

MINGHE SUN – VITAE

Professor

(Updated November 10, 2023)

College of Business	8218 Mirar Pass
The University of Texas at San Antonio	San Antonio, Texas 78255
San Antonio, Texas 78249-0634	Phone: (210) 558-7861
Phone: (210) 458-5777	
Fax: (210) 458-6350	
e-mail: minghe.sun@utsa.edu	
Homepage: http://faculty.business.utsa.edu/msun	

Academic Training

1987–1992 Ph. D. from the Department of Management Sciences and Information Technology, Terry College of Business, the University of Georgia. Major: Management Science and Information Technology. Minor: Production and Operations Management. G.P.A.–4.00/4.00. Dissertation title: Interactive Multiple Objective Programming Procedures via Adaptive Random Search and Feed-Forward Artificial Neural Networks (won 1993 Decision Sciences Institute Elwood S. Buffa Doctoral Dissertation Competition Award). Major Professor: Dr. Ralph E. Steuer.

1985–1987 MBA from the Chinese University of Hong Kong. G.P.A.–3.80/4.00.

1978–1982 BS. from the Northeastern University, Shenyang, China. Major: Nonferrous Metallurgy. G.P.A.–94/100.

Positions Held and a Summary of Teaching Experience

2003–present Professor, College of Business, The University of Texas at San Antonio

1998–2003 Associate Professor (tenured), College of Business, The University of Texas at San Antonio

1992–1998 Assistant Professor (tenure track), College of Business, The University of Texas at San Antonio
Courses taught:

- IS 2043 – Data Structures and File Processing
- MS 1023 – Business Statistics with Computer Applications I
- MS 3033 (MGT 3033) – Management Science and Production Management
- MS 3043 – Business Statistics with Computer Applications II
- MS 3053 – Management Science and Operations Technology
- MS 4543 – Supply Chain Management
- MS 5413 – Integrated Global Supply Chain Management
- MS 5003 (MGT 5013) – Quantitative Methods for Business Analysis
- MS 5023 (MGT 5023) – Decision Analysis and Production
- STA 7013 – Advanced Applied Business Statistical Models
- STA 7023 – Applied Linear Statistical Models

1987–1992 Teaching Assistant, Department of Management Sciences and Information Technology, Terry College of Business, The University of Georgia
Courses taught with full responsibility:

- MS 312 – Statistical Analysis for Business (13 Quarters)
- MS 500/800 – Survey of Operations Research (2 Quarters)
- MS 509 – Applications of Small Computers in Business (2 Quarters)

For the courses above, teaching evaluations of “one of the most effective (among the top 20%)” from the students have been maintained.

- May–June 1995 Invited to work at the International Institute for Applied Systems Analysis (IIASA) as a Visiting Research Scientist.
- 1982–1985 Assistant Lecturer, Department of Management Engineering, Northeastern University, Shenyang, Liaoning, PRC
- 1976–1978 High School Teacher, Shouguang, Shandong, PRC

Refereed Publications

Journal Articles:

- Ahmadi, E., H. Mosadegh, R. Maihami, I. Ghalekhondabi, M. Sun and G. A. Süer, “Intelligent Inventory Management Approaches for Perishable Pharmaceutical Products in a Healthcare Supply Chain”, *Computers & Operations Research*. Vol. 147, Article 105968, 2022. <https://doi.org/10.1016/j.cor.2022.105968>.
- Bafahm, A. and M. Sun, “Some Conflicting Results in the Analytic Hierarchy Process”, *International Journal of Information Technology & Decision Making*, Vol. 18, No. 2, pp. 465–486, 2019.
- Beebe, N. L., L. A. Maddox, L. Liu and M. Sun, “Sceadan: Using Concatenated N-Gram Vectors for Improved File and Data Type Classification”, *IEEE Transactions on Information Forensics and Security*, Vol. 8, No. 9, pp. 1519–1530, 2013.
- Cao, B., M. Sun and C. Macleod, “Applying GIS and Combinatorial Optimization to Fiber Deployment Plan”, *Journal of Heuristics*, Vol. 5, No. 4, pp. 385–402, 1999.
- Chen, Z. -Y., Z. -P. Fan and M. Sun, “A Hierarchical Multiple Kernel Support Vector Machine for Customer Churn Prediction Using Longitudinal Behavioral Data”, *European Journal of Operational Research*, Vol. 223, No. 2, pp. 461–473, 2012.
- Chen, Z. -Y., Z. -P. Fan and M. Sun, “Behavior-Aware User Response Modeling in Social Media: Learning from Diverse Heterogeneous Data”, *European Journal of Operational Research*, Vol. 241, No. 2, pp. 422–434, 2015.
- Chen, Z. -Y., Z. -P. Fan and M. Sun, “A Multi-Kernel Support Tensor Machine for Classification with Multitype Multiway Data and an Application to Cross-Selling Recommendations”, *European Journal of Operational Research*, Vol. 255, No. 1, pp. 110–120, 2016.
- Chen, Z. -Y., Z. -P. Fan and M. Sun, “Individual-level Social Influence Identification in Social Media: A Learning-Simulation Coordinated Method”, *European Journal of Operational Research*, Vol. 273, No. 3, pp. 1005–1015, 2019.
- Chen, Z. -Y., Z. -P. Fan and M. Sun, “Tensorial Graph Learning for Link Prediction in Generalized Heterogeneous Networks”, *European Journal of Operational Research*. Vol. 290, No. 1, pp. 219–234, 2021. <https://doi.org/10.1016/j.ejor.2020.05.062>.
- Chen, Z. -Y., Z. -P. Fan and M. Sun, “Machine Learning Methods for Data-driven Demand Estimation and Assortment Planning Considering Cross-selling and Substitutions”, *INFORMS Journal on Computing*. Vol. 35, No. 1, pp. 158–177, 2023. <https://doi.org/10.1287/ijoc.2022.1251>.
- Chen, Z. -Y., Z. -P. Fan and M. Sun, “Inventory Management with Multisource Heterogeneous Information: Roles of Representation Learning and Information Fusion”, *IEEE Transactions on Systems, Man and Cybernetics: Systems*. Vol. 53, No. 9, pp. 5343–5355, 2023. <https://doi.org/10.1109/TSMC.2023.3267858>.
- Chen, Z. -Y., M. Sun and X. -X. Han, “Prediction-driven Collaborative Emergency Medical Resource Allocation with Deep Learning and Optimization”, *Journal of the Operational Research Society*. Vol. 74, No. 2, pp. 590–603, 2023. <https://doi.org/10.1080/01605682.2022.2101953>.

- Drinka, D., M. Sun and B. Murray, “A Multiple Objective Embedded Network Model for Human Resource Planning and an Implementation of the Tchebycheff Method”, *Decision Sciences*, Vol. 27, No. 2, pp. 319–341, 1996.
- Dulebohn, J. H., B. Murray and M. Sun, “Selection among Employer-Sponsored Pension Plans: The Role of Individual Differences”, *Personnel Psychology*, Vol. 53, No. 2, pp. 405–432, 2000.
- Farrokh, M., E. Ahmadi and M. Sun, “A Robust Stochastic Possibilistic Programming Model for Dynamic Supply Chain Network Design with Pricing and Technology Selection Decisions”, *Opsearch*, Vol. 60, pp. 1082–1120, 2023. <https://doi.org/10.1007/s12597-023-00643-2>.
- Graham, R. G. and M. Sun, “An Empirical Analysis of Project Management in a Selected Industrial Area in the Peoples Republic of China”, *Project Management Journal*, Vol. 19, No. 3, pp. 59–64, 1988.
- Guan, Z., Y. Mou and M. Sun, “Hybrid Robust and Stochastic Optimization for a Capital-Constrained Fresh Product Supply Chain Integrating Risk-Aversion Behavior and Financial Flow”, *Computers & Industrial Engineering*. Vol. 169, Article 108224, 2022. <https://doi.org/10.1016/j.cie.2022.108224>.
- Guo, D., Z. -P. Fan and M. Sun, “B2C Car-Sharing Services: Sharing Mode Selection and Value-Added Service Investment”, *Transportation Research Part E: Logistics and Transportation Review*. Vol. 165, Article 102836, 2022. <https://doi.org/10.1016/j.tre.2022.102836>.
- Hao, J., M. Sun and J. Yin, “Convergence to IFRS, Accounting Quality, and the Role of Regional Institutions: Evidence from China”, *Asian Review of Accounting*, Vol. 27, No. 1, pp. 29–48, 2019.
- Hassanzadeh, F., H. Nemati and M. Sun, “Robust Optimization for Interactive Multiobjective Programming with Imprecise Information Applied to R&D Project Portfolio Selection”, *European Journal of Operational Research*, Vol. 238, No. 1, pp. 41–53, 2014.
- He, N., Z. -Z. Jiang, M. Sun, and Y. Sheng, “Group Buying of Competing Retailers with Fairness Concerns”, *Journal of Systems Science and Systems Engineering*, Vol. 29, No. 6, pp. 655–674, 2020. <https://link.springer.com/article/10.1007/s11518-020-5468-y>.
- He, N., Z. -Z. Jiang, J. Wang, M. Sun and G. Xie, “Maintenance Optimisation and Coordination with Fairness Concerns for the Service-oriented Manufacturing Supply Chain”, *Enterprise Information Systems*, Vol. 15, No. 5, pp. 694–724, 2021. <https://doi.org/10.1080/17517575.2020.1746406>.
- Ji, S., J. Tang, M. Sun and R. Luo, “Multi-objective Optimization for a Combined Location-Routing-Inventory System Considering Carbon-Capped Differences”, *Journal of Industrial and Management Optimization*. Vol. 18, No. 3, pp. 1949–1977, 2022. <https://www.aims sciences.org/article/doi/10.3934/jimo.2021051>.
- Jiang, Y. -P., Z. -P. Fan, H. -M. Liang and M. Sun, “An Optimization Approach for Existing Home Seller-Buyer Matching”, *Journal of the Operational Research Society*, Vol. 70, No. 2, pp. 237–254, 2019. <http://dx.doi.org/10.1080/01605682.2018.1427432>.
- Jiang, Y. -P., H. -M. Liang and M. Sun, “A Method Based on the Ideal and Nadir Solutions for Stochastic MADM Problems”, *Computers & Industrial Engineering*, Vol. 87, pp. 114–125, 2015.
- Jiang, Z., X. Liu and M. Sun, “A Density Peak Clustering Algorithm Based on the K Nearest Shannon Entropy and Tissue-like P System”, *Mathematical Problems in Engineering*, Vol. 2019, Article 1713801, 13 pages, 2019. <http://downloads.hindawi.com/journals/mpe/2019/1713801.pdf>.
- Jiang, Z. -Z., N. He, X. Qin, M. Sun and P. Wang, “Optimizing Production and Maintenance for the Service-Oriented Manufacturing Supply Chain”, *Annals of Operations Research*. Vol. 316, No. 1, pp. 33–58, 2022. <https://link.springer.com/article/10.1007/s10479-020-03758-7>.
- Jin, X. -B, G. -G. Geng, M. Sun and D. Zhang, “Combination of Multiple Bipartite Ranking for Multipartite Web Content Quality Evaluation”, *Neurocomputing*, Vol. 149, Part C, pp. 1305–1314, 2015.
- Liu, H. -C., Y. -P. Hu, J. -J. Wang and M. Sun, “Failure Mode and Effects Analysis Using Two-Dimensional Uncertain Linguistic Variables and Alternative Queuing Method”, *IEEE Transactions on Reliability*, Vol. 68, No. 2, pp. 554–565, 2019. <http://dx.doi.org/10.1109/TR.2018.2866029>.

