CURRICULUM VITAE

FANG QIU

Program in Geospatial Information Sciences School of Economic, Political and Policy Sciences University of Texas at Dallas 800 W. Campbell Rd., GR31, Richardson, TX 75080-3201

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EDUCATIONAL HISTORY

Ph. D.	December 2000, University of South Carolina, Columbia, South Carolina, Geographic Information System and Remote Sensing
	Dissertation: Opening the Black Box of Neural Networks and Breaking the
	Knowledge Acquisition Bottleneck of Fuzzy Expert Systems with a Hybrid
	Neuro-Fuzzy Image Classification System, Major Advisor: John R. Jensen.
M. Sc.	August 1993, National Laboratory of Resource and Environmental
	Information System, Chinese Academy of Sciences, Beijing, China,
	Geographic Information Systems
	Thesis: Spatial Decision Support System for Site Selection Study.
B. Sc.	August 1990, East China Normal University, Shanghai, China
	Geography with GIS emphasis
	Thesis: Map Display System Design and Implementation for GIS.
Certificates	August, 1995, Authorized Instructor, Environment System Research
	Institution (ESRI). For teaching Introduction to Arc/Info, Introduction to

ArcView GIS, and Spatial Database Design

PROFESSIONAL TRAINING:

2005, Nov.	Advanced Spatial Demography, by Daniel Griffith and Francesco Lagona,
	International Max Plack Research School of Demography, Max Planck
	Institute for Demographic Research, Rostock, Germany
2002, June	Introduction to Spatial Data Analysis, by Luc Anselin, ICPSR Summer
	Program in Quantitative Methods, The University of California, Santa
	Barbara
1994-2004	Multiple ESRI Training Certificates: Introduction to Arc/Info, Introducing
	ArcView, Customize ArcView with Avenue, Using Arc/Info with Grid,
	ArcStorm, ArcScan, Network, Cogo, Tin and Database Design, Designing
	GeoDatabase, Introduction to ArcIMS, Customize ArcIMS with HTML and
	Javascript, Introduction to Geoprocessing Scripts Using Python

PROFESSION	AL EXPERIENCE:
2013 – Present	Head, Geospaital Information Sciences, School of Economic, Political and
	Policy Sciences, University of Texas at Dallas
2006 - Present	Associate Professor with tenure, Geospaital Information Sciences, School of
	Economic, Political and Policy Sciences, University of Texas at Dallas
2000 - 2006	Assistant Professor, Program in Geographic Information Sciences, School of
	Social Sciences, University of Texas at Dallas
1996 - 2000	Research Assistant and Instructor, NASA Affiliated Research Center at the
	Department of Geography, University of South Carolina.

1994 - 1996	Director	and	Certified	Instructor,	Arc/Info	Technical	Consulting	and
	Training	Cente	r of China,	Chinese Ac	ademy of S	Sciences.		

1993 - 1994 Research Associate, National Laboratory of Resources and Environment Information System, Chinese Academy of Sciences.

RESEARCH INTERESTS

Remote Sensing Digital Image Processing, LIDAR and Hyperspectral Remote Sensing, Neural Network and Fuzzy Logic, Spatial Analysis and Modeling, GIS Application Software Development, and Web-based Mapping and Information Processing.

PROFESSIONAL MEMBERSHIP:

President, 2007-2008, International Association of Chinese Professional in Geographic Information Sciences - Abroad (CPGIS)

Member, American Society for Photogrammetry and Remote Sensing (ASPRS)

Member, Association of American Geographers (AAG)

Member, IEEE Geosciences and Remote Sensing Society (GRSS)

Life Member, International Association of Chinese Professional in Geographic Information Sciences - Abroad (CPGIS)

AWARDS AND HONORS:

2006	"Best Web Application" Award (3 rd place), ESRI International Conference.
2006	"CPGIS Go-West Lecture Tour", Travel Award from International
	Association of Chinese Professionals in Geographic Information Sciences -
	Abroad.
2005	"CPGIS Go-West Lecture Tour", Travel Award from International
	Association of Chinese Professionals in Geographic Information Sciences -
	Abroad.
2005	"CPGIS Young Scholar Summit", Travel Award from International
	Association of Chinese Professionals in Geographic Information Sciences -
	Abroad.
2004	"CPGIS Young Scholar Summit", Travel Award from International
	Association of Chinese Professionals in Geographic Information Sciences -
	Abroad.
2002	"Course Development for Online Instruction" Award from UTD Center for
	Online Learning and Technology
2000	Paul E. Lovingood, Jr. Research Award, 2000, University of South Carolina
2000	IEEE Geoscience and Remote Sensing Society 2000 Student Prize Paper
	Award, Second Prize, Institute of Electrical and Electronics Engineering
2000	IGASS 2000 Travel Support Award, Honolulu Hawaii
2000	CPGIS 2000 Annual Best Student Paper Award, The International
	Association of Chinese Professional in Geographic Information Systems
1990 - 1993	Outstanding Graduate Student, Chinese Academy of Sciences.
1990	Best Bachelor Thesis Award, East China Normal University.
1986 - 1990	Fellowship, East China Normal University, Shanghai

EXTERNAL FUNDING FOR ORIGINAL INVESTIGATION:

2008	"Urban Forest Inventory Based on Airborne LIDAR and Hyperspectral Imagery"
	funded by Dallas Urban Forest Advisory Committee, 9/1/2008- 8/31/2009. \$50,000

2005 "Efficient Spatial-Temporal Analysis of Environment and Public Health Related Data", with W. Wu and E. Sha, funded by *National Science Foundation*

