
Minneapolis Park Board
Minnesota Department of Public Welfare
Minnesota Department of Transportation
Minnesota Energy Agency
Moniterm Corporation
The Musicland Group
MTS Corporation
3M
National Car Rental Systems
Norenco
Norfolk and Western Railroad
Norwest Bancorporation
Northwestern National Life
Popham, Haik, Schnobrich, and Kaufman
Smith, Gendler, and Shiell
Soo Line Railroad
St. Paul Companies
Stylmark
Swanson and Associates
Team Central
Twin Cities Health Care Project
Vivacon/Curvlite

RESEARCH CONTRACTS

Office of Naval Research, "The Analysis and Design of Computer-Based Management Information Systems,"
March 1970 - December 1973.

Minnesota Energy Agency, "The Development of Regional Energy Information Systems," July 1974-1977.

Paul R. Doelz, Faculty Enrichment Award, Curtis L. Carlson School of Management, University of Minnesota, 1992

Minnesota Department of Children, Families, and Learning, "Evaluation for MnCFL Pilot Project, December 2001 –
September 2003

PUBLICATIONS

Articles

1. "A Model for Cash Flow Analysis," The Proceedings of the Indiana Academy of the Social Sciences, 2 (October, 1967),
53-63.

2. "An Operations Planning Model for the Northwestern National Bank of Minneapolis," in *Corporate Simulation Models*, edited by A. Schrieber, Graduate School of Business, University of Washington, Seattle, Washington, 1970, 208-263. With J. Strom and R. Boehlke.
3. "Economic Evaluation of Management Information Systems: An Analytical Framework," *Decision Sciences*, 1 (July-August, 1970), 296-308. With G.W. Dickson.
4. "A Simulation Analysis of Causal Relationships Within the Cash Flow Processes," *The Journal of Financial and Quantitative Analysis*, 5 (December 1970), 445-465.
5. "Management Information Systems: Design Questions From the User's Perspective," *Proceedings*, Midwest Region of the American Institute for Decision Sciences, Cincinnati, Ohio (April 1972).
6. "Effects of Use of Computer in First Year Statistics Sequence on Students' Attitudes," *Decision Sciences*, 4 (January 1973), 133-140. With J. Neter.
7. "On Some Aspects of the Validity of an Experimental Simulator in MIS Research," *Proceedings*, Midwest Region of the American Institute for Decision Sciences, East Lansing, Michigan (April 1973). With M.J. Barrett and G.W. Dickson.
8. "An Economic Analysis of the Multi-Model Transportation Company: A Simulation Approach," *Logistics and Transportation Review*, 9 (1973), 69-84. With R.S. Tripp and F.J. Beier.
9. "Some Comments on Empirical Research on Information Systems," *Data Base*, 5 (December 1973), 180-181.
10. "An Experimental Evaluation of Information Overload in a Production Environment," *Management Science* 20 (June 1974), 1335-1344. With G.W. Dickson.
11. "The Structure of a Student Project Course," *Decision Sciences*, 6 (January 1975), pp. 174-183. With J. S. Heinen.
12. "Organizational Relationships Between Management Science and Management Information Systems: Some Empirical Evidence," *Proceedings*, 7th Annual Meeting of the American Institute for Decision Sciences, Cincinnati, Ohio (November 1975). With W.C. Perkins.
13. "Research in Management Information Systems: The Minnesota Experiments," *Management Science*, 23 (May 1977), pp. 913-923. With G.W. Dickson and J. Senn.
14. "A Framework for the Development of Measurement Instruments for Evaluating the Introductory Statistics Course," *The American Statistician*, Vol. 31 (February 1977), pp. 17-23. With R. Collier, S. Fienberg, P. Johnson and J. Neter.
15. "MIS: Where Should Our Profession Be Going?," *Proceedings*, Southeast Region of the American Institute for Decision Sciences, Jacksonville, Florida (February 1978).
16. "Transfer of Physician Expertise in Computer Based Support Systems," *Proceedings*, Annual Meeting of the Society for Computer Medicine (1978). With P. Johnson, G. Blitz, S. Greenfield, M. Prietula, D. G. Severance.
17. "Management of MIS Implementation: A Parallel to the Traditional Life Cycle Model," *Proceedings*, 10th Annual Meeting of the American Institute for Decision Sciences, St. Louis (November 1978).
18. "An Examination of the Planning and Execution Stage in Statistical Reasoning," *Proceedings*, 10th Annual Meeting of the American Institute for Decision Sciences, St. Louis (November 1978). With P.G. Benson.
19. "On the Validity of the Analytic Heuristic Instrument Utilized in the Minnesota Experiments: A Reply," *Management Science*, 24 (June 1978), pp. 1091-1092. With G.W. Dickson.
20. "Is Implementation Research Relevant for the MS/OR Practitioner?" *Interfaces* (May 1979). With J.C. Anderson and R. Narasimhan.
21. "On the Estimation and Stability of BETA," *Journal of Financial and Quantitative Analysis*, 15 (March 1980) With G. Alexander.
22. "A Management Science Approach to a Dutch Elm Disease Sanitation Program," *Interfaces*, 10 (April 1980), 108-114. With J.C. Anderson, P.G. Benson, and A. V. Hill.