- Liu, J., J. Tang and M. Sun, “The Impact of the COVID-19 Prevention and Economic Interventions on Express Delivery Industry: Evidence from in China”, *Journal of Management Science and Engineering*, Forthcoming, 2023. <https://doi.org/10.1016/j.jmse.2023.07.001>.
- Liu, X., Y. Zhao and M. Sun, “An Improved *A priori* Algorithm Based on an Evolution-Communication Tissue-like P System with Promoters and Inhibitors”, *Discrete Dynamics in Nature and Society*, Vol. 2017, Article 6978146, 11 pages, 2017. <https://doi.org/10.1155/2017/6978146>.
- Lutz, C. M., K. R. Davis and M. Sun, “Determining Buffer Location and Size in Production Lines Using Tabu Search”, *European Journal of Operational Research*, Vol. 106, No. 2–3, pp. 301–316, 1998.
- Mancha, R., M. T. Leung, J. Clark and M. Sun, “Finite Mixture Partial Least Squares for Segmentation and Behavioral Characterization of Auction Bidders”, *Decision Support Systems*, Vol. 57, pp. 200–211, 2014.
- Marlin, D., J. W. Huonker and M. Sun, “An Examination of the Relationship between Strategic Group Membership and Hospital Performance”, *Health Care Management Review*, Vol. 27, No. 4, pp. 18–29, 2002.
- Marlin, D., M. Sun and J. W. Huonker, “Strategic Groups and Performance in the Nursing Home Industry: A Reexamination”, *Medical Care Research and Review*, Vol. 56, No. 2, pp. 156–176, 1999.
- Philippart, J., M. Sun, J.-L. Doucet and P. Lejeune, “Mathematical Formulation and Exact Solution for Landing Location Problem in Tropical Forest Selective Logging, a Case Study in Southeast Cameroon”, *Journal of Forest Economics*, Vol. 18, No. 2, pp. 113–122, 2012.
- Qin, X., Z. –Z. Jiang, M. Sun, L. Tang and X. Liu, “Repairable Spare Parts Provisioning for Multiregional Expanding Fleets of Equipment under Performance-based Contracting”, *Omega: The International Journal of Management Science*. Vol. 102, Article 102328, 2021. <https://doi.org/10.1016/j.omega.2020.102328>.
- Qiu, R., L. Hou, Y. Sun, M. Sun and Y. Sun, “Joint Pricing, Ordering and Order Fulfillment Decisions for a Dual-channel Supply Chain with Demand Uncertainties: A Distribution-free Approach,” *Computers & Industrial Engineering*, Vol. 160, Article 107546, 2021. <https://doi.org/10.1016/j.cie.2021.107546>.
- Qiu, R., C. Li and M. Sun, “Impacts of Consumer Virtual Showrooming Behavior on Manufacturer and Retailer Strategic Decisions in a Dual-channel Supply Chain”, *European Journal of Operational Research*. Vol. 313, No. 1, pp. 325–342, 2024. <https://doi.org/10.1016/j.ejor.2023.08.025>.
- Qiu, R., X. Li and M. Sun, “Vertical Integration of an Online Secondhand Platform and a Recycling Platform under Different Power Structures”, *European Journal of Operational Research*, Vol. 310, No. 1, pp. 286–301, 2023. <https://doi.org/10.1016/j.ejor.2023.02.010>.
- Qiu, R., L. Ma and M. Sun, “A Robust Omnichannel Pricing and Ordering Optimization Approach with Return Policies Based on Data-driven Support Vector Clustering”, *European Journal of Operational Research*. Vol. 305, No. 3, pp. 1337–1354, 2023. <https://doi.org/10.1016/j.ejor.2022.07.029>.
- Qiu, R., M. Sun and Y. F. Lim, “Optimizing (s, S) Policies for Multi-period Inventory Models with Uncertainties in Demand Distributions: A Robust Dynamic Programming Approach”, *European Journal of Operational Research*, Vol. 261, No. 3, pp. 880–892, 2017.
- Qiu, R., Y. Sun, Z. Fan and M. Sun, “Robust Multi-Product Inventory Optimization under Support Vector Clustering-Based Data-Driven Demand Uncertainty Set”, *Soft Computing*, Vol. 24, No. 9, pp. 6259–6275, 2020. <https://link.springer.com/content/pdf/10.1007%2Fs00500-019-03927-2.pdf>.
- Qiu, R., Y. Sun and M. Sun, “A Distributionally Robust Optimization Approach for Multi-Product Inventory Decisions with Budget Constraint and Demand and Yield Uncertainties”, *Computers & Operations Research*, Vol. 126, Article 105081, 2021. <https://doi.org/10.1016/j.cor.2020.105081>.
- Qiu, R., Y. Sun and M. Sun, “A Robust Optimization Approach for Multi-Product Inventory Management in a Dual-channel Warehouse under Demand Uncertainty”, *Omega: The International Journal of Management Science*. Vol. 109, Article 102591, 2022. <https://doi.org/10.1016/j.omega.2021.102591>.
- Qiu, R., Y. Sun, M. Sun and Y. Yu, “Affinely Adjustable Robust Optimization for a Multi-Period Inventory Problem with Capital Constraints and Demand Uncertainties”, *International Transactions in Operational Research*, Vol. 31, No. 1, pp. 415–447, 2024. <https://onlinelibrary.wiley.com/doi/epdf/10.1111/itor.13150>.

- Qiu, R., Y. Sun, H. Zhou and M. Sun, “Dynamic Pricing and Quick Response of a Retailer in the Presence of Strategic Consumers: A Distributionally Robust Optimization Approach”, *European Journal of Operational Research*, Vol 307, No. 3, pp. 1270–1298, 2023. <https://doi.org/10.1016/j.ejor.2022.10.042>.
- Qiu, R., Y. Yu and M. Sun, “Joint Pricing and Stocking Decisions for a Newsvendor Problem with Loss Aversion and Reference Point Effect”, *Managerial and Decision Economics*, Vol. 42, No. 2, pp. 275–288, 2021. <https://doi.org/10.1002/mde.3233>.
- Qiu, R., Y. Yu and M. Sun, “Supply Chain Coordination by Contracts Considering Dynamic Reference Quality Effect under the O2O Environment”, *Computers & Industrial Engineering*, Vol. 163, Article 107802, 2022. <https://www.sciencedirect.com/science/article/pii/S0360835221007063?via%3Dihub>.
- Qu, J., X. Liu, M. Sun and F. Qi, “GPU-based Parallel Particle Swarm Optimization Methods for Graph Drawing”, *Discrete Dynamics in Nature and Society*, Vol. 2017, Article 2013673, 15 pages, 2017. <https://doi.org/10.1155/2017/2013673>.
- Ren, Q., X. Liu and M. Sun, “Turing Universality of Weighted Spiking Neural P Systems with Anti-spikes”, *Computational Intelligence and Neuroscience*, Article 8892240, 2020. <http://downloads.hindawi.com/journals/cin/2020/8892240.pdf>.
- Stam, A., M. Sun and M. Haines, “Artificial Neural Network Representations for Hierarchical Preference Structures”, *Computers & Operations Research*, Vol. 23, No. 12, pp. 1191–1201, 1996.
- Stam, A., M. Sun and M. Haines, “Feed-Forward Neural Networks for Approximating Pairwise Preference Structures”, *Lecture Notes in Economics and Mathematical Systems*, Vol. 448, pp. 413–420, 1997.
- Steuer, R. E. and M. Sun, “The Parameter Space Investigation Method for Multiple Objective Nonlinear Programming: A Computational Investigation”, *Operations Research*, Vol. 43, No. 4, pp. 641–648, 1995.
- Stummer, C and M. Sun, “New Multiobjective Metaheuristic Solution Procedures for Capital Investment Planning”, *Journal of Heuristics*, Vol. 11, No. 3, pp. 183–199, 2005.
- Sun, K., M. Sun, D. Agrawal, R. W. Dravenstott, F. A. Rosinia and A. Roy, “Equitable Anesthesiologist Scheduling under Demand Uncertainty Using Multi-Objective Programming”, *Production and Operations Management*, Vol. 32, No. 11, pp. 3699–3716, 2023.
- Sun, M., “A Tabu Search Heuristic Procedure for Solving the Transportation Problem with Exclusionary Side Constraints”, *Journal of Heuristics*, Vol. 3, No. 4, pp. 305–326, 1998.
- Sun, M., “A Multiple Objective Programming Approach for Determining Faculty Salary Equity Adjustments”, *European Journal of Operational Research*, Vol. 138, No. 2, pp. 302–319, 2002.
- Sun, M., “The Transportation Problem with Exclusionary Side Constraints and Two Branch-and-Bound Algorithms”, *European Journal of Operational Research*, Vol. 140, No. 3, pp. 629–647, 2002.
- Sun, M., “Procedures for Finding Nondominated Solutions for Multiple Objective Network Programming Problems”, *Transportation Science*, Vol. 37, No. 2, pp. 139–152, 2003.
- Sun, M., “Warm-Start Routines for Solving Augmented Weighted Tchebycheff Programs in Multiple Objective Network Programming”, *INFORMS Journal on Computing*, Vol. 17, No. 4, pp. 422–437, 2005.
- Sun, M., “Some Issues in Measuring and Reporting Solution Quality of Interactive Multiple Objective Programming Procedures”, *European Journal of Operational Research*, Vol. 162, No. 2, pp. 468–483, 2005.
- Sun, M., “Solving Uncapacitated Facility Location Problems Using Tabu Search”, *Computers & Operations Research*, Vol. 33, No. 9, pp. 2563–2589, 2006.
- Sun, M., “A Primogenitary Linked Quad Tree Data Structure and Its Application to Discrete Multiple Criteria Optimization”, *Annals of Operations Research*, Vol. 147, No. 1, pp. 87–107, 2006.
- Sun, M., “Linear Programming Approaches for Multiple-Class Discriminant and Classification Analysis”, *International Journal of Strategic Decision Sciences*, Vol. 1, No. 1, pp. 57–80, 2010.
- Sun, M., “Finding Integer Efficient Solutions for Multiple Objective Network Programming Problems”, *Networks*, Vol. 57, No. 4, pp. 362–375, 2011.

- Sun, M., “A Mixed Integer Programming Model for Multiple-Class Discriminant Analysis”, *International Journal of Information Technology & Decision Making*, Vol. 10, No. 4, pp. 1–24, 2011.
- Sun, M., “A Primogenitary Linked Quad Tree Approach for Solution Storage and Retrieval in Heuristic Binary Optimization”, *European Journal of Operational Research*, Vol. 209, No. 3, pp. 228–240, 2011.
- Sun, M. “A Tabu Search Heuristic Procedure for the Capacitated Facility Location Problem”, *Journal of Heuristics*, Vol. 18, No. 1, pp. 91–118, 2012.
- Sun, M., “A Multi-Class Support Vector Machine: Theory and Model”, *International Journal of Information Technology and Decision Making*, Vol. 12, No. 6, pp. 1175–1199, 2013.
- Sun, M., “A Branch-and-Bound Algorithm for Representative Integer Efficient Solutions in Multiple Objective Network Programming Problems”, *Networks*, Vol. 62, No. 1, pp. 56–71, 2013.
- Sun, M., J. E. Aronson, P. G. McKeown and D. Drinka, “A Tabu Search Heuristic Procedure for the Fixed Charge Transportation Problem”, *European Journal of Operational Research*, Vol. 106, No. 2–3, pp. 441–456, 1998.
- Sun, M. and P. G. McKeown, “Tabu Search Applied to the General Fixed Charge Problem”, *Annals of Operations Research*, Vol. 41, pp. 405–420, 1993.
- Sun, M. and H. Nemati, “TABU MACHINE: A New Neural Network Solution Approach for Combinatorial Optimization Problems”, *Journal of Heuristics*, Vol. 9, No. 1, pp. 5–27, 2003.
- Sun, Y., R. Qiu and M. Sun, “Optimizing Decisions for a Dual-channel Retailer with Service Level Requirements and Demand Uncertainties: A Wasserstein Metric-based Distributionally Robust Optimization Approach”, *Computers & Operations Research*. Vol. 138, Article 105589, 2022.
<https://www.sciencedirect.com/science/article/pii/S0305054821003142?via%3Dihub>.
- Sun, Y., R. Qiu and M. Sun, “A Robust Optimization Approach for Inventory Management with Limited-time Discounts and Service-level Requirement under Demand Uncertainty”, *International Journal of Production Economics*. Vol. 267, Article 109096, 2024. <https://doi.org/10.1016/j.ijpe.2023.109096>.
- Sun, M., A. Stam and R. E. Steuer, “Solving Multiple Objective Programming Problems Using Feed-Forward Artificial Neural Networks: The Interactive FFANN Procedure”, *Management Science*, Vol. 42, No. 6, pp. 835–849, 1996.
- Sun, M., A. Stam and R. E. Steuer, “Interactive Multiple Objective Programming Using Tchebycheff Programs and Artificial Neural Networks”, *Computers & Operations Research*, Vol. 27, No. 7–8, pp. 601–620, 2000.
- Sun, M. and R. E. Steuer, “InterQuad: An Interactive Quad Tree Based Procedure for Solving the Discrete Alternative Multiple Criteria Problem”, *European Journal of Operational Research*, Vol. 89, No. 3, pp. 462–472, 1996.
- Sun, M. and R. E. Steuer, “Quad Trees and Linear List for Identifying Nondominated Criterion Vectors”, *INFORMS Journal on Computing*, Vol. 8, No. 4, pp. 367–375, 1996.
- Sun, M. and M. Xiong, “A Mathematical Programming Approach for Gene Selection and Tissue Classification”, *Bioinformatics*, Vol. 19, No. 10, pp. 1243–1251, 2003.
- Tian, X., X. Liu, H. Zhang, M. Sun and Y. Zhao, “A DNA Algorithm for the Job Shop Scheduling Problem Based on the Adleman-Lipton model”, *PLOS One*, Vol. 15, No. 12, e0242083, 2020.
<https://doi.org/10.1371/journal.pone.0242083>.
- Wang, L., X. Liu, M. Sun and J. Qu, “An Extended Clustering Membrane System based on Particle Swarm Optimization and Cell-like P System with Active Membranes”, *Mathematical Problems in Engineering*, Vol. 2020, Article 5097589, 18 pages, 2020. <https://doi.org/10.1155/2020/5097589>.
- Wang, L., X. Liu, M. Sun, J. Qu and Y. Wei, “A New Chaotic Starling Particle Swarm Optimization Algorithm for Clustering Problems”, *Mathematical Problems in Engineering*, Vol. 2018, Article 8250480, 14 pages, 2018.
<https://doi.org/10.1155/2018/8250480>.
- Wang, L., X. Liu, M. Sun and Y. Zhao, “Evolution-Communication Spiking Neural P Systems with Energy Request Rules”, *Neural Networks*. Vol. 164, pp. 476–488, 2023. <https://doi.org/10.1016/j.neunet.2023.05.007>.