- (NSF0513669), 9/1/2005 8/31/2008, \$397,504.00
- 2005 "Genetic, Behavioral and Lifestyle Risk Factors for Complications of Type 2 Diabetes in a Mexican American Population in the Lower Rio Grande Valley", with J. McCormick, funded by *Centers for Disease Control and Prevention* (CDC). 8/1/2005-8/1/2006. \$496,000, (\$42,687 Subcontract to UTD)
- 2005 "Waste-To-Energy: Strategic Geographic Planning Tool Development, Phase II", with K. Curtin and R. Briggs. Funded by *Environmental Protection Agency* (EPA). 9/1/2005-12/31/2006. \$110,000.
- 2004 "Waste-To-Energy: Strategic Geographic Planning Tool Development", with R. Briggs, and K. Curtin. Funded by *Environmental Protection Agency* (EPA). 10/1/2004-12/31/2005. \$65,000.
- "NASA EOS Higher-Education Alliance: Mobilization of NASA EOS Data and Information through Web Services and Knowledge Management Technology for Higher Education Teaching and Research", with L. Di, Z. Xia and W. Luo, funded by the *National Aeronautics and Space Administration* (NASA:E6001682). 2/1/2004-1/31/2009. \$3,000,000 (\$70,000 Subcontract to UTD)
- 2004 "Develop Internet Map Mapping Sites Using ESRI ArcIMS Software for the City of Rowlett", PI. Funded by *City of Rowlett*, TX. 2004-2005. \$6,000
- 2001 Center of Excellence in Spatial Information Technology, Oracle Corporation Award, 07/01/2002, Software donation worth of \$304,695.00.

PUBLICATIONS:

Articles in Peer Reviewed Journals:

- 1. Sridharan, H., F. Qiu, 2013. A spatially disaggregated areal-interpolation model using LiDAR derived building volumes, *Geographical Analysis*. In press.
- 2. Qiu, F., C. Zhang, and Y. Zhou, 2012. The development of an areal interpolation ArcGIS extension and a comparative study, *GIScience and Remote Sensing*. Vol. 49 (5), 644-663. doi:10.2747/1548-1603.49.5.644.
- 3. Qiu, F., F. Ni, B. Chastain, H. Huang, P. Zhao, W. Han, and L. Di. 2012. GWASS:GRASS web application software system based on the GeoBrain web service, *Computers & Geosciences*. 47:143-150. doi:10.1016/j.cageo.2012.01.023.
- 4. Zhang, C. and F. Qiu. 2012. Mapping individual tree species in an urban forest using airborne LiDAR data and hyperspectral imagery, *Photogrammetric Engineering and Remote Sensing*. Vol. 78 (10) 1079-1087 (AAG Remote Sensing Specialty Group 2011 Award Winner).
- 5. Zhang, C. and F. Qiu. 2012. Unsupervised hyperspectral image classification using a neuro-fuzzy system, *Journal of Applied Remote Sensing*. Vol. 6 (063515) 1-14, DOI:10.1117/1.JRS.6.063515
- 6. Qiu, F., B. Chastain, C. Zhang. 2011. Modeling land suitability/capability using fuzzy evaluation, *GeoJournal*. Accepted.
- 7. Zhang, C., F. Qiu. 2011. A point-based intelligent approach to areal interpolation, *Professional Geographer*. Vol. 63, No. 2, 262-276.
- 8. Qiu, F., H. Sridharan, and Y. Chun, 2010. Spatial autoregressive models for population estimation at the block level using LIDAR derived volume information. *Cartography and Geographic Information Systems*. Vol. 37, No. 3, 239-257.
- 9. Curtin, K. M., K. L. Hayslett-McCall, and F. Qiu, 2010. Determining Optimal Police Patrol Areas with Maximal Covering and Backup Covering Location Models, *Networks and Spatial Economics*, DOI 10.1007/s11067-007-9035-6. Vol. 10, No. 1, 125-145.
- 10. Qiu, F., 2008. Neuro-fuzzy Based Analysis of Hyperspectral Imagery, *Photogrammetric Engineering and Remote Sensing*, Vol. 74, No. 10, 1235-1247.

- 11. Zhang, C., G. Chen, and F. Qiu., 2008, Annual amphidromes observed in the atmosphere with remote sensing data, *Journal of Geophysical Research-Atmospheres*, 113, D16112, doi:10.1029/2008JD009864.
- 12. Qiu, F., B. Li, B. Chastain, and M. Alfarhan, 2008. A GIS based spatially explicit model of dispersal agent behavior, *Forest Ecology and Management*, Vol. 254, No. 3, 524-537
- 13. Zhang, C., and F. Qiu, 2008. An empirical relationship between sea surface temperature and water vapor: an improvement to the physical model with remote sensing derived data, *Journal of Oceanography*, Vol. 64, No. 1, 163-170.
- 14. Qian, Y., F. Qiu, J. Chang and K. Zhang, 2008. Visualization informed noise elimination and its application in processing high spatial resolution remote sensing imagery, *Computers and Geosciences*, Vol. 34. No. 1, 35-52
- 15. Qiu, F., M. Abdelsalam, and P. Thakkar, 2006. Spectral Analysis of ASTER Data Covering Part of Neoproterozoic Allaqi-Heiani Suture, Southern Egypt, *Journal of African Earth Sciences* (Special issue on Remote Sensing Applications to Geological Problems of Africa), Vol. 44, No. 2, 169–180
- Cooper, J. R. and F. Qiu, 2006. Expediting and Standardizing Stone Artifact Refitting Using a Computerized Suitability Model. *Journal of Archaeological Science*, Vol. 33, 987-998.
- 17. Xie, Z., and F. Qiu, 2005. Issues on the Use of Variogram-Based Feature Vectors in Content Based Image Retrieval. *The Florida Geographer*, Vol. 36, 41-60
- 18. Qiu, F., J. Berglund, J.R. Jensen, P. Thakkar and D. Ren, 2004. Speckle Noise Reduction for SAR Imagery Using a Local Adaptive Median Filter, *GIScience and Remote Sensing*, Vol. 41, No. 3, 224-266.
- 19. Qiu, F. and J.R. Jensen, 2004. Opening the Black Box of Neural Networks for Remote Sensing Image Classification. *International Journal of Remote Sensing*, Vol. 25, No. 9, 1749-1768.
- 20. Qiu, F., K. Woller and R. Briggs, 2003. Modeling Urban Population Growth from Remotely Sensed Imagery and TIGER GIS Road Data, *Photogrammetric Engineering and Remote Sensing*, Vol. 69, No. 9, September, 2003, 1031-1042.
- 21. Jensen, J.R., F. Qiu, and K. Patterson, 2001. A Neural Network Image Interpretation System to Extract Rural and Urban Land Use and Land Cover Information from Remote Sensor Data, *GeoCarto International, A Multi-disciplinary Journal of Remote Sensing and GIS*, Vol. 16. No. 1, 19-28.
- 22. Jensen, J.R., F. Qiu and M. Ji, 1999. Predictive Modeling of Coniferous Forest Age Using Statistical and Artificial Neural Network Approaches Applied to Remote Sensing Data, *International Journal of Remote Sensing*, Vol. 20, No. 14, 2805-2822
- 23. Li, X. and F. Qiu, 1995. The Application of GPS and GIS in Vehicle Real-time Monitoring, *Remote Sensing Technology and Application*, Vol. 10, No. 2, 33 37