23. "The Relationship Between Organizational Characteristics and the Structure of the Information Services Function," *MIS Quarterly*, 4 (June 1980), 52-68. With M. Olson.
24. "The Planning Stage in Statistical Reasoning," *American Statistician*, 34 (November 1980), 226-233. With P. G. Benson and R. Iyer.
25. "Evaluating Information System Effectiveness - Part 1: Comparing Evaluation Approaches," *MIS Quarterly*, 5 (September 1981), 55-69. With S. Hamilton.
26. "Evaluating Information System Effectiveness - Part 11: Comparing Evaluation Viewpoints," *MIS Quarterly*, 5 (December 1981), 79-86. With S. Hamilton.
27. "Alternative Data Entry Technologies and Settings: Impact on Worker Attitudes and Behaviors," *Information and Management*, (February 1983). With B. Ives.
28. "SCAT and SPAT: Large Scale Computer-Based Optimization Systems for the Personnel Assignment Problem," *Decision Sciences*, 14 (April 1983). With A.V. Hill and J.D. Naumann.
29. "Relationship of Resistance to Change with Structural and Process Variables: An Experimental Investigation," *Proceedings*, 16th Annual Decision Sciences Institute Meeting, Toronto (November 1984). With S. Palvia.
30. "Experimental Investigation into the Importance of Process Synergism for DSS Implementation," *Proceedings*, 18th Annual Decision Sciences Institute Meeting, Honolulu (November 1986). With S. Paivia.
31. "An Experimental Investigation into the Importance of Process Synergism for DSS Implementation," *Proceedings*, 7th International Conference on Decision Support Systems, San Francisco (June 1987). With S. Palvia.
32. "Effects of Environmental and Process Variables on DSS Implementation Success: An Experimental Investigation for Unfreezing," *Proceedings*, Northeast Decision Sciences Institute, Atlantic City (April 1987). With S. Palvia.
33. "An Experimental Investigation into the Effect of Environmental and Process Variables on DSS Implementation Success During the Moving Stage of Change," *Proceedings of the Hawaiian International Conference on Systems Science*, Kona Island, Hawaii (January 1989). With S. Palvia.
34. "Effect of Environmental and Process Variables on DSS Implementation Success: Evidence from an Experimental Investigation for the Refreezing Stage of Change," *Proceedings*, 21st Annual Decision Sciences Institute Meeting, New Orleans (November 1989). With S. Palvia.
35. "Common Sense and the Implementation of New Technology," *Management Letter*, The Bureau of Business Practice (May 1990).
36. "An Experimental Investigation of Factors Influencing Predicted Success in DSS Implementation," *Information and Management*, 29 (1995). With S. Paivia.
37. "Trust Building Process in Business Relationships. *Proceedings*, 26th Annual Decision Sciences Institute Meeting, Boston (November 1995). With D.H. McKnight.
38. "Effective Information Technology Introduction: The Roles of Knowledge and Communication," *Proceedings*, 16th International Conference on Information Systems, Amsterdam (December 1995). With S.A. Brown.
39. "Implementation Process for Information Systems," *Blackwell Encyclopedia of Management* (1996). With S.A. Brown.
40. "Innovation and Information Technology," *Blackwell Encyclopedia of Management* (1996). With S.A. Brown.
41. "The Changing System Development Job: A Job Characteristic's Approach," *Proceedings*, 1997 SIGCPR Conference, Hawaii (1997). With D. Lending.
42. "The Motivational Nature of The Critical Systems Operator Job: Expanding The Job Characteristics Model With Relationships," *Proceedings*, 1998 SIGCPR Conference, Boston (1998). With D.H. McKnight.
43. "Case Tools: Understanding the Reasons for Non-Use," *Computer Personnel* (April 1998). With D. Lending.
44. "Trust Formation in New Organizational Relationships," *Academy of Management Review* (July 1998). With D.H. McKnight.