- Wang, Q., F. Qi, M. Sun, J. Qu and J. Xue, “Identification of Tomato Disease Types and Detection of Infected Areas Based on Deep Convolutional Neural Networks and Object Detection Techniques”, *Computational Intelligence and Neuroscience*, Volume 2019, Article 9142753, 15 pages, 2019. <https://doi.org/10.1155/2019/9142753>.
- Xin, B. and M. Sun “A Differential Oligopoly Game for Optimal Production Planning and Water Saving”, *European Journal of Operational Research*, Vol. 269, No. 1, pp. 206–217, 2018. <https://linkinghub.elsevier.com/retrieve/pii/S0893608023002381>.
- Xin, B., W. Peng and M. Sun, “Optimal Coordination Strategy for International Production Planning and Pollution Abating under Cap-and-Trade Regulations”, *International Journal of Environmental Research and Public Health*, Vol. 16, No. 18, article 3490, 21 pages, 2019. <https://www.mdpi.com/1660-4601/16/18/3490/html>.
- Xin, C., C. Zheng, M. Sun, “Environmental Innovation Ambidexterity and Customer Relationship Performance: Evidence from the Manufacturing Industry in China”, *Environmental Science and Pollution Research*. Vol. 29, No. 40, pp. 60998–61011, 2022. <https://doi.org/10.1007/s11356-022-20284-0>.
- Xin, C., Y. Zhou, M. Sun and X. Chen, “Strategic Inventory and Dynamic Pricing for a Two-Echelon Green Product Supply Chain”, *Journal of Cleaner Production*. Volume 363, Article 132422, 2022. <https://doi.org/10.1016/j.jclepro.2022.132422>.
- Yin, X. X. Liu, M. Sun and Q. Ren, “Novel Numerical Spiking Neural P Systems with a Variable Consumption Strategy”, *Processes*, Vol. 9, No. 3, Article 549, 2021. <https://doi.org/10.3390/pr9030549>.
- Yin, X., X. Liu, M. Sun, J., Dong and G. Zhang, “Fuzzy Reasoning Numerical Spiking Neural P Systems for Induction Motor Fault Diagnosis”, *Entropy*, Vol. 24 No. 10, Article 1385, 2022. <https://doi.org/10.3390/e24101385>.
- Yu, Y., R. Qiu and M. Sun, “Joint Pricing and Ordering Decisions for a Loss-Averse Retailer with Quantity-Oriented Reference Point Effect and Demand Uncertainty: A Distribution-free Approach”, *Kybernetes*. Vol. 52, No. 4, pp. 1294–1324, 2023. <https://doi.org/10.1108/K-06-2021-0436>.
- Zang, W. and M. Sun, “Searching Parameter Values in Support Vector Machines Using DNA Genetic Algorithms”, *Lecture Notes in Computer Science*, Vol. 9567, pp. 588–598, 2016.
- Zang, W., M. Sun and Z. Jiang, “A DNA Genetic Algorithm Inspired by Biological Membrane Structure”, *Journal of Computational and Theoretical Nanoscience*, Vol. 13, No. 6, pp. 3763–3772, 2016.
- Zang, W., W. Zhang, Z. Wang, D. Jiang, X. Liu and M. Sun, “A Novel Double-Strand DNA Genetic Algorithm for Multi-Objective Optimization”, *IEEE Access*, Vol. 7, pp. 18821–18839, 2019. <https://ieeexplore.ieee.org/stamp/stamp.jsp?tp=&arnumber=8625539>.
- Zhang, M., Y. Gao, M. Sun and D. Bi, “Influential Factors and the Realization Mechanism of Sustainable Information Sharing in Virtual Communities from a Knowledge Fermenting Perspective”, *Sage Open*, Vol. 10, No. 4, pp. 1–16, 2020. <https://doi.org/10.1177/2158244020974002>.
- Zhang, M., M. Sun, D. Bi and T. Liu, “Green Logistics Development Decision-making: Factor Identification and Hierarchical Framework Construction,” *IEEE Access*, Vol. 8, pp. 127897–127912, 2020. <https://ieeexplore.ieee.org/document/9138533>.
- Zhao, J., Z., Jiang and M. Sun, “A Review on the Gray Market Business Using a Data-driven Approach”, *Data Science and Management*, Vol. 1, No. 1, pp. 38–47, 2021. <https://www.sciencedirect.com/science/article/pii/S2666764921000047>.
- Zhao, Y., Y. Liu, X. Liu, M. Sun, F. Qi and Y. Zhang, “Self-Adapting Spiking Neural P Systems with Refractory Period and Propagation Delay”, *Information Sciences*. Vol. 589, pp. 80–93, 2022. <https://doi.org/10.1016/j.ins.2021.12.107>.
- Zhao, Y., X. Liu, M. Sun, J. Qu and Y. Zheng, “Time-Free Cell-Like P Systems with Multiple Promoters/Inhibitors”, *Theoretical Computer Science*, Vol. 843, No. 2, pp. 73–83, 2020. <https://doi.org/10.1016/j.tcs.2020.07.018>.
- Zhao, Y., W. Zhang, M. Sun and X. Liu, “An Improved Consensus Clustering Algorithm Based on Cell-Like P Systems with Multi-Catalysts,” *IEEE Access*, Vol. 8, pp. 154502–154517, 2020. <https://ieeexplore.ieee.org/document/9144575>.

Textbook:

Sun, M., Teaching Notes for MS 3053: Management Science and Operations Technology. Cengage Learning, Boston, MA, 2021. ISBN: 978-0-357-75929-5.

Book Chapters:

Beebe, N., L. Liu and M. Sun, “Data Type Classification: Hierarchical Class-to-Type Modeling”, in G. Perterson and S. Sheno (eds), *Advances in Digital Forensics XII*, Vol. 484, pp. 325–343. Springer, 2016.

Drinka, D. and M. Sun, “A Human Resource Planning Multiple Objective Embedded Network Model and its Tchebycheff Method Implementation”, in J. Gu, G. Chen, Q. Wei and S. Wang (eds.), *Multiple Criteria Decision Making, Theory and Applications*, pp. 177–184, SCI-TECH Information Service, Vindsor, Berks, U.K., 1995.

Guan, Z., J. Tao and M. Sun, “Integrated Optimization of Resilient Supply Chain Network Design and Operations under Disruption Risks”, in J. Khojasteh, H. Xu and S. Zolfaghari (eds.), *Supply Chain Risk Mitigation: Strategies, Methods and Applications*. pp. 205–238, Springer, New York, NY, 2022.
<https://link.springer.com/content/pdf/10.1007/978-3-031-09183-4.pdf>.

Leung, M., S. Pan and M. Sun, “A Review of Data Analytic Methods and Their Applications in E-Commerce Research” in C. Mazzanti (ed.), *Electronic Commerce: Technologies, Challenges and Future Prospects*, pp. 1–79, Nova Science Publishers, Hauppauge, NY, 2017.

Stam, A., M. Sun and M. Haines, “Feed-Forward Neural Networks for Approximating Pairwise Preference Structures,” in G. Fandel and T. Gal (Eds.), *Multiple Criteria Decision Making, Lecture Notes in Economics and Mathematical Systems*, Vol. 448, pp. 413–420, Springer-Verlag, New York, NY, 1997.

Sun, M., “A Tabu Search Heuristic Procedure for the Uncapacitated Facility Location Problem”, in C. Rego and B. Alidaee (eds.), *Metaheuristic Optimization via Memory and Evolution: Tabu Search and Scatter Search*, Kluwer Academic Publishers, Boston, MA, pp. 191–211, 2005.

Sun, M., “z -Distribution”, in Salkind, N. J. (ed.), *Encyclopedia of Research Design*, Sage Publications, Inc., Thousand Oaks, CA, Vol. 3, pp. 1653–1657, 2010.

Sun, M., “z -Score”, in Salkind, N. J. (ed.), *Encyclopedia of Research Design*, Sage Publications, Inc., Thousand Oaks, CA, Vol. 3, pp. 1662–1667, 2010.

Sun, M., “z -Test”, in Salkind, N. J. (ed.), *Encyclopedia of Research Design*, Sage Publications, Inc., Thousand Oaks, CA, Vol. 3, pp. 1667–1674, 2010.

Sun, M., “Mathematical Programming Models for Classification”, in Wang, J. (ed.), *Encyclopedia of Business Analytics and Optimization*, IGI Global, Hershey, PA, Vol. 3, Ch. 136, pp. 1503–1516, 2014.

Sun, M., “Multiple Objective Programming”, in Wang, J. (ed.), *Encyclopedia of Business Analytics and Optimization*, IGI Global, Hershey, PA, Vol. 3, Ch. 143, pp. 1585–1604, 2014.

Sun, M., “Support Vector Machine Models for Classification”, in Wang, J. (ed.), *Encyclopedia of Business Analytics and Optimization*, IGI Global, Hershey, PA, Vol. 5, Ch. 215, pp. 2395–2409, 2014.

Sun, M. and R. E. Steuer, “Quad Tree Data Structures for Use in Large-Scale Discrete Alternative Multiple Criteria Problems,” in Shi, Y. and M. Zeleny (eds.), *New Frontiers of Decision Making for the Information Technology Era*, World Scientific Publishing Co., River Edge, NJ, pp. 48–71, 2000.

Conference Proceedings:

Agrell, P. J., M. Sun and A. Stam, “A Tabu Search Multi-Criteria Decision Model for Facility Location Planning”, *Proceedings of the 1997 DSI Annual Meeting*, San Diego, California, Vol. 2, pp. 908–910, 1997.

Ahmadi, E., R. Maihmi, M. Sun, D. Masel and C. Cagle, “Periodic Review Multi-Period Inventory Control Models for Perishable Pharmaceutical Products in Hospitals”, in Ellis, K., Ferrell, W. and Knapp, K. (eds.), *Proceedings of the IISE Annual Conference & Expo 2022*. Vol. 1, pp. 199–205, 2022.