Peer Reviewed Book Chapters:

- 24. Hayslett-McCall, K.L., F. Qiu, B. Chastain, J. Schubert, and V. Carver, 2008. The Simulation of the Journey to Residential Burglary, In Liu L. and J. Eck (ed.), *Artificial Crime Analysis System: Using Computer Simulation and Geographic Information Systems*, Hershey, PA: Idea Group, pp. 281-299
- 25. Curtin, K. M., F. Qiu, K. L. Hayslett-McCall, and T. M. Bray, 2005. Integrating Geographic Information Systems and Maximal Covering Models to Determine Optimal Police Patrol Areas, In Fahui Wang (ed.), *Geographic Information Systems and Crime Analysis*. Hershey, PA: Idea Group, pp 214-235.

Peer Reviewed Articles in Conference Proceedings:

26. Li, C., L. Khan, B. Thuraisingham, M. Husain, S. Chen, and Fang Qiu, 2007. Land

- Cover Classification and Grouping For Semantic Assessment, IEEE International Conference on Intelligence and Security Informatics (ISI) New Brunswick, NJ, May 23-24, 2007, 255-262.
- 27. Qian, Y., K. Zhang, and F. Qiu, 2005. Spatial Contextual Noise Removal for Post-classification Smoothing of Remotely Sensed Images, Proc. 20th Annual ACM Symposium on Applied Computing, Santa Fe, USA, 13-17 March 2005, ACM Press, pp. 524-528.
- 28. Qiu, F. and T. Pathik, 2004, Online Geo-referencing of satellite imagery using GIS Web Services, Proceedings of International Geoscienc and Remote Sensing Symposium, IEEE IGARSS 2004 Conference, September 20-24, 2004, Anchorage, Alaska, DVD-ROM 0-7803-8743-0
- 29. Qiu, F. 2000. Opening the Black Box of Neural Networks with Fuzzy Set Theory to Facilitate the Understanding of Remote Sensing Image Processing, Proceedings of International Geoscienc and Remote Sensing Symposium, IEEE IGARSS 2000 Conference, July 24-28, 2000, Honolulu, Hawaii, pp. 1531-1533 Vol. 4
- 30. Qiu, F. 1998. Simulation of Seed Dispersal in a Competitive Environment Using a Spatial Behavioral Model, Proceedings of International Conference on Modeling Geographical and Environmental System with Geographical Information System (GIS), Vol. 2, 645-651, June 22-25, 1998, Hong Kong.
- 31. Qiu F. and G. Cao, 1994. SSDSS: A Prototype of Site Selecting Spatial Decision Support System, Proceedings of Asia GIS/LIS, AM/FM and Spatial Analysis Conference (CD-ROM). March 29 31, 1994, Hong Kong.

Edited Books:

- 32. Qiu, F., Y Su, Q. Shao, Y. Sheng, X. Li, and Q. Wang, 1994. *Introduction to Arc/Info*, Chinese Academy of Sciences (Chinese)
- 33. Shao, Q., Q. Wang, X. Li, and F. Qiu, 1994. *Advanced Arc/Info*, Editor, Chinese Academy of Sciences (Chinese)
- 34. Qiu, F., Q. Shao, Y. Yao, and S. Li, 1995. *Using Grid and Tin in Arc/Info*, Chinese Academy of Sciences (Chinese)
- 35. S. Li, and F. Qiu, 1995. *Customize Arc/Info with AML*, Chinese Academy of Sciences (Chinese)
- 36. Qiu, F., R. Chen, and S. Li, 1995. *Introducing ArcView*, Chinese Academy of Sciences (Chinese)
- 37. S. Li and F. Qiu, 1995. *Customize ArcView with Avenue*, Chinese Academy of Sciences (Chinese)

Other Conference Abstract and Presentation:

- 38. Qiu, F. and C. Yuan, 2012. Parallel processing of massive LiDAR point clouds using CUDA enabled GPU. Annual Conference of American Association of Geographers (AAG), New York City, NY, February 24-28, 2012
- 39. Qiu, F. and B. Chastain, 2012. A Residential Burglary Simulation Model with Real-World Calibration. Geoinoformatics 2012, HongKong, China, Jule 15-17, 2012.
- 40. Qiu, F, 2012. Now you can see trees, not just forest. Geo-Tech Conference, Dallas, TX, March 2-3, 2012.
- 41. Qiu, F., C. Zhang, and H. Chen. 2011. A *k* nearest neighbors based areal interpolation using point data as ancillary information. Annual Conference of American Association of Geographers (AAG), Seattle, WA, April 12-16, 2011.
- 42. Qiu, F. And H. Sridharan. 2011. Urban forest classification using the WorldView-2 8-band hyperspatial imagery: a multi-level object-based approach. Geoinoformatics 2011, Shanghai, China, Jule 24-26, 2011.