45. "Information Technology Adoption Across Time: A Cross-Sectional Comparison of Pre-Adoption and Post-Adoption Beliefs," *MIS Quarterly* 23(June 1999.) With E. Karahanna and D. Straub.
46. "What is Trust? A Conceptual Analysis and an Interdisciplinary Model," *Proceedings of the American Conference on Information Systems*, Long Beach, CA (August 2000). With D.H. McKnight.
47. "A Clinical Information Systems Strategic Planning Model for Integrated Health Care Delivery Networks," *The Journal of Nursing Administration* (December 2000). With R. Snyder-Halpern.
48. "Conceptualizing Trust: A Typology and E-Commerce Customer Relationships Model," *Proceedings of the HICSS Conference*, Maui, Hawaii (January 2001). With D.H. McKnight.
49. "While Trust is Cool and Collected, Distrust is Fiery and Frenzied: A Model of Distrust Concepts," *Proceedings of the American Conference on Information Systems*, Boston, MA (August 2001). With D.H. McKnight.
50. "What Trust Means in E-Commerce Relationships: An Interdisciplinary Conceptual Typology," *International Journal of Electronic Commerce* (Winter 2001 -2002). With D.H. McKnight.
51. "Trust and Distrust Definitions: One Bite at a Time, in *Trust in Cyber-Society: Integrating Human and Machine Perspective*, in Falcone, R., Singh, M., and Tan, Y.H. (Eds.) (Berlin, Springer, 2001). With D.H. McKnight.
52. "The Impact of Friendship on Team Performance: A Story in Equifinality," *Academy of Management Best Paper Proceedings*, Washington, D.C. (August 2001) (with P. Shah)
53. "Case Tool Use and Job Design: A Restrictiveness/Flexibility Explanation," *The Journal of Computer Information System* (Fall 2002) (with D. Lending)
54. "What Builds System Troubleshooter Trust Best – Experience or Non-Experiential Factors? Extending a Trust-Building Model," *Information Resources Management Journal*. (July – September 2005) (with D.H. McKnight)
55. "Implementation of Information Systems," *Blackwell Encyclopedia of Management* (2005) (Revision of # 39; with S.A. Brown)
56. "Innovation and Information Technology," *Blackwell Encyclopedia of Management* (2005) (Revision of # 40; with S.A. Brown)
57. "The Multiple Pathways of High Performing Groups: The Interaction of Social Networks and Group Processes," *Journal of Organizational Behavior* (Vol. 26, 2005) [with P.P Shah and K.T. Dirks]
58. "Reflections on an Initial Trust Building Model," in A. Zaheer and R. Bachmann (eds) , *Handbook of Trust Research*, (Marston Book Services, Ltd; Oxford, United Kingdom, 2006) [with D.H. McKnight]
59. "An Extended Trust Building Model," in *Emerging Information Resources Management and Technology*, (Idea Group Publishing; Hershey, PA, 2006]
60. "New Information Technology Introduction: What Matters Where," *Communications of the ACM* (2007) (with S.A. Brown & B.A. Reinicke)
61. "Trust and Distrust Definitions: One Bite at A Time," in *Trust in Cyber-Societies* (Lecture Notes in Computer Science, Springer Berlin/Heidelberg; 2007) {with D.H. McKnight .. reprinted of #51]

Manuscripts Submitted

"In-Progress Learning Assessments: Increasing Learning in the MBA Statistics Core Course Classroom" *Decision Sciences Journal of Innovation Education* (Being revised for resubmission)

Working Papers

"Critical Information Technology for the General Manager: A Trust-Based Perspective" Target Journal *MIS Quarterly*

Work In Progress

"A Strategic Theme for Managing Information Technology" Target Journal: *Journal of Management Information Systems*