- Chen, Z.-Y., Z.-P. Fan and M. Sun, “A SVM Ensemble Learning Method Using Tensor Data: An Application to Cross Selling Recommendation”, 12th International Conference on Service Systems and Service Management (ICSSSM’15), DOI: 10.1109/ICSSSM.2015.7170282, 2015.
- Hao, J., J. Yin and M. Sun, “Convergence to IFRS, Accounting Quality, and Role of Regional Institutions--Evidence from China”. American Accounting Association International Section Mid-Year Meeting, http://www.af.polyu.edu.hk/files/jiar2014/cc070%20HSY112013_final.pdf, 2014.
- Hassanzadeh, F., H. Nemati and M. Sun, “Robust Optimization for Multiobjective Programming Problems with Imprecise Information”, *Procedia Computer Science*, Vol. 17, pp. 357–364, 2013.
- Nemati, H., M. B. Montaner and M. Sun, “A Multi-Agent Framework for Web Based Information Retrieval and Filtering”, *Proceedings of the 2000 Americas Conference on Information Systems (AMCIS 2000)*, pp. 308–310, 2000.
- Rosales, R., M. T. Leung and M. Sun, “An Intelligent Decision Support System for Adaptive Prediction of Student Attrition”, *Proceedings of the 2015 DSI Annual Meeting*, pp. 2045–2054, 2015, available at <http://www.decisionsciences.org/Portals/16/Proceedings/AM-2015/files/p1043740.pdf>.
- Stam, A., M. Sun and M. Haines, “Feed-Forward Neural Networks for Approximating Pairwise Preference Structures”, In: Fandel G., Gal T. (eds), *Multiple Criteria Decision Making. Lecture Notes in Economics and Mathematical Systems*, Vol 448. Springer, Berlin, Heidelberg, pp. 423-420, 1997.
- Stummer, C., M. Sun, “A Tabu Search Heuristic for R&D Project Portfolio Selection”, *Proceedings of the 6th Metaheuristics International Conference*, Vienna, Austria, pp. 847–852, 2005.
- Sun, M., “The AHP, Principal Eigenvectors and the Hopfield Neural Network”, *Proceedings of the 1993 DSI Annual Meeting*, Vol. 2, pp. 1024–1026, 1993.
- Sun, M., “Applying Tabu Search to Multiple Objective Combinatorial Optimization Problems”, *Proceedings of the 1997 DSI Annual Meeting*, San Diego, California, Vol. 2, pp. 945–947, 1997.
- Sun, M., “Determining Faculty Salary Equity Adjustments: A Multiple Objective Programming Approach”, *Proceedings of the 1999 DSI Annual Meeting*, New Orleans, Louisiana, Vol. 2, pp. 891–893, 1999.
- Sun, M., “Discrete Multiple Criteria Optimization via a Primogenitary Linked Quad Tree Data Structure”, *Proceedings of the 2001 DSI Annual Meeting*, San Francisco, California, pp. 1034–1036, 2001.
- Sun, M., “An Improved Tabu Search Heuristic Procedure for the Capacitated Facility Location Problem”, *Proceedings of the 2009 DSI Annual Meeting*, New Orleans, Louisiana, pp. 1461–1466, 2009.
- Sun, M., “Finding Integer Efficient Solutions in Multiple Objective Network Flow Problems with a Branch-and-Bound Algorithm”, *Proceedings of the 2010 DSI Annual Meeting*, San Diego, California, pp. 321–326, 2010.
- Sun, M., “A MIP Model for Feature Selection in Multiple-Class Classification”, *Proceedings of the 8th International Conference on Fuzzy Systems and Knowledge Discovery*, Shanghai, China, pp. 998–1002, 2011.
- Sun, M., “A Tabu Search Procedure for Variable Selection in Classification in a Mixed Integer Programming Model”, *Proceedings of the International Conference in Management Sciences and Decision Making*, Tamkang University, New Taipei, Taiwan, 2012.
- Sun, M., Z.-Y. Chen and Z.-P. Fan, “A Multi-task Multi-kernel Transfer Learning Method for Customer Response Modeling in Social Media”, *Procedia Computer Science*, Vol. 31, 221–230, 2014.
- Sun, M., D. Drinka and J. E. Aronson, “Implementation Data Structures for a Tabu Search Heuristic Procedure for Solving the Fixed Charge Transportation Problem”, *Proceedings of the 1995 DSI Annual Meeting*, Vol. 2, pp. 915–917, 1995.
- Sun, M., E. A. Ducati and V. A. Armentano, “Solving Capacitated Facility Location Problem Using Tabu Search”, in Zhang, J., W. Zhang, X. Xia and J. Liao (eds), *Globalization Challenge and Management Transformation, Proceedings of ICM’2007*, Science Press, Beijing, China, Vol. 1, pp. 76–81, 2007.
- Sun, M. and R. G. Graham, “An Empirical Analysis of Project Management in Selected Areas in PRC”, *Proceedings of the Chinese Style Business Administration Seminar*, Hong Kong, 1986.

Sun, M. and R. E. Steuer, “Quad Tree Data Structures for Discrete Multiple Criteria Optimization”, *Proceedings of the 2000 DSI Annual Meeting*, Vol. 2, pp. 905–907, 2000.

Paper Presentations

- Agrell, P. J. and M. Sun, “Multi-Criteria Facility Location Planning Using Tabu Search”, presented at the 2nd Operations Research Conference in Habana, Cuba, March 1997.
- Agrell, P. J., M. Sun and A. Stam, “A Tabu Search Multi-Criteria Decision Model for Facility Location Planning”, presented at the 28th Annual Conference of the Decision Sciences Institute, San Diego, CA., Nov. 22–25, 1997.
- Bafahm, A. and M. Sun, “An Examination of Some Unexpected Results in AHP”, presented at the 2016 International Conference in Management Sciences and Decision Making, Tamkang University, New Taipei, Taiwan, May 14, 2016.
- Bafahm, A. and M. Sun, “Some Conflicting Results in the Analytical Hierarchy Process”, presented at the 48th Annual Conference of the Decision Sciences Institute, Washington DC, Nov. 18-20, 2017.
- Beebe, N., L. Liu and M. Sun, “Data Type Classification, Hierarchical Class-to-Type Classification”, presented at the Twelfth Annual IFIP WG 11.9 International Conference on Digital Forensics, New Delhi, India, January 4–6, 2016
- Chen, Z. -Y., Z. -P. Fan and M. Sun, “Ensemble Learning for Cross-Selling Using Multitype Multiway Data”, keynote speech presented at the First International Conference on Data Science, Beijing, P. R. China, May 27–28, 2014.
- Chen, Z.-Y., Z.-P. Fan and M. Sun, “A SVM Ensemble Learning Method Using Tensor Data: An Application to Cross Selling Recommendation”, presented at the 12th International Conference on Service Systems and Service Management (ICSSM’15), Guangzhou, Guangdong, P. R. China, June 22–24, 2015.
- Drinka, D. and M. Sun, “Tabu Search Applied to the Transportation Problem with Incremental Quantity-Discounted Costs”, presented at the TIMS/ORSA Joint National Meeting, Chicago, IL., May 16–19, 1993 (Contributed).
- Drinka, D. and M. Sun, “A Solution Approach for Network Models with Multiple Objectives”, presented at the TIMS/ORSA Joint National Meeting, Boston, April 24–27, 1994 (Contributed).
- Drinka, D. and M. Sun, “Application of an Interactive Multiple Objective Solution Approach to 2-Dimensional Data Adjustment Problems”, presented at the INFORMS National Meeting, Los Angeles, CA., April 23–26, 1995 (Contributed).
- Drinka, D. and M. Sun, “A Human Resource Planning Multiple Objective Embedded Network Model and its Tchebycheff Method Implementation”, presented at the Sixth National Conference on Multiple Criteria Decision Making, Beijing, P. R. China, August 14–15, 1995.
- Graham, R. G. and M. Sun, “A Comparative Analysis of Project Management in Hong Kong and Shenyang”, presented at the Pan-Pacific Conference VII in Seoul Korea, June 1990.
- Graham, R. G. and M. Sun, “A Comparative Analysis of Project Management in Hong Kong, Shenyang and Portland Oregon USA”, presented at Asian Institute of Business Conference Hong Kong, June 1990.
- Guan, Z., J. Tao, H. Wu and M. Sun, “An Optimization Approach for Integrated Resilient Supply Chain Network Design and Operations under Disruption Risks”, presented at POMS 2017, the 28th Annual Meeting of the Production Operations Management Society, Seattle, WA, May 5–8, 2017.
- Guan, Z., J. Tao, H. Wu and M. Sun, “Supply Chain Network Optimization under Risk Considerations Using Sample Average Approximation”, presented at the International Conference in Management Sciences and Decision Making, Tamkang University, New Taipei, Taiwan, May 19, 2018.
- Hao, J., J. Yin and M. Sun, “Convergence to IFRS, Accounting Quality, and Role of Regional Institutions--Evidence from China”, presented at American Accounting Association International Section Mid-Year Meeting, San Antonio, Texas, February 20–22, 2014.

- Hao, M., M. Sun and J. Yin, “Convergence to IFRS, Accounting Quality, and the Role of Regional Institutions: Evidence from China” *Asian Review of Accounting* International Accounting Symposium, Hangzhou, China, June 23, 2017.
- Hassanzadeh, F., H. Nemati and M. Sun, “Robust Optimization for Multiobjective Programming Problems with Imprecise Information”, presented at the First International Conference on Information Technology and Quantitative Management (ITQM 2013), Suzhou, P. R. China, May 16–18, 2013.
- Lutz, C. M., K. R. Davis and M. Sun, “Applying Tabu Search to Estimate the Optimal Buffer Location and Size in Production Lines”, presented at the DSI 25th Annual Meeting, Honolulu, Hawaii, November 20–22, 1994.
- Ji, S-F, J.-H. Tang, M. Sun, “Multiobjective Optimization for a Combined Location-Routing-Inventory System Considering Carbon-Capped Differences”, presented at the 48th Annual Conference of the Decision Sciences Institute, Washington, D. C., Nov. 18–21, 2017.
- Ji, S-F, J.-H. Tang, M. Sun, “A Bi-objective Model and a Solution Procedure for a Combined Location-Routing-Inventory Problem Considering Carbon-Capped Differences”, presented at the POMS 2018, the 29th Annual Meeting of the Production Operations Management Society, Houston, TX, May 4–7, 2018.
- Marlin, D., M. Sun and J. W. Huonker, “Strategic Groups and Performance in the Nursing Home Industry: A Reexamination”, presented at the Southern Management Association Annual Conference, New Orleans, November 4–7, 1998.
- Nemati, H. R. and M. Sun, “A Neural Network Tabu Machine for the Travelling Salesman Problem”, presented at the TIMS/ORSA Joint National Meeting, Detroit, October 23–26, 1994 (Invited).
- Qiu, R., Y. Sun and M. Sun, “An Affinely Adjustable Robust Optimization Approach for a Multi-Period Inventory Model with Capital Constraint under Demand Uncertainty”, presented at the 50th Annual Conference of the Decision Sciences Institute, New Orleans, LA, Nov. 22–25, 2019.
- Stam, A., M. Sun and R. E. Steuer, “Solving Multiobjective Programming Problems Through a Feed-Forward Artificial Neural Network”, Proceedings of the First University of Kansas Business PhD Alumni Workshop, Lawrence, Kansas, May 1993.
- Stam, A., M. Sun and M. Haines, “Artificial Neural Network Representations for Hierarchical Preference Structures”, presented at the XIIth International Conference on Multiple Criteria Decision Making: Twenty Years of East-West Cooperation in MCDM, Hagen, Germany, June 1995.
- Stam, A. and M. Sun, “Neural Network Representations of Pairwise Preference Structures”, presented at the TIMS XXXIII International Conference, Singapore, June 18–23, 1995 (Invited).
- Stam, A. and M. Sun, “Artificial Neural Network Representations for Preference Judgment in the AHP”, presented at the College of Business Faculty Forum, UTSA, March 8, 1995.
- Stam, A., M. Sun and R. E. Steuer, “Solving Multiple Objective Programming Problems Using Feed-Forward Artificial Neural Networks: The Interactive FFANN Procedure”, presented as a Guest Seminar at the Helsinki School of Economics, Helsinki, Finland, November 1994; also presented at the Helsinki University of Technology, Espoo, Finland, November 1994; at the Faculty of Mathematics and Computing Science, Technical University of Eindhoven, The Netherlands, April 1995; at the Faculty of Technical Mathematics and Informatics, Delft University of Technology, The Netherlands, April 1995; at the Department of Business Informatics, Rotterdam School of Management, Erasmus University, The Netherlands, April 1995; at the RWTH Aachen Institute of Technology, Germany, May 1995; at the Department of Economics, University of Siegen, Germany, May 1995; at the Faculty of Economics and Statistics, University of Konstanz, Germany, May 1995.
- Stummer, C., M. Sun, “A Tabu Search heuristic for R&D project portfolio selection”, presented at the 6th Metaheuristics International Conference, Vienna, Austria, August 22–26, 2005.
- Sun, K., A. Roy, M. Sun, R. W. Dravenstott and F. A. Rosinia, “Optimal and Equitable Staffing Solutions for Anesthesiologist Scheduling”, presented at the INFORMS National Meeting, Online/Anaheim, CA, October 24–27, 2021.