- 43. Qiu, F. and C. Zhang, 2010. Forest Inventory at the Individual Tree Level using Lidar Point Cloud Data, American Society for Photgrammetry and Remote Sensing (ASPRS) 2010 Annual Conference, San Diego, CA, April 26-30.
- 44. Qiu, F. J. Chang, Z. Lu, and C. Zhang, 2010. Object Based 3D Model Acquisition for Individual Buildings and Trees from Airborne Lidar, GeoWeb 2010, Vancouver, Canada, July 26-30, 2010.
- 45. Zhang C. and F. Qiu, 2010. Unsupervised Hyperspectral Image Classification Using a Neuro-fuzzy System, Annual Conference of American Association of Geographers (AAG), Washington, DC, April 14-18, 2010.
- 46. Sridharan H. and F. Qiu, 2010. Population Estimation from An Additional Third Dimensional Perspective, Annual Conference of American Association of Geographers (AAG), Washington, DC, April 14-18, 2010.
- 47. Qiu, F., C. Zhang, and H. Chen, 2010. An Improved Point Based Areal Interpolation Using K-Nearest Neighbors, The 18th International Conference on Geoinformatics 2010, Beijing, China, June 18-20.
- 48. Dean D., H. Sridharan and F. Qiu F, 2009. Spectral Separability Analysis of Urban Tree Species Using Spectrometer Measurements, Annual Conference of American Association of Geographers (AAG), Las Vegas, NV, March 22-27, 2009.
- 49. Chastain B., F. Qiu, F. and F. Mendoza J., 2009. A GIS-based simulation model of seed dispersal with mammalian habitat corridors, Annual Conference of American Association of Geographers (AAG), Las Vegas, NV, March 22-27, 2009.
- 50. Chang J. and F. Qiu, 2009, Object-Oriented Feature Extraction Based on LIDAR Point Segmentation, American Society for Photgrammetry and Remote Sensing (ASPRS) 2009 Annual Conference, Baltimore, MD, March 9-13, 2009
- 51. Qiu F., Bryan Chastain, Haiting Huang, 2009. GWASS: GRASS Web Application Software System enabled by service oriented architecture, American Society for Photgrammetry and Remote Sensing (ASPRS) 2009 Fall Conference, San Antonio, TX, November 16-19, 2009
- 52. Fang Qiu, Bryan Chastain, Haiting Huang, Yaochen Qin, Liping Di, 2009. Revitalizing GRASS using service oriented architecture, Geoinformatics 2009 Conference, Fairfax, VA, August 12-14, 2009
- 53. Qiu F. and J. Chang, 2008. A 3D Mutual Nearest Neighborhood Based Filtering of Airborne LIDAR Data, Annual Conference of American Association of Geographers (AAG), Boston, MA, April 15-19, 2008.
- 54. Chen S. and F. Qiu. 2008, Population estimation based on object-oriented classification of high spatial image at the census block level, ASPRS 2008 Annual Conference, Portland, Oregon, April 28 May 2, 2008.
- 55. Qiu F., 2008, Spectral analysis of hyperspectral imagery based on a neuro-fuzzy system, Advanced Remote Sensing Training Workshop, June 25-26, Hong Kong
- 56. Chastain B., F. Qiu, 2008, Modeling residential burglary in a hybrid CA/MAS system with automatic AHP calibration, Geoinformatics 2008, Guangzhou, Guang Dong, China, June 28-29, 2008.
- 57. Qiu, F., 2008, Segmentation based airborne LIDAR data filtering and feature extraction, CPGIS 2008 Geomatics Workshop, Harbin, Heilongjiang, China, July 1-2, 2008
- 58. Qiu, F. and S. Chen, 2007. Multivariate Spatial Interpolation: A Comparative Study, Annual Conference of American Association of Geographers (AAG), San Francisco, CA, April 17-212007.
- 59. Qiu, F., and S. Ibrahim, 2006. Urban Feature Extraction and 3d City Modeling Using LIDAR and High-Resolution Digital Orthophotos, American Association of Geographers Annual Conference, Chicago, IL, USA, 6-11 March 2006.