Cases

1. Mounds View School System (A)(B)(C)(D), Carlson School of Management, University of Minnesota, Minneapolis, Minnesota, 1985.
2. Wendy's International, Inc., (revision) Carlson School of Management, University of Minnesota, 1989.
3. Electronic Paper Case, Carlson School of Management, University of Minnesota, 1990.
4. Robertson Appraisal (A)(B), Carlson School of Management, University of Minnesota, 1992. With G. Benson.
5. The Market Effect of Asbestos, Carlson School of Management, University of Minnesota, 1992.
6. Harmon Glass (A), Carlson School of Management, University of Minnesota, 1994.
7. Harmon Glass (B), Carlson School of Management, University of Minnesota, 1998.
8. Braas Company, Carlson School of Management, University of Minnesota, 1998.
9. J.L. Ryan, Carlson School of Management, University of Minnesota, 2000.
10. The Minnesota Poll, Carlson School of Management, University of Minnesota, 2000.
11. The U.S. Decennial Census and Sampling, Carlson School of Management, University of Minnesota, 2000.
12. Onyx Marine, Carlson School of Management, University of Minnesota, 2003.
13. Guidant's Entry into the Remote Patient Management Market, Carlson School of Management, University of Minnesota (2005)
14. McKesson Medial-Surgical: An In-Office Prescription (Rx) Dispensing Business, Carlson School of Management, University of Minnesota, 2006
15. "Positioning Cordillera," Carlson School of Management, University of Minnesota, 2007
16. "Should OptumHealth Enter the Medical Tourism Business?" Carlson School of Management, University of Minnesota, 2007.
17. "What Strategy Should C.H. Robinson Follow in the Strategic Evolution of Its 3PL and 4PI Services?" Carlson School of Management, University of Minnesota, 2008.
18. "Remote Patient Healthcare at Mayo," Carlson School of Management, University of Minnesota, 2009.

Minnesota Management Review, Curtis L. Carlson School of Management, University of Minnesota, Minneapolis, Minnesota.

"Help!!! How Should We Approach Continuing Management Development and Education?" (June, 1983)

"Professional Management Programs, The School of Management, and You." (November 1983)

"The Managers' MBA May Be For You." (June, 1984)

"Scholarship: Meeting the Company Management Environment." (November, 1984)

"Management, Common Sense, and a Troubling Concern." (March, 1985)

"People, Management, and Inconsistency." (July, 1985)

"The MBA Purpose: What Business Are We In." (November, 1985)

"Have Your Cake and Eat It Too." (Winter, 1986)

Books and Monographs

1. "Health Maintenance Organizations Management and Information Systems," Management Information Systems Research Center Monograph #4, University of Minnesota, Minneapolis, Minnesota, March 1973. With G.W. Dickson, TR. Hoffmann, R.G. Schroeder.
2. *Statistical Analysis and Modeling for Management Decision-Making* (Wadsworth, Inc., 1974). With R. E. Willis
3. "Analysis and Design of Computer-Based Management Information Systems: An Evaluation of Risk Analysis Decision Aids," Management Information Systems Research Center Monograph #5, University of Minnesota, Minneapolis, October, 1974. With R.F. Sauter.
4. "A Regional Energy Information System For Minnesota: A Preliminary Design," Regional Energy Information Systems and Economic Impact Analysis Project, Management Information Systems Research Center, University of Minnesota, Minneapolis, Minnesota, January, 1975. With J.D. Naumann, R. Krishnan, D. Quillan, and J. Schmitt.
5. "An Overview of the REIS System," REIS: Phase I, Report I, Regional Energy Information Systems and Economic Impact Analysis Project, Management Information Systems Research Center, University of Minnesota, Minneapolis, Minnesota, July, 1975. With J.D. Naumann and R.D. Visness.
6. "The REIS Databases," REIS: Phase II, Report II, Regional Energy Information Systems and Economic Impact Analysis Project, Management Information Systems Research Center, University of Minnesota, Minneapolis, Minnesota, October, 1975. With J.D. Naumann and R.D. Visness.
7. "REIS Implementation Strategy," REIS: Phase II, Report III, Regional Energy Information Systems and Economic Impact Analysis Project, Management Information Systems Research Center, University of Minnesota, Minneapolis, Minnesota, September, 1975. With J.D. Naumann and R.D. Visness.
8. "Evaluation of the Minnesota Rebate Pilot," Minnesota Department of Education, St. Paul, Minnesota, December 2003. With F. J. Beier.