- Sun, M., “Sobol's Parameter Space Investigation Method for MOP Problems: A Computational Investigation”, presented at the College of Business Faculty Forum, UTSA, November 20, 1992.
- Sun, M., “An Interactive Adaptive Random Search Procedure for Nonlinear Multiple Objective Programming Problems”, presented at the College of Business Faculty Forum, UTSA, March 31, 1993.
- Sun, M., “An Interactive Multiple Objective Programming Procedure Using Tchebycheff Program and an Artificial Neural Network”, presented at the College of Business Faculty Forum, UTSA, December 3, 1993.
- Sun, M., “An Interactive Tchebycheff - Feed-Forward Artificial Neural Network Multiple Objective Programming Procedure”, presented at the TIMS/ORSA Joint National Meeting, Boston, April 24–27, 1994 (Invited).
- Sun, M., “Tabu Machine - A New Artificial Neural Network Optimization Approach”, presented at the College of Business Faculty Forum, UTSA, April 29, 1994.
- Sun, M., “An Interactive Discrete Multiple Objective Programming Procedure via a Quad Tree Data Structure”, presented at the First Conference on Management Science for Domestic and Overseas Young Scientists (CMSDOYS'94), Beijing, China, July 19–22, 1994 (Invited).
- Sun, M., “History and Progress of Multiple Objective Programming”, presented to the faculty and graduate students in the College of Business, Northeastern University, Shenyang, China, July 13, 1994.
- Sun, M., “A Tabu Search Heuristic Procedure for the Fixed Charge Transportation Problem”, presented at the INFORMS National Meeting, New Orleans, October 29–November 1, 1995 (Invited).
- Sun, M., “Solving Combinatorial Optimization Problems with Tabu Machines”, presented at the College of Business Faculty Forum, UTSA, April 24, 1996.
- Sun, M., “A Tabu Search Heuristic Procedure for Solving the Transportation Problem with Exclusionary Side Constraints”, presented at the College of Business Faculty Forum, UTSA, October 23, 1996.
- Sun, M., “Applying Tabu Search to the Fixed Charge Transportation Problem (Some Computational Results)”, presented at the INFORMS National Meeting, San Diego, CA, May 4–7, 1997 (Invited).
- Sun, M., “A Tabu Search Heuristic Procedure for Solving the Transportation Problem with Exclusionary Side Constraints”, presented at the INFORMS National Meeting, San Diego, CA, May 4–7, 1997 (Invited).
- Sun, M., “Applying Tabu Search to Multiple Objective Combinatorial Optimization Problems”, presented at the 28th Annual Conference of the Decision Sciences Institute, San Diego, CA, Nov. 22–25, 1997.
- Sun, M., “A Multiple Objective Network Programming Solution Procedure”, presented at the INFORMS National Meeting, Seattle, October 25–28, 1998 (Invited).
- Sun, M., “Finding Nondominated Solutions for Multiple Objective Network Problems”, presented at IFORS'99, Beijing, P. R. C., August 16–20, 1999 (Contributed).
- Sun, M., “Warm-Start Routines for Solving Multiple Objective Network Programming Problems”, presented at the College of Business Faculty Forum, UTSA, October 6, 1999.
- Sun, M., “Determining Faculty Salary Equity Adjustments: A Multiple Objective Programming Approach”, presented at the 30th Annual Conference of the Decision Sciences Institute, New Orleans, LA, Nov. 20–23, 1999.
- Sun, M., “The Transportation Problem with Exclusionary Side Constraints and Some Solution Methods”, presented at POMS 2000, the 11th Annual Meeting of the Production Operations Management Society, San Antonio, TX, April 1–4, 2000.
- Sun, M., “Finding Integer Efficient Solutions for Multiple Objective Network Programming Problems”, presented at INFORMS National Meeting, San Antonio, Texas, November 5–8, 2000 (Invited).
- Sun, M., “Branch & Bound Algorithms for the Transportation Problem with Exclusionary Side Constraints”, presented at INFORMS National Meeting, San Antonio, Texas, November 5–8, 2000 (Invited).

- Sun, M., “A Tabu Search Heuristic Solution Procedure for Uncapacitated Facility Location Problems”, presented at the Departmental Colloquium, Department of Mathematics, Trinity University, San Antonio, TX, March 6, 2001.
- Sun, M., “A Tabu Search Heuristic Procedure for Solving Uncapacitated Facility Location Problems”, presented at the International Conference on Adaptive Memory and Evolution: Tabu Search and Scatter Search, Oxford, MS, March 7–11, 2001.
- Sun, M., “Multiple-Group Discriminant and Classification Analysis with Linear Programming Approaches”, presented at the 34th Annual Conference of the Decision Sciences Institute, Washington D.C., Nov. 22–25, 2003.
- Sun, M., “Linear Programming Approaches for Multiple-Class Discriminant and Classification Analysis”, presented at the Research Colloquium of The Department of Management Science and Statistics, College of Business, The University of Texas at San Antonio, September 16, 2005.
- Sun, M., “A Support Vector Machine for Multiple-Class Classification”, presented at the Research Colloquium of The Department of Management Science and Statistics, College of Business, The University of Texas at San Antonio, September 27, 2006.
- Sun, M., “A Multiple-Class Support Vector Machine, Theory and Model”, presented at the 37th Annual Conference of the Decision Sciences Institute, San Antonio, TX, Nov. 18–21, 2006.
- Sun, M., “Using a Primogenitary Linked Quad Tree for Solution Storage and Retrieval in Heuristic Binary Optimization,” presented at the 39th Annual Conference of the Decision Sciences Institute, Baltimore, MD, Nov. 22–25, 2008.
- Sun, M., “Using a Primogenitary Linked Quad Tree for Solution Storage and Retrieval in Heuristic Binary Optimization,” presented at the Seminar of The Department of Management Science and Statistics, College of Business, The University of Texas at San Antonio, October 3, 2008.
- Sun, M., “An Improved Tabu Search Heuristic Procedure for the Capacitated Facility Location Problem”, presented at the 40th Annual Conference of the Decision Sciences Institute, New Orleans, LA, Nov. 14–17, 2009.
- Sun, M., “A MIP Model for Feature Selection in Multiple-Class Classification”, presented at the 7th International Conference on Natural Computation and the 8th International Conference on Fuzzy Systems and Knowledge Discovery, Shanghai, China, July 26–28, 2011.
- Sun, M., “A mixed Integer Programming Model for Feature Selection in Multiple-class Classification”, presented at National Taiwan University, Taipei, Taiwan, May 17, 2012, also presented at East China University of Science and Technology, Shanghai, China, May 30, 2012.
- Sun, M., “A Support Vector Machine for Multiple-class Classification”, presented at Yuan Ze University, Taoyuan, Taiwan, May 18, 2012.
- Sun, M., “A Tabu Search Procedure for Variable Selection in Classification in a Mixed Integer Programming Model”, presented at the International Conference in Management Sciences and Decision Making, Tamkang University, New Taipei, Taiwan, May 19, 2012.
- Sun, M., “An Overview on MCDM and Its Applications”, presented at Tamkang University, New Taipei, Taiwan, May 20, 2012, also presented at Northeastern University, Shenyang, Liaoning, China, May 28, 2012.
- Sun, M., “Writing Technical Articles in English”, presented at Northeastern University, Shenyang, Liaoning, China, May 24, 2012.
- Sun, M., “Research Topic Selection and Refinement”, presented at Northeastern University, Shenyang, Liaoning, December 25, 2012.
- Sun, M., “Choosing a Journal for Publication”, presented at Northeastern University, Shenyang, Liaoning, China, December 27, 2012.
- Sun, M., “Some Case Studies of Research Topics and Journal Articles”, presented at Northeastern University, Shenyang, Liaoning, China, December 30, 2012.

- Sun, M., “A Multi-Class Support Vector Machine: Theory and Model,” presented at the International Seminar on Information Technology and Management Science, School of Management, University of the Chinese Academy of Sciences, Beijing, P. R. China, May 14, 2013.
- Sun, M. and P. J. Agrell, “A Tabu Search Solution Procedure for a Multiple Criteria Facility Location Problem”, presented at the INFORMS National Meeting, Seattle, October 25–28, 1998 (Invited).
- Sun, M., J. E. Aronson and P. G. McKeown, “Solving Fixed Charge Transportation Problems Using Tabu Search”, presented at the ORSA/TIMS Joint National Meeting, San Francisco, CA, November 1–4, 1992 (Invited).
- Sun, M., D. Drinka and J. E. Aronson, “Implementation Data Structures for a Tabu Search Heuristic Procedure for Solving the Fixed Charge Transportation Problem”, presented at the 26th Annual Conference of the Decision Sciences Institute, Boston, MA, Nov. 20–22, 1995.
- Sun, M., E. A. Ducati and V. A. Armentano, “Solving Capacitated Facility Location Problem Using Tabu Search”, presented at ICM’2007, The 6th International Conference on Management, Wuhan, P. R. China, August 3–5, 2007.
- Sun, M. and L. R. Gardiner, “Some Issues in the Computational Testing of Interactive Multiple Objective Programming Procedures”, presented at the XIIth International Conference on Multiple Criteria Decision Making: Twenty Years of East-West Cooperation in MCDM, Hagen, Germany, June 18–23, 1995.
- Sun, M. and L. R. Gardiner, “Caveats in Interpreting Computational Results of Interactive Multiple Objective Programming procedures”, presented at the INFORMS National Meeting, New Orleans, October 29–November 1, 1995 (Invited).
- Sun, M., Y. Guo and C. Bai, “Green Supplier Integration Strategies and Green Supplier Development Decisions in Competing Supply Chains”, presented at the 53rd Annual Conference of the Decision Sciences Institute, Houston, TX, November 19–21, 2022.
- Sun, M. and R. G. Graham, “An Empirical Analysis of Differences Between Project Management in Hong Kong and in Areas of PRC”, presented at the Economics & Management Sino-American Seminar, Beijing, China, 1987.
- Sun, M. and P. G. McKeown, “Tabu Search Applied to the General Fixed Charge Problem”, presented at the Southeastern TIMS 27th Annual Meeting, Myrtle Beach, SC., October 3–4, 1991.
- Sun, M. and H. Nemati, “TABU MACHINE: A New Method of Solving Combinatorial Optimization Problems”, presented at the TIMS/ORSA Joint National Meeting, Boston, April 24–27, 1994 (Invited).
- Sun, M., R. Qiu and C. Li., “Pricing Policies in a Dual-channel Supply Chain Considering Virtual Showrooming”, presented at the 53rd Annual Conference of the Decision Sciences Institute, Houston, TX, November 19–21, 2022.
- Sun, M., A. Stam and R. E. Steuer, “Solving Multiple Objective Programming Problems with a Feed-Forward Artificial Neural Network”, presented at the TIMS/ORSA Joint National Meeting, Orlando, FL., April 26–29, 1992 (Invited); also presented in Seminar Series of the Center for Interdisciplinary Business Research (CIBRE), Katholieke Universiteit Leuven, Belgium, November 1992; and as an MDA Guest Seminar at IIASA, Laxenburg, Austria, July 1993.
- Sun, M. and R. E. Steuer, “Rolling Ball Method for Complicated Nonlinear Multiple Objective Programming Problems”, presented at the TIMS/ORSA Joint National Meeting, Chicago, IL., May 16–19, 1993 (Invited).
- Sun, M. and R. E. Steuer, “Quad Tree Data Structures for Discrete Multiple Criteria Optimization”, presented at the 2000 DSI Annual Meeting, Orlando, Florida, November 18–21, 2000.
- Sun, M. and M. Xiong, “A Mathematical Programming Approach for Gene Selection and Tumor Classification”, presented at the 52nd Annual Meeting of the American Society of Human Genetics, Baltimore, Maryland, October 15–19, 2002.
- Sun, M., W. Zang, W. Zhang, Z. Wang, D. Jiang and X. Liu, “A Double-Strand DNA Genetic Algorithm for Multi-objective Optimization”, presented at the 49th Annual Conference of the Decision Sciences Institute, Chicago, IL, November 17–19, 2018.

- Xiong, M. and M. Sun, “A Multiple Criteria Optimization Approach for Tumor Classification”, presented at the INFORMS National Meeting, Miami Beach, November 4–7, 2001.
- Zang, W. and M. Sun. “Searching Parameter Values in Support Vector Machines Using DNA Genetic Algorithms”. International Conference on Human-Centered Computing (HCC2016), Colombo, Sri Lanka, January 7–9, 2016.
- Zang, W., M. Sun and Z. Jiang. “A DNA Genetic Algorithm Inspired by Biological Membrane Structure”, Asian Conference on Membrane Computing (ACMC2015), Anhui University, Hefei, Anhui, China, November 12–15, 2015.