- 60. Qiu, F. 2006. Cellular Automata and Agent-Based Modeling and Simulation of Forest Distribution in a GIS Environment, International Workshop of Forest Landscape Modeling, Beijing, China, 20- 24 June, 2006
- 61. Qiu, F., K.M. Curtin, R. Briggs, J. McElory, E. Li and Q. Li, 2006. Waste-to-Energy Strategic Geographic Planning Tool, Land Revitalization Summit, Austin, TX, 30 October 1 November, 2006
- 62. Fang Qiu, 2006. Application Development with Map Service for Use in Classroom Teaching NASA NEHEA/GEOBRAIN Team Meeting, Greenbelt, MD, 12-13, January, 2006
- 63. Qiu, F., 2005. Locating Brown Field with Fuzzy Weighted Overlay, American Association of Geographers Annual Conference, Denver, Colorado, April 5- 9, 2005
- 64. Sun, F, and F. Qiu, 2004. Towards a Sustainable Development of Chongqing Through Improved Water Resource Management Strategies, Inaugural Conference of the Consortium for Western China Development Studies, Chengdu, Sichuan, China, June 22-23,2004
- 65. Qiu, F. 2004. Fuzzy Membership Mapping of Land Use and land Cover Using Remote Sensing Image. The International Conference on Resources Development and Ecology Protection in Arid Regions, Urumqi, China, June, 25-30, 2004
- 66. Qiu, F., and T. Bray, 2003. Design of New Crime Analysis Tools, The American Society of Criminology 55h Annual Meeting, November 19-22, 2003, Denver, Colorado.
- 67. Lu, H., F. Qiu, and Y. Cheng, 2003. Temporal and Spatial Distributions of Ozone and Asthma, The 23rd Annual ESRI International User Conference, July 7–11, 2003, San Diego, CA
- 68. Qiu, F., 2003. Spatial Pattern and Causation Analysis of Childhood Cancer in Texas. The 23rd Annual ESRI International User Conference, July 7–11, 2003, San Diego, CA
- 69. Qiu, F., K. Woller, and R. Briggs 2002. Prediction of Population based on Road Development and Remote Sensing Change Detection Analysis, American Association of Geographers Annual Conference, March 19-23, Los Angeles, CA
- 70. Qiu, F. 2001. Invited Speaker, Spatial Database and Geospatial Information Sciences, Higher Education Technology Conferences, co-sponsored by Oracle Corporation and Artrium Communications, Inc. Dec. 7, 2001, Richardson, TX
- 71. Qiu, F., and J. Murdoch, 2001. Invited Speaker, GI Sciences and Public Health, Meeting on Health Survey of the Lower Rio Grande Valley, University of Texas at Brownsville, September 4, 2001, Brownsville, TX
- 72. Qiu, F., J. Berglund, and J. R. Jensen, 2001. Speckle Noise Reduction for SAR Imagery with an Improved Adaptive Median Filter, ASPRS 2001 Annual Conference, April 23 to 27, 2001, St. Louis, Missouri
- 73. Qiu, F. 2000. A New Approach for Remote Sensing Land Cover Classification, Presentation in the 2000 GIS Fall Fair, The North Central Texas Council of Governments, September 27, 2000, Dallas, TX
- 74. Qiu, F. 1999. Remote Sensing Image Classification Based On Automatic Fuzzy Rule Extraction By Integrating Fuzzy Logic And Neural Network Models, Proceedings of ASPRS 1999 Annual Conference (CD-ROM), May 17-21, 1999, Portland, Oregon.
- 75. Jensen, J. R., F. Qiu, 1998. A Neural-network Based System for Visual landscape Interpretation using High Resolution Remotely Sensed Image, Proceedings of ASPRS-RTI 1998 Annual Conference (CD-ROM), March 30 April 3, 1998, Tampa, Florida.
- Qiu, F. and J. He, 1995. Serious National Disaster Monitoring and Evaluating System. Proceedings of 1995 ESRI User Conference (CD-ROM), May 22-26, 1995, Palm Springs, California, USA.

- 77. Qiu F. and W. Gao, 1994. Pingxiang Resource Management and Economic Development Information Systems. Proceedings of The First Arc/Info User Conference in China. pp. 221-227, Beijing, September. 14-16, 1994 (Chinese).
- 78. Qiu F, 1990. Map Display System Design and Implementing for GIS, Excellent Bachelor Thesis of East China Normal University, ECNU, pp. 106-121, (Chinese).

Published Technical Reports:

- 79. Schill, S., G. Olson, L. Schmidt, F. Qiu, and J. R. Jensen, 2000. Land Management and Appraisal at the Parcel Level Using High Resolution Remote Sensing Data and GIS Modeling Techniques, NASA Affiliated Research Center Final Report. John C. Stennis Space Center, MS, 19pp.
- 80. Jensen, J. R., J. Berglund, F. Qiu, D. Savercool, and R. E. Godwin, 1998. The zontribution of Active Microwave (RADAR) Remote Sensing to Wetland Delineation, NASA Affiliated Research Center Final Report. John C. Stennis Space Center, MS, 33pp.
- 81. Jensen, J. R., F. Qiu, and K. Patterson, 1997. Development of Improved Image Classification Algorithms To Extract Quantitative Urban/Suburban Landuse/Land Cover Information from High Spatial Resolution Digital Imagery, NASA Affiliated Research Center Final Report. John C. Stennis Space Center, MS, 20pp.
- 82. Jensen, J. R., F. Qiu, R. H. Odum, Jr. and S. P. Prisley, 1996. Identification of Forest Cover Types, Age and Density in Southern Brazil Using Landsat Thematic Mapper Data, NASA Affiliated Research Center Final Report. John C. Stennis Space Center, MS, 12pp.

Administration and Curricular Development:

2007-2011	Coordinator, Remote Sensing Graduate Certificate Program
2002	Graduate Certificate in Remote Sensing, Curriculum Development
2001	Ph. D. in Geographic Information Sciences, Curriculum Development
2000	Master in Geographic Information Sciences, Curriculum Development

PROFESSIONAL SERVICE

Vice Chair, Treasurer, Board Member, AAG Spatial Analysis and Modeling

Specialty (SAM) Group

Member, Program Committee, Geoinformatics Conference, 2012

Reviewer, Geographical Analysis

Reviewer, GIScience and Remote Sensing

Reviewer, IJGIS (3 times)

Reviewer, Journal of Applied Remote Sensing

Reviewer, IEEE Transactions on Geoscience and Remote Sensing

Reviewer, Geoinformatics (6 times) Reviewer, GeoCarto Internation

Reviewer, Annals of American Association of Geographers (2 times)

2011 Vice Chair, Treasurer, Board Member, AAG Spatial Analysis and Modeling

Specialty (SAM) Group

Member, Program Committee, Geoinformatics 2011

Reviewer, Geographical Analysis

Reviewer, International Journal of Remote Sensing (3 times)

