

**SHORT CV**  
Selima Sultana

**EDUCATION:**

Degree	Institution	Date
Ph.D. Geography*	University of Georgia, Athens	2000
M.S. Urban Planning**	Georgia State University, Atlanta	1993
M.S. Geography***	Jahangirnagar University, Dhaka, Bangladesh	1989
B.S. (Hons.) Geography****	Jahangirnagar University, Dhaka, Bangladesh	1987

\* Major in Urban Geography and Geographic Information Systems

\*\* Major in Community Planning and Economic Development

\*\*\* Major in City Planning (graduated with **first class first** position)

\*\*\*\* Minor in Economics and Statistics (graduated with **first class second** position)

**MAJOR AREAS OF ACADEMIC INTEREST:**

Urban and Transport, Race and Ethnicity, Equity and Social Justice, Transportation and Public Health, and Diversity in National Parks.

**COURSES TAUGHT:**

GEO104: World Regional Geography

GEO105: Cultural Geography

GEO301: Urban Geography--Global Patterns

GEO302: Urban Geography-- Land Use

GEO304: Introduction to Transportation Analysis

GEO322: Research Methods in Geography

GEO622: GIS Applications in Urban Planning

GEO631: Transportation Planning

GEO702: Research Design

**PROFESSIONAL EXPERIENCE/ POSITIONS HELD:**

2016–present Professor, Department of Geography, University of North Carolina at Greensboro.

2014–present Director of Graduate Studies, Department of Geography, University of North Carolina at Greensboro.

2013–2013 Interim Graduate Director, Department of Geography, University of North Carolina at Greensboro.

2007–2016 Associate Professor, Department of Geography, University of North Carolina at Greensboro.

2004–2007 Assistant Professor, Department of Geography, University of North Carolina at Greensboro.

- 2000–2004 Assistant Professor, Department of Geology and Geography, Auburn University, Alabama.
- 1999–2000 Instructor, Department of Geography, University of Georgia, Athens.
- 1997 GIS Intern, Georgia Environmental Organization (GEO), Atlanta, Georgia.
- 1995–1999 Graduate Teaching Assistant, Department of Geography, University of Georgia, Athens, Georgia.
- 1993–1994 Intern Planner, Bureau of Planning, City of Atlanta, Georgia.
- 1992–1993 Research Assistant, Department of Urban Policy, Georgia State University, Atlanta.

## PUBLICATIONS:

### Books

- 2019 Weber, J. and **Sultana, S.** *The National Park System: Human Geography Perspectives on "America's Best Idea"*. Athens, GA: University of Georgia Press. (Under Contract)
- 2016 **Sultana, S.** and Weber, Joe (Eds.). *Minicars, Maglevs, and Mopeds: Modern Modes of Transportation around the World*. ABC-Clio/Greenwood Press. 396 pages. <http://www.abc-clio.com/ABC-CLIOCorporate/product.aspx?pc=A4648C>.

### Refereed Journal Articles, Book Chapters, and Entries

- 2019 Karimi, F., **Sultana, S.**, Babakan, A. S., Suthaharan, S. Exploration of Support Vector Machines for Urban Expansion Modeling. *Computers, Environment and Urban Systems*, 75, 61-75. <https://doi.org/10.1016/j.compenvurbsys.2019.01.001>.
- 2018 Altaher, A., Clapp, J., **Sultana, S.** Residential Settlement Patterns among Immigrants in Atlanta Metropolitan Area, Georgia. *Geographical Review*. <https://doi.org/10.1111/gere.12319>.
- 2018 Pourebrahim, N., **Sultana, S.**, Thill, J-C., Mohanty, S. Predicting Trip Distribution Using Twitter Data: Comparison of Gravity and Neural Networks. In 2nd ACM SIGSPATIAL International Workshop on AI for Geographic Knowledge Discovery (GeoAI'18), November 6, 2018, Seattle, WA, USA. ACM. New York, NY, USA, 4 pages. <https://doi.org/10.1145/3281548.3281555>.
- 2018 **Sultana, S.**, Kim, H., Pourebrahim, N., Karimi, F. Geographical Assessment of Low-Carbon Transportation Modes: A Case Study from a Commuter University. *Sustainability*, 2018, 10, 2696; <https://doi.org/10.3390/su10082696>.
- 2018 **Sultana, S.**, Pourebrahim, N., Kim, H. Household Energy Expenditures in NC: A Geographically Weighted Regression Approach. *Sustainability*, 2018, 10(5), 1511-1533; <https://doi.org/10.3390/su10051511>.
- 2018 Karimi, F., **Sultana, S.**, Babakan, A. S., Royall, D. Land Suitability Evaluation for Organic Agriculture of Wheat Using GIS and Multi-Criteria Analysis. *Papers in Applied Geography*, 1-16. <https://doi.org/10.1080/23754931.2018.1448715>.
- 2018 Kim, H., **Sultana, S.**, Weber, J. A Geographic Assessment of High-speed rail stations on urban development: the implications from the Korea Train eXpress (KTX). *Transport Policy*, 1-12. <https://doi.org/10.1016/j.tranpol.2018.02.008>.