Non-refereed Publications

Monograph:

- Zalay, M., A. Inn, M. Sun and I. Chou, American and Chinese Perception and Belief System, Institute of Comparative Social and Cultural Studies Inc., Washington, D. C., 1986.

Working Papers:

- Chen, Z.-Y., Z.-P. Fan and M. Sun, “A Hierarchical Multiple Kernel Support Vector Machine for Customer Churn Prediction Using Longitudinal Behavioral Data”, Working Paper Series No. 0038MSS-061-2012, College of Business, University of Texas at San Antonio, 2012.
- Chen, Z.-Y., Z.-P. Fan and M. Sun, “Behavior-aware User Response Modeling in Social Media: Learning from Diverse Heterogeneous Data”, Working Paper No. 0033MSS-061-2013, College of Business, University of Texas at San Antonio, 2013.
- Graham, R. G. and M. Sun, “A Comparative Analysis of Project Management in Hong Kong and Shenyang”, working paper, Business Research Center at Hong Kong Baptist College, 1988.
- Hassanzadeh, F., Nemati, H., Sun, M., “Robust Optimization for Interactive Multiobjective Programming with Imprecise Information Applied to R&D Project Portfolio Selection”, Working Paper No. 0011MSS-061 -2013, College of Business, University of Texas at San Antonio, 2013.
- Sun, M., “TABU MACHINE: A New Neural Network Solution Approach for Combinatorial Optimization Problems”, Working Paper Vol. 17, No. 1, Institute for Studies in Business, College of Business, UTSA, 1996.
- Sun, M., “An Interactive Multiple Objective Programming Procedure Using Tchebycheff Programs and Feed-Forward Artificial Neural Networks”, Working Paper 94–01, Institute for Studies in Business, College of Business, UTSA, 1994.
- Sun, M., “Warm-Start Routines for Solving Multiple Objective Network Programming Problems”, Working Paper, Institute for Studies in Business, College of Business, The University of Texas at San Antonio, San Antonio, Texas, Vol. 21, No.2, 2000a.
- Sun, M., “Finding Integer Efficient Solutions for Multiple Objective Network Programming Problems”, Working Paper, Institute for Studies in Business, College of Business, The University of Texas at San Antonio, San Antonio, Texas, Vol. 21, No. 4, 2000b.
- Sun, M., “Procedures for Finding Nondominated Solutions for Multiple Objective Network Programming Problems”, Working Paper, Institute for Studies in Business, College of Business, The University of Texas at San Antonio, San Antonio, Texas, Vol. 21, No. 5, 2000c.
- Sun, M., “A Primogenitary linked Quad Tree Approach for Solution Storage and retrieval in Heuristic Binary Optimization”, Working Paper No. 0010MSS-061-2007, College of Business, The University of Texas at San Antonio, 2007.
- Sun, M., “A Tabu Search Heuristic Procedure for the Capacitated Facility Location Problem”, Working Paper No. 0050MSS-061-2008, College of Business, The University of Texas at San Antonio, 2008.

- Sun, M., “A Mixed Integer Programming Model for Multiple-Class Discriminant Analysis”, Working Paper No. 0102MSS-061-2009, College of Business, The University of Texas at San Antonio, 2009.
- Sun, M., “A Branch-and-Bound Algorithm for Representative Integer Efficient Solutions in Multiple Objective Network Programming Problems”, Working Paper No. 0007MSS-061-2010, College of Business, The University of Texas at San Antonio, 2010.
- Sun, M., Philippart, J., Doucet, J.L., Lejeune, P., “Mathematical formulation and exact solution for landing location problem in tropical forest selective logging, a case study in Southeast Cameroon”, Working Paper Series No. 0009MSS-061-2012, College of Business, The University of Texas at San Antonio, 2012.
- Sun, M. and A. Stam, “Operations Research Techniques Applied to the Training of Feed Forward Artificial Neural Networks”, Working Paper 91–327, Terry College of Business, The University of Georgia, 1991.
- Sun, M. and A. Stam, “Neural Meta Networks: The ‘Society of Mind’ Idea”, Working Paper 91–328, Terry College of Business, The University of Georgia, 1991.
- Sun, M., A. Stam and R. E. Steuer, “Solving Interactive Multiple Objective Programming Problems Using Artificial Neural Networks”, Working Paper #93364, Terry College of Business, The University of Georgia, 1993.
- Sun, M. and A. Stam, “On the Analytical Hierarchy Process, Principal Eigenvectors and the Hopfield Neural Network”, Working Paper 94–401, Terry College of Business, The University of Georgia, 1994.
- Sun, M., J. E. Aronson, P. G. McKeown and D. Drinka, “A Tabu Search Heuristic Procedure for the Fixed Charge Transportation Problem”, Working Paper 95–414, Terry College of Business, The University of Georgia, 1995.
- Sun, M., D. Drinka and J. E. Aronson, “Implementation Data Structures for a Tabu Search Heuristic Procedure for Solving the Fixed Charge Transportation Problem”, Working Paper 95–418, Terry College of Business, The University of Georgia, 1995.
- Stam, A., M. Sun and M. Haines, “Artificial Neural Network Representations for Hierarchical Preference Structures”, Working Paper WP95033, International Institute for Applied Systems Analysis, Laxenburg, Austria, 1995.
- Sun, M., A. Stam and R. E. Steuer, “Solving Multiple Objective Programming Problems Using Feed-Forward Artificial Neural Networks: The Interactive FFANN Procedure”, Working Paper WP-95-46, International Institute for Applied Systems Analysis, Laxenburg, Austria, 1995.
- Sun, M., A. Stam and R. E. Steuer, “Interactive Multiple Objective Programming Using Tchebycheff Programs and Artificial Neural Networks” Working Paper WP-95-58, International Institute for Applied Systems Analysis, Laxenburg, Austria, 1995.
- Sun, M., “A Tabu Search Heuristic Procedure for Solving the Transportation Problem with Exclusionary Side Constraints”, Working Paper Vol. 18, No. 1, Institute for Studies in Business, College of Business, UTSA, 1996.
- Sun, M., J. E. Aronson, P. G. McKeown and D. Drinka, “A Tabu Search Heuristic Procedure for the Fixed Charge Transportation Problem”, Working Paper Vol. 16, No. 2, Institute for Studies in Business, College of Business, UTSA, 1995.

Work in Progress

Papers under Review or under Revision:

- Chen, Z. -Y. and M. Sun, “Deep Stacking Kernel Machines for the Data-driven Multi-item One-warehouse Multi-retailer Problem”, submitted to *INFORMS Journal on Computing*. (first revision)
- Chen, Z. -Y. and M. Sun, “Data-driven Contract Design for Supply Chain Coordination with Algorithm Sharing and Algorithm Competition”, submitted to *IIE Transactions*. (second review)
- Ding, X. -F., M. Sun and H. -C. Liu, “Large Group Emergency Decision Making Using Linguistic Z-Numbers and the QUALIFLEX method”, submitted to *Omega: The International Journal of Management Science*. (first review)

- Dong, X., X. Li, B. Hu, H. Sun, M. Sun, K. Lin and J. Xue, “Estimating Urban's Taxi Sharing Potential: A Case Study of Chengdu”, submitted to *Transportation Research Part A: Policy and Practice*. (first review)
- Guo, D., Z. -P. Fan, M. Sun and N. Li, “Financing Provision and Value-Added Service Investment in a Capital-Constrained Sharing Service Supply Chain”, submitted to *European Journal of Operational Research*. (first review)
- Guo, D., Z. -P. Fan and M. Sun, “Offline Operations Strategies of Bike-sharing Platforms with a Single Purpose or Dual Purposes in a Duopoly Market”, submitted to *Transportation Research. Part C: Emerging Technologies*. (second review)
- Guo, Y., C. Bai and M. Sun, “Effects of Green Supplier Integration and Green Supplier Development in Competing Supply Chains”, submitted to *Naval Research Logistics*. (third review)
- Jiang, Z., J. Liu, H. Yi, and M. Sun, “Laser Welding Design Optimization with a Multiobjective Evolutionary Algorithm Based on Incremental Support Vector Regression and Local Search”, submitted to *Annals of Operations Research*. (first review)
- Jiang, Z., J. Zhao, M. Sun and M. Wan, “Joint Optimization of Parts-to-picker Online Order Picking and Delivery with Due Dates”, submitted to *International Journal of Production Economics*. (first review)
- Kim, J.-C., R. Qiu, J.-H. Jon and M. Sun, “Multi-objective programming for multi-period multi-product closed-loop supply chain network design: A fuzzy robust optimization approach”, submitted to *Environmental Science and Pollution Research*. (first review)
- Li, D., X. Liu and M. Sun, “Hierarchical Spiking Neural P systems with Weights on Multiple Channels for graph-based node classification”, submitted to *Theoretical Computer Science*. (first review)
- Li, G., Z. -P. Fan, Q. Zhao and M. Sun, “E-commerce Supply Chain Sales Mode Selection Considering Blockchain Technology Adoption for Consumer Privacy Protection”, submitted to *Omega: The International Journal of Management Science*. (first review)
- Li, K., Z. -H. Liu, M. Sun and H. -Q. Su, “Conditions for Resale Price Maintenance Implementation under Retailer's Countervailing Power”, submitted to *International Journal of Industrial Organization*. (first review)
- Li, K. Y. Meng and M. Sun, “PVI Strategy Considering Bargaining Power: An Empirical Analysis of the Chinese Automobile Market,” submitted to *Managerial and Decision Economics*. (first review)
- Li, K., H. -Q. Su, M. Sun and Z. -H. Liu, “Consumer Preference and Retailer’s Countervailing Power”, submitted to *International Journal of Industrial Organization*. (first review)
- Liu, X., W. Zang, M. Sun, L. Ma, Y. Zhao and X. Liu, “Density Peaks Clustering Using Multiple Feature Points”, submitted to *Applied Intelligence*. (first review)
- Ouyang, L., B. Tao, L. Liu, M. Sun and M. Wang, “Double-robust Bayesian Variable Selection and Model Prediction with Spherically Symmetric Errors”, submitted to *IIEE Transactions*. (first revision)
- Qi, Y., X. Zhou and M. Sun, “Forms of Competition, Quality Innovation and Vertical Integration”, submitted to *International Journal of Industrial Organization*. (first review)
- Qin, X., Y. Zhu, Z.-Z. Jiang, M. Sun, and X. Li, “The Interplay between the Contract Forms and the Verifiability of the Intelligent Maintenance Capacity in the Equipment After-Sales Service”, submitted to *IEEE Transactions on Engineering Management*. (first review)
- Qiu, R., Y. Yu and M. Sun, “Channel selection considering consumer reference quality effect in a two-tier supply chain”, submitted to *Journal of Retailing and Consumer Services*. (first review)
- Qiu, R., M. Yuan and M. Sun, “Optimizing Omnichannel Retailer Inventory Replenishment Using Capacity-sharing with Demand Uncertainties and Service Level Requirements”, submitted to *European Journal of Operational Research*. (first review)
- Shang, Y., C. Bai and M. Sun, “Bank or Retailer? Capital-Constrained Manufacturer Financing Using Carbon Emission Quota as a Pledged Asset”, submitted to *International Journal of Production Research*. (first review)

