

John Hartley Semple

Eugene J. and Ruth F. Constantin, Jr. Distinguished Chair in Business (January, 2024)

BUSINESS ADDRESS

Department of Information Technology and Operations Management
Edwin L. Cox School of Business
Southern Methodist University
PO Box 750333
Dallas, TX 75275-0333 Phone: (214) 768-2546
 email: jsempire@mail.cox.smu.edu

EDUCATION

Ph.D. Management Science/Mathematics, The University of Texas at Austin, December, 1990.

M.Sc. Applied Mathematics, McGill University, 1985.

B.Sc. Mathematics, McGill University, 1983.

REFEREED JOURNAL ARTICLES

"Testing a Theory of Strategic Multi-Product Choice" with Ed Fox and Hristina Dishkova, forthcoming in *Quantitative Marketing and Economics*.

“Heteroscedastic Expomomial Choice,” (with Aydin Alptekinoglu), *Operations Research*, 69(3), (2021) 683-1013.

“Choosing an n-Pack of Substitutable Products” (with Ed Fox and Laura Norman), *Management Science*, Vol. 64(5), (2018) 2366-2379.

"The Exponential Choice Model: A New Alternative for Assortment and Price Optimization" (with Aydin Alptekinoglu), *Operations Research*, Vol. **64**(1), (2016) 79-93. (<http://dx.doi.org/10.1287/opre.2015.1459>)

“Dynamic Road Pricing for Revenue Maximization: Modeling Framework and Solution Methodology,” with A. Hassan and K. Abdelghany, *Transportation Research Record: Journal of the Transportation Research Board*, Vol. 2345, (2013) 100-108.

"A Dynamic Inventory Model with the Right of Refusal," (with S. Bhaskaran and K. Ramachandran), *Management Science*, 56(12), (2010) 2265-2281.

"Optimal Category Pricing with Endogenous Store Traffic," (with E. Fox and S. Postrel), *Marketing Science*, **28**(4) (2009) 709-720.

“Note: Generalized Notions of Concavity with an Application to Capacity Management,” *Operations Research*, 55(2) (2007) 284-291.

“Quality-Based Competition, Profitability, and Variable Costs,” (with C. Chambers and P. Kouvelis), *Management Science*, **52**(12) (2006) 1884-1895.
[Online companion document: <http://www.informs.org/site/ManSci/article.php?id=49>]

“Optimal Inventory Policy with Two Suppliers,” (TN) (with E. Fox and R. Metters), *Operations Research*, **54**(2) (2006) 389-393. [Online companion document available at: <http://www.informs.org/site/OperationsResearch/index.php?c=122&kat=TOC+v54.2>]

“A Heuristic for Multi-item Production with Seasonal Demand,” (with M. Ketzenberg and R. Metters) *IIE Transactions*, **38** (2006) 201-211.

“The Impact of Provider Autonomy on HMO Efficiency,” (with P. Brockett, R. Chang, J.J. Rousseau, and C. Yang) *Journal of Risk and Insurance*, **71**(1) (2004) 1-19. [2005 Robert C. Witt Award for best feature paper published in JRI in 2004]

“The Impact of Check Sequencing on NSF Fees,” (with U. M. Apte, A. Apte, R. P. Beatty and I. Sarkar) *Interfaces*, **34**(2) (2004) 97-105.

“Managing Inventory with Multiple Products, Lags in Delivery, Resource Constraints, and Lost Sales: A Mathematical Programming Approach,” (with B. Downs and R. Metters), *Management Science*, **47**(3) (2001) 464-479.

“Vendor Selection with Bundling: A Comment,” (with J. Sarkis), *Decision Sciences*, **30**(1) (1999) 265-271.

“Optimization of Dual Response Systems: A Comprehensive Procedure for Degenerate and Nondegenerate Problems,” (with E. Del Castillo and S. Fan) *European Journal of Operational Research*, **112**(1) (1999) 174-186.