Reviewer, Annals of American Association of Geographers

Reviewer, Annals of GIS

Reviewer, Computers and Geosciences (2 times)

Reviewer, Photogrammetric Engineer and Remote Sensing. 2010 Vice Chair, Treasurer, Board Member, AAG Spatial Analysis and Modeling Specialty Group BOD Member, The International Association of Chinese Professionals in Geographic Information Sciences Member, Program Committee, Geoinformatics 2010 Panelist, NASA Proposal Review Reviewer, ISPRS Journal of Photogrammetry and Remote Sensing Reviewer, Advances in Space Research Reviewer, Computers & Geosciences Reviewer, International Journal of Applied Earth Observation and Geoinformation Reviewer, Annals of GIS 2009 Newsletter Editor, AAG Spatial Analysis and Modeling Specialty Group Member, Program Committee, Geoinformatics 2009 Reviewer, Computers, Environment and Urban Systems (2times) Reviewer, Geographical Analysis Reviewer, International Journal of Applied Geography Research Reviewer, International Journal of Geographic Information Sciences Reviewer, International Journal of Remote Sensing Reviewer, Sensor Panel Reviewer, National Science Foundation (2 times) 2008 President, International Association of Chinese Professionals in Geographic Information Science Chair, Technical Committee, Geoinformatics 2008 Reviewer, Computers, Environment and Urban Systems Reviewer, Earth Surface Processes and Landforms Reviewer, Computers and Geosciences Reviewer, International Journal of Geographic Information Sciences 2007 Reviewer, ISPRS Journal of Photogrammetry and Remote Sensing Reviewer, Journal of Geographic Information Sciences President Elected, Chair of Membership Committee, International Association of Chinese Professionals in Geographic Information Science. 2006 Panelist for NSF Proposal Review, National Sciences Foundation Reviewer, ISPRS Journal of Photogrammetry and Remote Sensing, 2 times Reviewer, Urban Remote Sensing Book BOD member, Chair of Membership Committee, International Association of 2005 Chinese Professionals in Geographic Information Science (CPGIS). Reviewer, Photogrammetry Engineering and Remote Sensing Reviewer, International Journal of Remote Sensing Reviewer, GIScience and Remote Sensing Member, UTD Information Resources Policy and Planning Advisory Committee. 2004 BOD member, Chair of Awarding Committee, International Association of Chinese Professionals in Geographic Information Science (CPGIS). Faculty Advisor, UTD Association of Jiangxi Students and Scholars Reviewer, Photogrammetry Engineering and Remote Sensing, Reviewer, International Journal of Risk Assessment and Management Reviewer, Journal of Environment Management Reviewer, GIScience and Remote Sensing Reviewer, Computer, Environment and Urban Systems

2003	Reviewer, Photogrammetry Engineering and Remote Sensing, 3 times
	Reviewer, Software and Practice
	Reviewer, Computers, Environment and Urban Systems
	Reviewer, Remote Sensing of Environment
	Reviewer, Book Chapter, Crime Analysis and GIS
2002	External Dissertation Reader for Zhixiao Xie, State University of New York
	at Buffalo, NY
	Member, UTD Ad Hoc Committee on High Performance Computing and
	Network Infrastructure
	Reviewer, Photogrammetry Engineering and Remote Sensing
2001	Reviewer, International Journal of Remote Sensing
	Reviewer, Geographical & Environmental Modeling
	Chair, Ph.D. Oral Examining Committee for Dede Weldon Casas
	Member, UTD Information Resources Policy and Planning Advisory
	Committee
	Member, GIS Faculty Search Committee, UTD School of Social Sciences
	Moderator, Technical Session of ASPRS 2001 Annual Conference
2000 - Present	Faculty Advisor, UTD Grace Chinese Christian Student Fellowship
1996	Vice Chair, Chinese GIS Software Competition Evaluation Committee

TEACHING EXPERTISE:

Classroom Teaching

Semester Semester	Prefix Nu	mber Course Name	Enrollment
University of T	Texas at Dalla	S	
2012 Fall	GISC 7365	RS Digital Image Processing	13
	GISC 5317	Computer Programming For GIS	28
Summer	GISC 6V01	Remote Sensing Workshop	5
Spring	GISC 6384	Spatial Analysis and Modeling	25
	GISC 7365	Applied Remote Sensing	8
2011 Fall	GISC 7365	Remote Sensing Digital Image Processing	11
	GISC 5317	Computer Programming For GIS	25
Summer	GISC 7367	Remote Sensing Workshop	7
Spring	GISC 6384	Spatial Analysis and Modeling	17
	GISC 7365	Remote Sensing Digital Image Processing	17
2010 Fall	GISC 7366	Applied Remote Sensing	12
	GISC 5317	Computer Programming For GIS	10
Summer	GISC 7367	Remote Sensing Workshop	6
Spring	GISC 6384	Spatial Analysis and Modeling	17
	GISC 7365	Remote Sensing Digital Image Processing	17
2009 Fall	GISC 7366	Applied Remote Sensing	7
	GISC 5317	Computer Programming For GIS	19
Summer	GISC 7367	Remote Sensing Workshop	3
Spring	GISC 6384	Spatial Analysis and Modeling	22
	GISC 7365	Remote Sensing Digital Image Processing	16
2008 Fall	GISC 7366	Applied Remote Sensing	12
	GISC 5317	Computer Programming For GIS	25
Summer	GISC 7367	Remote Sensing Workshop	7
Spring	GISC 6384	Spatial Analysis and Modeling	25
	GISC 7365	Remote Sensing Digital Image Processing	22
2007 Fall	GISC 7366	Applied Remote Sensing	8
	GISC 5317	Computer Programming For GIS	18