- Sun, M., “A Mixed Integer Programming Model for Feature Selection in Multi-Class Classification”, submitted to *Journal of the Operational Research Society*. (first review)
- Sun, M., “A Tabu Search Procedure for a Feature Selection Mixed Integer Programming Model in Multiple-Class Classification”, submitted to *Journal of Heuristics*. (first review)
- Sun, Y., R. Qiu, S. Shao and M. Sun, “Omnichannel Strategies and Pricing and Ordering Decisions of an Online-first Retailer Considering Product Returns”, submitted to *Computers & Industrial Engineering*. (first review)
- Xiang, T., Y. Zou, Y. Huang, T. H. Malik and M. Sun “Measuring Climate Smart Agriculture Total Factor Productivity: A Malmquist-Luenberger Index Analysis of 100 Countries, 1961–2016”, submitted to *World Development*. (first review)
- Xin, C. T. Chen and M. Sun, “Effects of COVID-19-induced Role Stress on the Employee Knowledge Hiding Behaviors”, submitted to *Journal of Business Research*. (first review)
- Xin, C., C. Zheng and M. Sun, “COVID-19-induced Stress and Employee Innovation: A Contingent Model Based on the Conservation of Resources Theory”, submitted to *Current Psychology*. (first review)
- Yin, X., X. Liu, M. Sun and J. Xue, “Hypergraph-based Numerical Spiking Neural P Systems with Novel Repartition Protocols”, submitted to *International Journal of Neural Systems*. (first review)
- Yu, Y., R. Qiu, M. Sun and Z. Li, “Supply Chain Quality and Pricing Decisions with Retailer Fairness Concerns and Consumer Dynamic Reference Quality Effects”, submitted to *Journal of Industrial and Management Optimization*. (second review)
- Zhao, Q., Z. -P. Fan and M. Sun, “Platform Sales Mode Selection and Manufacturer Decision on Joining the Blockchain System in a Platform-based Supply Chain”, submitted to *International Journal of Production Research*. (second review)
- Zhao, Q., Z. -P. Fan and M. Sun, “Manufacturer Blockchain Technology Adoption Strategies for Different Sales Channels in an E-commerce Platform Supply Chain”, submitted to *Annals of Operations Research*. (first review)
- Zhao, Q., Z. -P. Fan, M. Sun and F. Yan, “Analysis of Blockchain Technology Adoption Decision in a Fresh Product Supply Chain: The Impacts of the Double-edged Sword Effect and the Delivery Logistics Mode”, submitted to *European Journal of Operational Research*. (first review)
- Zhang, X., X. Liu, Q. Ren, M. Sun and Y. Zhao, “A Universal Neural Membrane Computing Model”, submitted to *Information Sciences*. (first review)

Papers under Preparation:

- Agrell, P. J. and M. Sun, “A Multiple Criteria Facility Location Model and a Tabu Search Procedure.” (analysis)
- Drinka, D. and M. Sun, “Two Dimensional Data Adjustment Problems and an Extension to Adjustment Techniques.” (analysis)
- Sun, M., “On the EMMD Linear Programming Formulation for Discriminant Analysis.” (first draft)
- Sun, M., “An Interactive Solution Procedure for Multiple Objective Network Flow Problems.” (analysis)
- Sun, M., “A Column Assembly Approach for Quadratic Programming Problems in a Multiple-Class Support Vector Machines.” (first draft)
- Sun, M., “A Warm Start Routine for Quadratic Programming Problems in a Multiple-Class Support Vector Machines.” (first draft)
- Sun, M. and P J. Agrell, “Data Structure, Algorithmic Specification and Computational Results of A Tabu Search Procedure for the Multiple Criteria Facility Location Problem.” (analysis)
- Sun, M. and R. E. Steuer, “Solving Nonlinear Multiobjective Programming Problems through Discrete Representation.” (first draft)

Professional Services and Activities

Editorship and Conference Committee:

- Editorial Board (member), *International Scholarly Research Notices* (2014–present).
- Editorial Board (member), *The Scientific World Journal* (2013–present).
- Editorial Board (member), *International Journal of Data Science* (2013–present).
- Associate Editor, *Decision Analytics* (2012–present).
- Editorial Board (member), *International Journal of Information Technology & Decision Making* (2000–present).
- Editorial Board (member), *The Springer Series in Quantitative Management* (2011–present).
- Associate Editor, *International Journal of Strategic Decision Sciences* (2008–present)
- Editorial Board (member), *ISRN Applied Mathematics* (2010–2014)
- Associate Editor, *Information Science and Technology* (2010–present)
- Local Arrangements Committee (chair), POMS 2000, the 11th Annual Meeting of the Production Operations Management Society, San Antonio, TX, April 1–4, 2000.
- Program Committee (member), Chinese Academy of Sciences Symposium on Data Mining and Knowledge Management (CASDMKM–04), Beijing, July 12–14, 2004.
- Local Committee (member), INFORMS Optimization Society Conference, Optimization and Healthcare, San Antonio, TX, February 3–5, 2006.
- Program Committee (member), MOPGP’06, the 7th International Conference devoted to Multi-Objective Programming and Goal Programming, Loire Valley, France, June 12–14, 2006.
- Founding member of the International Academy of Information Technology and Quantitative Management (IAITQM), founded at Omaha, NE. on June 3, 2012.
- Publication Committee (member), International Academy of Information Technology and Quantitative Management (IAITQM).
- Program Committee (member), the first International Conference on Information Technology and Quantitative Management (ITQM 2013), May 16–18, 2013, Suzhou, China.
- Program Committee (member), the second International Conference on Information Technology and Quantitative Management (ITQM 2014), June 3–5, 2014, Moscow, Russia.
- Program Committee (member), DeLTA 2020: 1st International Conference on Deep Learning Theory and Applications, July 8–10, 2020, Paris, France, Online Streaming due to COVID-19.
- Program Committee (member), DeLTA 2021: 2st International Conference on Deep Learning Theory and Applications, July 7–9, 2021, Lieusaint-Paris, France.

Society Memberships:

- Institute for Operations Research and the Management Sciences (INFORMS)
- Decision Sciences Institute (DSI)
- International Society on Multiple Criteria Decision Making

Conferences Attended:

- TIMS Southeastern Regional Conference, Myrtle Beach, SC, October 3–4, 1991

TIMS/ORSA 31st Joint National Conference, Nashville, TN, May 12–15, 1991

ORSA/TIMS 32nd Joint National Conference, Anaheim, CA, November 3–6, 1991

DSI 22nd Annual Conference, Miami Beach, FL, November 24–26, 1991

TIMS/ORSA 33rd Joint National Conference, Orlando, FL., April 26–29, 1992

ORSA/TIMS 34th Joint National Conference, San Francisco, CA, November 1–4, 1992

TIMS/ORSA 35th Joint National Conference, Chicago, IL, May 16–19, 1993.

DSI 24th Annual Conference, Washington, D. C., November 21–23, 1993.

TIMS/ORSA 37th Joint National Conference, Boston, MA., April 24–27, 1994.

XIIth International Conference on Multiple Criteria Decision Making, Hagen, Germany, June 1995.

The Sixth National Conference on Multiple Criteria Decision Making, Beijing, P. R. China, August 14–15, 1995.

INFORMS New Orleans Fall 1995 Conference, New Orleans, LA, October 29–November 1, 1995.

DSI 26th Annual Conference, Boston, MA, November 20–22, 1995.

INFORMS San Diego Spring 1997, San Diego, CA, May 4–7, 1997.

DSI 28th Annual Conference, San Diego, CA., Nov. 22–25, 1997.

INFORMS Seattle Fall 1998, Seattle, WA., October 25–28, 1998.

IFORS'99 Beijing, P. R. C., August 16–20, 1999.

DSI 30th Annual Conference, New Orleans, LA., November 20–23, 1999.

POMS 2000, the 11th Annual Conference of the Production Operations Management Society, San Antonio, TX, April 1–4, 2000.

INFORMS National Conference, San Antonio, Texas, November 5–8, 2000.

DSI 31st Annual Conference, Orlando, FL, November 18–21, 2000.

DSI 34th Annual Conference, Washington, D.C., November 22–25, 2003.

DSI 37th Annual Conference, San Antonio, TX, November 18–21, 2006.

ICM'2007, the 6th International Conference on Management, Wuhan, P. R. China, August 3–5, 2007.

DSI 39th Annual Conference, Baltimore, MD, November 22–25, 2008.

DSI 40th Annual Conference, New Orleans, LA, November 14–17, 2009.

The 7th International Conference on Natural Computation and The 8th International Conference on Fuzzy Systems and Knowledge Discovery, Shanghai, China, July 26–28, 2011.

The Inauguration Conference of the International Academy of Information Technology and Quantitative Management (IAITQM), Omaha, Nebraska, June 3, 2012.

POMS 28th Annual Meeting, Seattle, WA, May 5–8, 2017.

DSI 48th Annual Conference, Washington DC, Nov. 18-20, 2017.

POMS 29th Annual Meeting, Houston, TX, May 4–7, 2018.

DSI 49th Annual Conference, Chicago, IL, November 17–19, 2018.

DSI 50th Annual Conference, New Orleans, LA, Nov. 22–25, 2019.

Session Chairs:

- “Multiple Objective Programming Techniques”, TIMS/ORSA National Meeting, Chicago, IL, May 16–19, 1993 (Invited).
- “The Analytical Hierarchy Process: Methods (I)”, DSI 24th Annual Meeting, Washington, D. C., November 21–23, 1993.
- “MCDM: Method and Applications,” INFORMS National Meeting, Seattle, WA, October 25–28, 1998 (Invited).
- “Multiple Objective Programming,” INFORMS National Meeting, San Antonio, Texas, November 5–8, 2000.
- “MS/OR and Technology,” DSI 31st annual Meeting, Orlando, FL., November 18–21, 2000.
- “Panel Session of Decision and Optimization,” ICM’2007, the 6th International Conference on Management, Wuhan, P. R. China, August 3–5, 2007.
- “Transportation and Logistics,” DSI 39th annual Meeting, Baltimore, MD., November 22–25, 2008.
- “Supply Chain Decisions,” DSI 40th Annual Meeting, New Orleans, LA, November 14–17, 2009.
- “Sustainable Logistics,” POMS 2018, Houston, TX, May 4–7, 2018.
- “Business Analytics, Analytics Method” DSI 48th Annual Meeting, Chicago, IL, November 17-19, 2018.

Discussant:

- Southeastern TIMS 27th Annual Meeting, Myrtle Beach, SC., October 3–4, 1991.
- DSI 24th Annual Meeting, Washington, D. C., November 21–23, 1993.
- DSI 30th Annual Meeting, New Orleans, LA., November 20–23, 1999.
- DSI 31st Annual Meeting, Orlando, FL, November 18–21, 2000.

Referee for:

Decision Sciences

IEEE Transactions on Systems, Man, and Cybernetics

Annals of Operations Research

IIE Transactions

Information Systems and Operational Research

European Journal of Operational Research

OMEGA the International Journal of Management Science

International Journal of Operations and Quality Management

Operations Research

Management Science

Computational Economics

Networks

Multi-Criteria Decision Analysis

Computers & Mathematics with Applications

International Journal of Information Technology & Decision Making

Journal of Systems Science and Systems Engineering

Computer-Aided Civil and Infrastructure Engineering

IEEE Transactions on Evolutionary Computation

International Journal of Neural Systems

International Journal of Operational Research

Reviewer for:

National Science Foundation

ANNIE-92, Artificial Neural Networks in Engineering, St. Louis, November 1992

Austrian Federal Ministry for Science and Research

Decision Sciences Institute 1999 Annual Conference (MS Track and POM Track)

2000 Southwest Academy of Management Conference (Operations/Technology/Innovation/MIS/Quality track)

2000 Americas Conference on Information Systems (AMCIS), Association for Information Systems

Proceedings of the 15th International Meeting of the International Society on Multiple Criteria Decision Making.

Decision Sciences Institute 2000 Annual Conference (MS Track)

World Scientific Publishing Co. (Book Proposal)

Kluwer Academic Publishers (Journal Proposal)

2nd Annual Global Information Technology Management (GITM) World Conference, Dallas, Texas, June 2001

Decision Sciences Institute 2001 Annual Conference (MS Track)

Decision Sciences Institute 2002 Annual Conference (MS Track)

Decision Sciences Institute 2003 Annual Conference (MS Track)

Decision Sciences Institute 2004 Annual Conference (MS Track)

Decision Sciences Institute 2008 Annual Conference (MS Track)

The Hong Kong Research Grants Council (RGC)

Wiley and Sons (Book Chapters)

South-western (Book Chapters)

McGraw-Hill Irwin (Books and Book Chapters)

Adaptive Memory and Evolution: Tabu Search and Scatter Search (Book, Kluwer Academic Publishers)

The Handbook of Optimization in Medicine (edited by Panos Pardalos and Edwin Romeijn)

MOPGP'06, the 7th International Conference devoted to Multi-Objective Programming and Goal Programming.

The 7th International Conference on Natural Computation and the 8th International Conference on Fuzzy Systems and Knowledge Discovery, Shanghai, China, July 26–28, 2011.

IISE Annual Conference and Expo 2020.

External Reviewer:

Tenure and promotion review for The University of Alaska at Anchorage, 2003.

Ph.D. Thesis review for the Nanyang Technological University, Singapore, 2012.

Faculty promotion review for the Huazhong University of Science and Technology, 3 faculty members for 2012, one faculty member 2013.