“Economic Justification for Incremental Implementation of Advanced Manufacturing Technologies,” (with V. Lotfi and J. Sarkis) *Journal of the Operational Research Society*, **49**(8) (1998) 829-839.

“Optimality Conditions and Solution Procedures for Nondegenerate Dual Response Systems,” *IIE Transactions*, **29**(9) (1997) 743-752.

“The Computation of Global Optima for Dual Response Systems,” (with E. Del Castillo and S. Fan), *Journal of Quality Technology (Computer Programs Section)*, **29**(3) (1997) 347-353.

“Constrained Games for Evaluating Organizational Performance,” *European Journal of Operational Research*, **96**(1) (1997) 103-112.

“Dominant Competitive Factors for Evaluating Program Efficiency in Grouped Data,” (with J.J. Rousseau) *Annals of Operations Research*, **73** (1997) 253-276.

“Sensitivity and Stability of Efficiency Classifications in Data Envelopment Analysis,” (with A. Charnes and J.J. Rousseau) *Journal of Productivity Analysis*, **7**(1) (1996) 5-18.

“Infinite Positive Definite Quadratic Programming in a Hilbert Space,” *Journal of Optimization Theory and Applications*, **88**(3) (1996) 743-749.

“Two-Person Ratio Efficiency Games,” (with J.J. Rousseau) *Management Science*, **41**(3) (1995) 435-441.

“Radii of Classification Preservation in Data Envelopment Analysis: a Case Study of Program Follow Through,” (with J.J. Rousseau) *Journal of the Operational Research Society*, **46**(8) (1995) 943-957.

“An Optimal Multi-Machine Replacement Policy in a Serially Dependent Production System,” (with J. Sarkis) *International Journal of Production Research*, **32**(11) (1994) 2657-2667.

“An Effective Non-Archimedean Anti-Degeneracy/Cycling Linear Programming Method Especially for Data Envelopment Analysis and Like Models,” (with A. Charnes and J.J. Rousseau) *Annals of Operations Research*, **47** (1993) 271-278.

“Notes: Categorical Outputs in Data Envelopment Analysis,” (with J.J. Rousseau) *Management Science*, **39**(3) (1993) 384-386.

“Non-Archimedean Infinitesimals, Transcendentals and Categorical Inputs in Linear Programming and Data Envelopment Analysis,” (with A. Charnes and J.J. Rousseau) *International Journal of Systems Science*, **23**(12) (1992) 2401-2406.

“Assessing the Relative Efficiency of Agricultural Production Units in the Blackland Prairie, Texas,” (with S. Haag and P. Jaska) *Applied Economics*, **24** (1992) 559-565.

“Sensitivity of Efficiency Classifications in the Additive Model of Data Envelopment Analysis,” (with A. Charnes, P. Jaska and S. Haag) *International Journal of Systems Science*, **23**(5) (1992) 789-798.

“Semi-Infinite Relaxation of Joint Chance Constraints in Chance-Constrained Programming Part 1. Zero-Order Stochastic Decision Rules,” (with A. Charnes and Y.C. Chang) *International Journal of Systems Science*, **23**(7) (1992) 1051-1061.

“Practical Error Bounds for a Class of Quadratic Programming Problems,” (with A. Charnes) *Informatica*, **2**(3) (1991) 352-366.

“On a Necessary Condition for Stability in Perturbed Linear and Convex Programming,” (with S. Zlobec) *Zeitschrift für Operations Research*, **31** (1987) 161-172.

“On the Continuity of a Lagrangian Multiplier Function in Input Optimization,” (with S. Zlobec) *Mathematical Programming*, **34** (1986) 362-369.

PAPERS UNDER REVIEW, WORK in PROGRESS

“Equitable Appointment Scheduling at a Healthcare Clinic: A Data-Driven Markov Chain Approach” with Chester Chambers (SMU) and Mac Dada (Johns Hopkins).

“Momentum-Based Models in Social Media Networks,” with Rajiv Mukherjee (Texas A&M).

“Mixed Exponomial” with Aydin Alptekinoglu (Penn State), in progress.