	Summer	GISC 7367	Remote Sensing Workshop	8
	Spring	GISC 6384	Spatial Analysis and Modeling	25
		GISC 6388	GIS Application Software Development	12
2006 Fall		GISC 7365	Remote Sensing Digital Image Processing	11
		GISC 5317	Computer Programming For GIS	26
	Summer	GISC 6379	Internet Mapping and Information Processing	19
	Spring	GISC 6384	Spatial Analysis and Modeling	12
		GISC 6384	Spatial Analysis and Modeling	19
2005	Fall	GISC 5317	Computer Programming for GIS	24
		GISC 7365	Remote Sensing Digital Image Processing	11
	Summer	GISC 6379	Internet Mapping and Information Processing	21
	Spring	GISC 6384	Spatial Analysis and Modeling	13
		GISC 6384	Spatial Analysis and Modeling	15
2004	Fall	GISC 5317	Computer Programming for GIS	17
		GISC 7365	Remote Sensing Digital Image Processing	10
	Summer	GISC 6379	Internet Mapping and Information Processing	16
	Spring	GISC 5317	Computer Programming for GIS	17
		GISC 6384	Spatial Analysis and Modeling	25
2003	Summer	GISC 7363	Internet Mapping and Information Processing	15
	Spring	GISC 6384	Spatial Analysis and Modeling	18
		GISC 7366	Applied Remote Sensing	7
2002	Fall	GISC 5317	Visual Basic Programming for GIS	19
		GISC 7365	Remote Sensing Digital Image Processing	7
	Summer	PEOC 6379	Internet Mapping and Information Processing	9
	Spring	PEOC 6379	Internet Mapping and Information Processing	14
		PEOC 6384	Spatial Analysis,	19
2001	Fall	PEOC 6379	Visual Basic Programming for GIS,	10
		PEOC 6379	Remote Sensing of Urban and Environment	5
		PEOC 6379	Geographic Information System Master's Project	6
	Summer	PEOC 6379	Digital Processing of Remote Sensing Imagery	10
		PEOC 6387	Geographic Information Systems Workshop	11
	Spring	PEOC 6384	Spatial Analysis 16	
		PEOC 6382	Applied GIS Software	10
2000	Fall	PEOC 6386	Urban and Environmental Application of GIS	5
	•	outh Carolina		
1999	Summer		Geographic Information Systems	20
	Spring	GEOG 141	Earth From Above	21

Ph.D. Dissertation Supervision (Committee Chairs)

- 1. Caiyun Zhang, Dissertation on "Urban Forest Inventory Using Airborne Lidar Data And Hyperspectral Imagery". Graduated in summer, 2010. Caiyun Zhang is now a tenure track Assistant Professor at the Florida Atlantic University.
- 2. Jie Chang, Dissertation on "Segmentation-Based Filtering and Object-Based Feature Extraction from Airborne LiDAR Point Cloud Data". Graduated in summer, 2011. Jie Chang is now working at Earth System Research Institute (ESRI) in Redlands, California
- 3. Bryan Chastain, with a focus on cellular automata modeling and multi-agent system, graduated in the summer, 2011. Bryan is now a clinic assistant professor at University of Texas at Dallas.

- 4. Harini Sridharan, Dissertation on "Object-Based Approaches to Image Classification for Hyperspatial and Hyperspectral Data". Graduated in summer, 2012. Harini is now working at the Oak Ridge National Laboratory.
- 5. Feng Ni, with an emphasis on parallel processing of LiDAR data
- 6. Yuhong Zhou, with an emphasis on LiDAR waveform.

Ph.D. Dissertation Committee Served

- 1. Melissa J. Rura, Dissertation on "Eigenvector Spatial Filtering for Image Analysis: An Efficient Algorithm". Graduated in fall, 2010. Melissa is now with University of Michigan Medical School
- 2. Gene A. Feighny, Dissertation on "A Predictive Terrestrial Clutter Model For Ground-To-Ground Automated Target Detection Applications". Graduated in Fall, 2010. Gene is now with Raytheon.
- 3. Mohammed Saad Alfarhan, Dissertation on "Geoscience information systems (GeoIS): A Geospatial paradigm for real and virtual 3D worlds". Graduated in Fall, 2009. Mohammed is now working with Saudi government.

GIS Master Student Supervision

- 1. Xiang Li, Fall, 2012, "Geographic profiling and crime analysis", Xiang is now work in Beijing.
- 2. Chen Yuan, Spring, 2012, "High performance computing for massive LiDAR data processing with optimized GPU parallel programming", thesis.
- 3. Yao Shen, Spring, 2012, "The relationship between treed neighborhoods and residential values", Yao is now a GIS analyst with City of Dallas.
- 4. Wenyuan Yin, Spring, 2012, "Interactive LiDAR Data Visualization and Post Segmentation Classification". Wenyuan is now a research associate at the University of Texas at Dallas.
- 5. Feng Ni, Spring, 2011, "Object-based Urban Feature Extraction from LiDAR-derived Raster". Feng is continuing his study in UTD as a Ph.D. student.
- 6. Longbin Zhao, Spring, 2010, "E-Plan Real-Time Chemical Plume Mapping & Geographic Information Reporting System", Longbin Zhao is with China Mobile, the biggest the wireless company in China.
- 7. Caiyun Zhang, Summer, 2009, "Unsupervised Hyperspectral Image classification using a Neuro-Fuzzy System", Caiyun is now a tenure track Assistant Professor at the Florida Atlantic University
- 8. Haiting Huang, Summer, 2009, "Build Event Tracking System with ARCGIS Server Technology", Haiting is working as a GIS Analyst in the City of Richardson
- 9. Harini Sridharan, Summer, 2009, ""Population Estimation A Third Dimensional Perspective". Harini is now working on her Ph.D. degree at the University of Texas at Dallas.
- 10. Huajun Chen, Spring, 2009, "Point Based Areal Interpolation Using K-nearest Neighbors", Huajun is now working at the City of Dallas as a GIS Programmer
- 11. Chanyalew Girmay, "Teff Crop Suitability Analysis based on an Improved Fuzzy Linguistic Ordered Weight Average (FLOWA)"
- 12. Fernando Jose Mendoza Jara, Summer, 2008, "A GIS based Spatially Explicit Model of Seed Dispersal by Zoochory Agents", Fernando is now a faculty member at Universidad Nacional Agraria, Nicaragua.
- 13. Zhixiang Lu, Summer, 2008, "A Construction Of 3d Building Models Using Lidar Data ", Zhixiang is now working as a research associate in TSP at UT Dallas, TX
- 14. Shaofei Chen, Spring, 2008, "Estimating population at census block level using object oriented classification", Shaofei is now a Ph.D. student at UT Dallas.