Reviews of proposal for the award of Chang Jiang Scholars sponsored by the Department of Human Resources of the Ministry of Education of PRC, 18 proposals for 2013.

Ph.D. Thesis review for the National University of Singapore, Singapore, 2019.

Tenure and promotion review for Georgia Southern University, 2019.

Institutional Services

Doctoral Dissertation Committees Served:

Bazoumana Kone, Department of Management Science and Statistics, College of Business, The University of Texas at San Antonio, 2012–2014. (member)

Hong Cai, Transform Based Information Extraction and Analysis, Department of Electrical Engineering, The University of Texas at San Antonio, 2005–2007. (member)

Tao Wei, Expectation Propagation Algorithm for Bayesian Inference in Dynamic Systems, Department of Electrical Engineering, The University of Texas at San Antonio, 2005–2007. (member)

LaKami Baker, The Relationship between Mindfulness, Strategic Decision Process and Small Business Performance, Department of Management, The University of Texas at San Antonio, 2005–2007. (member)

Michael Burns, Department of Management, The University of Texas at San Antonio, 2008–present. (member)

Indu Ramachandran, Department of Management, The University of Texas at San Antonio, 2010–2012. (member)

Master Thesis Committee Served:

Beibei Yu, Using Geostatistical Methods to Improve Radar Rainfall Estimates Accuracy, Department of Environmental Science and Engineering, The University of Texas at San Antonio, 2008–2009. (member)

Chris Loudon, Classification of Data under Autoregressive Circulant Covariance Structure with Comparisons to Compound Symmetric Covariance Structure, Department of Management Science and Statistics, College of Business, The University of Texas at San Antonio, 2008. (member)

Committees

Division of Management and Marketing Graduate Studies Committee (member) from 1994 to 2000.

Division of Management and Marketing Recruiting Committee (member) for an assistant professor position in management science from fall 1996 to spring 1997.

College of Business Search Committee (member) for the Management and Marketing Division Director from fall 1997 to spring 1998.

College of Business Curriculum and Program Review Committee (member) from 1997 to 2000.

College of Business Academic Policy and Curriculum Committee (member) from 1997 to 2000.

Division of Management and Marketing Recruiting Committee (member) for an assistant professor position in applied statistics from fall 1998 to spring 1999.

College of Business Ad-Hoc Ph.D. Committee (member) from 1998 to 2000.

Division of Management and Marketing Faculty Review Advisory Committee (member) from 1998 to 2001.

College of Business Faculty Review Advisory Committee (member) 1998.

College of Business U.S.-China Business Education Initiative Committee (member) from spring 1999 to 2008.

Division of Management and Marketing Recruiting Committee (member) for a visiting professor position in marketing, spring 1999.

Division of Management and Marketing Recruiting Committee (Affirmative Action Advocate) for One position (Associate Professor or Professor) in Strategy or Organizational Theory and one (Assistant Professor, Associate Professor, or Professor) in Human Resources, fall 2000.

College of Business Recruiting Committee (member) for the Director of Asian Studies, fall 2000.

College of Business Research Advisory Board (member) fall 2000–2001.

Department of Management Science and Statistics Recruiting Committee (Affirmative Action Advocate) for an Assistant/Associate/Professor position in Statistics 2002–2003.

Department of Management Science and Statistics Comprehensive Periodic Evaluation Committee 2001–present.

Department of Management Science and Statistics Faculty Review and Advisory Committee 2001–present.

Department of Management Science and Statistics Graduate Programs Committee 2005–present.

College of Business Ph.D./Research Committee (member) 2000–2003.

College of Business Faculty Forum/Graduate Faculty Forum Executive Committee Executive Committee (member) 2001–2004.

College of Business Tenure and Promotion Committee (member) 2005–2007.

University of Texas at San Antonio Faculty Senator 2001–2003.

University of Texas at San Antonio Faculty Senate Nominating and Elections Committee (member) 2001–2003.

University of Texas at San Antonio University Assembly (member) 2001–2003.

Department of Information Systems and Cyber Security Comprehensive Periodic Evaluation Committee 2013

Department of Management Science and Statistics Ph.D. Admissions Committee (member) 2006–2015.

College of Business International Grants Fund Committee (member) 2009–2016.

College of Business Scholarship Committee (member) 2013–present.

Department of Management Science and Statistics Comprehensive Periodic Evaluation Review (D-CPER) committee (Chair) 2014.

Department Faculty Review Advisory Committee (DFRAC) (Chair) 2014.

College of Business MBA Programs Committee (member) 2014–2017.

University of Texas at San Antonio Parking Appeals Panel (member) 2014–present.

UTSA Core Curriculum Committee Member September 1, 2016–2020

UTSA Core Curriculum Teaching Award Selection Committee, Committee Member September 1, 2016–2019.

Department Faculty Review Advisory Committee (DFRAC) (Chair) 2017.

Department of Marketing Periodic Performance Evaluation Review Committee, 2018.

University of Texas at San Antonio OIT Faculty Advisory Committee (member) 2018–2020.

Department of Management Science and Statistics Recruiting Committee (member) for an Assistant/Associate/Full Professor position in the UTSA AI cluster hiring, 2018–2019.

Department of Management Science and Statistics Recruiting Committee (member) for an Assistant Professor in Supply Chain and Operational Analytics, 2019–2020.

Department of Management Science and Statistics Recruiting Committee (chair) for an Assistant Professor in AI/Data Mining/Decision Science, 2019–2020.

College of Business Faculty Review Advisory Committee (CFRAC) (member) 2019–present.

Department Periodic Performance Evaluation Review Committee (member) 2019.

College of Business Research Excellence Team (redesign the incentives of Dean’s Distinguished Research Award) 2020–present.

University of Texas at San Antonio Parking and Traffic Committee (member, appointed) 2020–present.

Department of Marketing Faculty Review Advisory Committee (DFRAC) 2020–2021.

Department of Management Science and Statistics Faculty Annual Review Committee (member) 2020–2021.

Department of Management Science and Statistics Faculty Annual Review Committee (chair) 2021–2022.

Department of Management Science and Statistics Recruiting Committee (member) for an Assistant Professor in Business Analytics, 2022–2023.

Department of Management Science and Statistics Recruiting Committee (chair) for an Open Rank Position in Operations and Supply Chain Management, 2023–2024.

University of Texas at San Antonio University Faculty Grievance Committee 2022–

University of Texas at San Antonio Formal Review Panel of the University Faculty Grievance Committee for a case review, 2023

Scholarship Sponsorship

Established the Lily and Minghe Sun Scholarship in Management Science, 2022.

Biographical Listings

2001–present *Who's Who in America*, Marquis Who’s Who.

2004–present *Who’s Who in American Education*, Marquis Who’s Who.

2005–present *Who’s Who in Finance and Business*, Marquis Who’s Who.

2006–present *Who’s Who in the World*, Marquis Who’s Who.

2002 *2000 Outstanding Intellectuals of the 21st Century*, International Biographical Centre, UK.

2005 *Leading Educators of the World*, International Biographical Centre, UK.

Honors, Awards and Recognition

2019 Favorite Business Professor voted by the UTSA student body.

2006 Best Theoretical/Empirical Research Paper Award from the Decision Sciences Institute for the paper “A Multiple-Class Support Vector Machine, Theory and Model” received at the 37th Annual Meeting, November 18–21, 2006, San Antonio, TX.

2003 Best Theoretical/Empirical Research Paper Award from the Decision Sciences Institute for the paper “Multiple-Group Discriminant and Classification Analysis with Linear Programming Approaches” received at the 34th Annual Meeting, November 22–25, 2003, Washington D. C.

2000 University of Texas at San Antonio College of Business Advisory Council the Col. Jean Migliorino and Lt. Col. Philip Piccione Endowed Faculty Award for Research Excellence.

2000 Award for Outstanding Service as the Local Arrangements Chair of the 11th Annual Meeting of the Production Operations Management Society.

1999 University of Texas System Chancellor’s Council Outstanding Teaching Award.

1998 Outstanding Paper Award for the paper “Strategic Groups and Performance in the Nursing Home Industry: A Reexamination” by the Southern Management Association.

ANBAR cited the paper “A Multiple Objective Embedded Network Model for Human Resource Planning and an Implementation of the Tchebycheff Method,” *Decision Sciences*, Vol. 27, No. 2, pp. 319–341, 1996, coauthored with D. Drinka and B. Murray, with the Highest Quality Rating (The Practice Implications Hall of Fame and The Originality Hall of Fame).

ANBAR cited the paper “Solving Multiple Objective Programming Problems Using Feed-Forward Artificial Neural Networks: The Interactive FFANN Procedure”, *Management Science*, Vol. 42, No. 6, pp. 835–849, 1996, coauthored with A. Stam and R. E. Steuer, with the Highest Quality Rating (The Research Implications Hall of Fame).

- 1997 University of Texas at San Antonio College of Business Advisory Council Teaching, Research and Service Combined Award.
- 1995 University of Texas at San Antonio College of Business Advisory Council Research Award.
- 1993 Elwood S. Buffa Doctoral Dissertation Competition Award presented by the Decision Sciences Institute on the 21st day of November 1993 at the plenary session of the national meeting at Washington D. C. for the dissertation entitled “Interactive Multiple Objective Programming Procedures via Adaptive Random Search and Feed Forward Artificial Neural Networks.”
- 1990–1991 Graduate School Research Assistantship and the Merit Supplement from the Graduate School, The University of Georgia.
Ph. D. Research Assistantship from Terry College of Business, The University of Georgia.
- 1988–1990 Graduate School Assistantship from the Graduate School, The University of Georgia.
- 1988–1989 Merit Supplement to the Graduate School Assistantship from the Graduate School, The University of Georgia.
Ph. D. Research Assistantship from Terry College of Business, The University of Georgia.
- 1987–1990 Comer Fellowship from Terry College of Business, The University of Georgia.
- 1987–1992 Teaching Assistantship from the Department of Management Sciences and Information Technology, The University of Georgia.
- 1985–1987 Graduate Studentship from the Graduate School, the Chinese University of Hong Kong.
- 1987 Lee Sheung Shun Academic Award from the Graduate School, the Chinese University of Hong Kong. 1982 First Honorary Scholarship from the Northeastern University, PRC, (The Northeastern University's highest distinction of outstanding students).
- 1978–1981 Elected as the Most Promising Student in every academic year during the four years of undergraduate study.

Faculty Development

- Spring 2005 Faculty Development Leave, the University of Texas at San Antonio
- Spring 2008 Pearson Business Statistics Forum, Hilton Head, SC, February 22–24, 2008
- Spring 2009 Faculty Development Leave, the University of Texas at San Antonio
- Spring 2009 Pearson Business Statistics Forum, Boston, MS, March 6–8, 2009

Grants

- 2013–2014 Beebe, N. and M. Sun “Advanced Research in Data Type Classification”, Naval Postgraduate School, \$205197.
- 2001–2002 “Solving Uncapacitated Facility Location Problems Using Tabu Search”, UTSA Faculty Research Award.

- 2000 “Integer Efficient Solutions for Multiple Objective Network Programming Problems,” a Faculty Summer Research Grant from the College of Business, The University of Texas at San Antonio.
- 1999 “Finding Nondominated Solutions for Multiple Objective Network Flow Problems”, a Faculty Summer Research Grant from the College of Business, The University of Texas at San Antonio.
- 1997–1998 “A Branch-and-Bound Algorithm for Solving the Transportation Problems with Exclusionary Side Constraints”, UTSA Faculty Research Award.
- 1996 “A Tabu Search Heuristic Procedure for Solving the Transportation Problem with Exclusionary Side Constraints”, a Faculty Summer Research Grant from the College of Business, The University of Texas at San Antonio.
- 1995 “TABU MACHINE: A New Neural Network Solution Approach for Combinatorial Optimization Problems”, a Faculty Summer Research Grant from the College of Business, The University of Texas at San Antonio.
- 1993–1994 “A Tabu Search Heuristic Procedure for the Fixed Charge Transportation Problems”, UTSA Faculty Research Award.
- 1993 “An Interactive Tchebycheff - Feed-Forward Artificial Neural Network Multiple Objective Programming Procedure”, a Faculty Summer Research Grant from the College of Business, The University of Texas at San Antonio.
- 1986–1987 “Project Management in China”, from the Chinese University of Hong Kong.
- 1986 “Multiobjective Programming Model for a Regional Social and Economic System”, from the City Science and Technology Association of Wafangdian City, Liaoning, China.