EDITORIAL BOARDS

Senior Editor, Production and Operations Management, (2003-2014)

Associate Editor, Interfaces (INFORMS) (2004-2009)

Associate Editor, OMEGA (2004-2006)

ACADEMIC POSITIONS AND EMPLOYMENT

Eugene J. and Ruth F. Constantin, Jr. Distinguished Chair in Business (Aug. 1, 2020–), Department of Information Technology and Operations Management, SMU.

Charles Wyly Professor of MIS (Aug. 1, 2009–July 31, 2020), Department of Information Technology and Operations Management, SMU.

Department Chairman of Information Technology and Operations Management (ITOM) (May 2009-May 2012), Cox School of Business, SMU.

Associate Professor of ITOM (Fall 2001–2009), Department of Information Technology and Operations Management, Edwin L. Cox School of Business, SMU.

Assistant Professor of Information Systems and Operations Management (Fall 1997–Fall 2001), Department of Management Information Sciences, Edwin L. Cox School of Business, SMU.

Visiting Assistant Professor of Management Information Sciences (Fall 1996 – Summer 1997), Department of Management Information Sciences, Edwin L. Cox School of Business, SMU.

Research Fellow, (1992 – present), Center for Management of Operations and Logistics (CMOL), The University of Texas at Austin, CBA 5.202, Austin, TX 78712-1177.

Assistant Professor of Management Sciences (1992 – 1996), Department of Information Systems and Management Sciences, The University of Texas at Arlington.

Visiting Assistant Professor of Management Sciences (1990 – 1992), Department of Information Systems and Management Sciences, The University of Texas at Arlington.

Assistant Instructor of Mathematics (1989 – 1990), The University of Texas at Austin.

HONORS, AWARDS, FELLOWSHIPS (SMU)

- 1997 Distinguished BBA Teaching Award (top BBA teaching award)
- 1999 Recognition for Outstanding Teaching in the MBA Program
- 2001 Recognition for Outstanding Teaching in the MBA Program
- 2001 Cox School of Business Research Excellence Award (top research award)
- 2002 Nominated for SMU Distinguished Teacher Award
- 2002 Corrigan Research Fellowship
- 2003 Distinguished MBA Teaching Award (top MBA teaching award)
- 2003 Corrigan Research Fellowship
- 2004 Robert C. Witt Award for Best Paper Published in JRI for 2004
- 2004 Corrigan Research Fellowship
- 2005 Most Valuable EMBA Professor Award (top EMBA teaching award)
- 2005 Corrigan Research Fellowship
- 2006 Recognition for Outstanding Teaching in the MBA Program
- 2006 Corrigan Research Fellowship
- 2007 Distinguished MBA Teaching Award (top MBA teaching award)
- 2007 Corrigan Research Fellowship
- 2008 Recognition for Outstanding Teaching in the MBA Program
- 2008 Eugene T. Byrne Endowed Faculty Innovation Award
- 2009 Boghetich Family Distinguished Teaching Award
- 2010 Cox School of Business Research Excellence Award
- 2014 Boghetich Family Distinguished Teaching Award
- 2015 Recognition for Outstanding Teaching in the MBA Program
- 2016 Recognition for Outstanding Teaching in the MBA Program
- 2020 Boghetich Family Distinguished Teaching Award

COMMITTEES AND SERVICE

SMU Cox Graduate Policy Committee) (2001–2006, 2011-present).

SMU Cox Promotion and Tenure Committee, (2002–2006; 2012-2013 2018-).

SMU University Promotion and Tenure Committee (2018-2021)

SMU Data Science Task Force Committee (2021—)

Global Leadership Program (an international course for MBA students taught each May), 2002–2003 (Japan), 2003–2004 (Europe), 2004–2005 (Latin America), 2005–2006 (China), 2009-2010 (India), 2010-2011 (India).

SMU Faculty Senate (2006–2008).

Faculty Senate Committee on Ethics and Tenure (2013-2015).

Chairman, ITOM Department, (Fall, 2009—Fall, 2012).