- 15. Tanakorn Jangkakul, Fall, 2007, "A web-Service Electrical GIS MapServer Via Open Source GIS Software", Tanakorn is now working with DataVoice International Inc. at Allen, TX
- 16. Jianghong Li, Summer, 2007, "Automated Property Notification & Online Updating of Appraisal Data: A GIS Solution for Urban Planning". Jianghong is working as a GIS Programmer/Analysis at the City of Rowlett, TX
- 17. Guang Xiao, Spring, 2007, "The Effects of Air Pollution and Socio-economic Status on the Asthma Admission Rates to the Los Angles Hospitals". Guang is working as an Application Manager at Spatial Data Inc., at Irving, TX.
- 18. Jian Hang, Spring, 2006, "Online Distributed GIS System Based on Web Service and ArcGIS Server". Jian is working as a GIS Programmer in Environment System Research Institute (ESRI) at Redlands, CA.
- 19. Jeff Bourdier, Summer, 2006, "Areal Interpolation Methods using Land Cover and Street Data". Jeff is now a GIS analyst at TCEQ.
- 20. Sulafa Ibrahim, Fall, 2005, "Feature Extraction and 3d City Modeling Using Airborne LIDAR and High-Resolution Digital Orthophotographs", Sulafa is working as a GIS staff at the City of Dallas.
- 21. Georgeta Baciu, Fall, 2005, "Hydrological Analysis of Collin County, TX". Georgeta is working with City of Plano's Planning Department as a GIS analyst.
- 22. Stace Maple, Summer, 2005, "Visual Prominence: A topographic variable based upon human perception of the landscape, and its application to archaeological data". Stace is working at the Yale University as a GIS specialist.
- 23. Xiaogang Yang, Summer, 2005, "Spatial-Temporal Interpolation of Temperature Using Artificial Neural Networks". Xiaogang is working with City of Allen as a GIS analyst.
- 24. George Madrid, Spring, 2005, "Locating Potential Brownfield Areas with Fuzzy and Boolean Weighted Overlay in New Orleans" George is now a Ph.D. student at UTD GIS program
- 25. Zhijun Zou, Spring, 2005, "Implementing Agent-based Modeling in a GIS Environment". Zhijun is working at the City of Arlington, TX as a GIS Developer.
- 26. Pathik Thakkar, Fall, 2004, "Subpixel Image Analysis with Neural-Fuzzy Classifier". Pathik is working with Environment Research System Institute (ESRI) at Redland, CA as Software Developer II.
- 27. Caption Siluvairajan, Summer, 2004, "Extending the ArcObjects Programming Model by Implementing Spatial Statistics Using .NET In a Tightly Coupled GIS Environment", Capton is working with Cambridge Systematics Inc. (www.camsys.com) at Tallahassee, FL as a GIS programmer and transportation data modeler.
- 28. Mohammed S. Alfarhan, Spring, 2003, "Environmental Modeling and Simulation: Seed Dispersal Example". Mohammed is now returning to University of Texas at Dallas to work on his Ph.D. in Geospatial Information Sciences.
- 29. Marisa Galimbertti, Spring, 2003, "Texas Childhood Cancel Study with GIS and Spatial Data Analysis Approach". She is working with Rural and Community Health Institute, at the Health Science Center of The Texas A&M University.
- 30. Hua Lu, Fall, 2002, "Spatial and Temporal Relationship of Asthma and Ozone". Hua is working with Emergint Technologies, Inc., CDC Information Technology Contract at Atlanta, GA.
- 31. Kwabena Prakah-Asante, Spring, 2002, "Application of Spatial Interpolation Techniques and Visual Basic to Obtain Surfaces of Ozone Pollution Concentrations". K.B. went to work with the City of Riverside's Police Department, CA as a GIS analyst.
- 32. Kevin Woller, Spring, 2001, GIS Master Project, "Urban Growth Detection from Remote Sensing". Kevin is working with Pioneer Natural Resources, USA, Inc. at Irving, TX.

Awards to Advisees

- 1. Caiyun Zhang, 2012, AAG Early Career Best Paper Award, Remote Sensing Specialty Group, American Association of Geographers, New York City, NY.
- 2. Harini Sridharan, 2011, Best Student Illustrative Paper Awards, American Association of Geographers, Seattle, WA.
- 3. Caiyun Zhang, 2011. Best Study Paper Competition Award, Remote Sensing Specialty Group, American Association of Geographers, Seattle, WA.
- 4. Harini Sridharan, 2011, Research Award, DigitalGlobe 8-band Research Challenge, Geospatial World Forum.
- 5. Bryan Chastain, 2008, Best Student Paper Competition Award, Geoinformatics 2008.