- 2017 **Sultana, S.**, Salon, D., Kuby, M. Transportation Sustainability in the Urban Context: A Comprehensive Review. *Urban Geography*, 1-30. <https://doi.org/10.1080/02723638.2017.1395635>.
- 2017 **Sultana, S.** Land Use and Transportation. The International Encyclopedia of Geography: People, the Earth, Environment and Technology (IEG). PP. 1-11, John Wiley & Sons, Ltd. DOI: 10.1002/9781118786352.wbieg0697.
- 2015 **Sultana, S.** Factors Associate with Students' Parking-Pass Decisions: Evidence from an American University. *Transport Policy*, 44 (Nov.), 65-75. <https://doi.org/10.1016/j.tranpol.2015.07.002>.
- 2015 Kim, H. and **Sultana, S.** The impacts of high-speed rail extensions on accessibility and spatial equity changes in South Korea from 2004 to 2018. *Journal of Transport Geography*, Vol. 45 (May), pp. 48-61. <https://doi.org/10.1016/j.jtrangeo.2015.04.00>.
- 2014 **Sultana, S.** and Weber, J. "The Nature of Urban Growth and the Commuting Transition: Endless Sprawl or a Growth Wave?" *Urban Studies*, Vol. 51(3), pp. 544-576. <https://doi.org/10.1177/0042098013498284>.
- 2014 **Sultana, S.** Commuting in America. In Mark Garrett (Eds.) *Encyclopedia of Transportation: Social Science and Policy*. PP. 396-399. Thousand Oaks: Sage Publication, Inc. DOI: <http://dx.doi.org/10.4135/9781483346526.n149>.
- 2013 Weber, J. and **Sultana, S.** "Why Do So Few Minority People Visit National Parks? Visitation and the Accessibility of "America's Best Idea"" *Annals of the Association of American Geographers*, Vol. 103(3), pp. 437-464. <https://doi.org/10.1080/00045608.2012.689240>.
- 2013 Weber, J. and **Sultana, S.** The Civil Rights Movement and the National Park System. *Tourism Geographies*, Vol. 15 (3), pp. 444-469. <https://doi.org/10.1080/14616688.2012.675515>.
- 2012 Buliung, R, **Sultana, S.**, Faulkner, G. Guest Editorial: Special Section on Child and Youth Mobility: Current Research and Nascent Themes. *Journal of Transport Geography*. Vol 20(1): 31-33. <https://doi.org/10.1016/j.jtrangeo.2011.08.007>.
- 2011 **Sultana, S.** "Edge Cities in the Era of Megaprojects" in Stan Brunn (eds.) *Engineering Earth: The Impacts of Mega-engineering Projects*. PP. 1071-88. NYC: Springer. [https://link.springer.com/chapter/10.1007%2F978-90-481-9920-4\\_61](https://link.springer.com/chapter/10.1007%2F978-90-481-9920-4_61).
- 2010 **Sultana, S.** and Powell, T. W. "Land Use." In Barney Warf (eds.) *Encyclopedia of Geography*. PP. 1727-1733. Thousand Oaks: Sage Publications, Inc. DOI: <http://dx.doi.org/10.4135/9781412939591.n694>.
- 2008 Weber, J. and **Sultana, S.** "Race, Employment Sprawl, and the Journey to Work in Birmingham, Alabama." *Southeastern Geographer*, Vol. 48 (1), pp. 53-74. <http://muse.jhu.edu/article/240389>.
- 2007 **Sultana, S.** and Weber, J. "Journey-to-Work Patterns in the Age of Sprawl: Evidence from Two Mid-Size Southern Metropolitan Areas." *The Professional Geographer*, Vol. 59 (2), pp. 193-208. <https://doi.org/10.1111/j.1467-9272.2007.00607.x>.
- 2006 Weber, J., **Sultana, S.** and Maret, I. "Urban Sprawl, Commuting, and Access to

- Public Transportation in the Southeast." *Papers and Proceedings of the Applied Geography Conference*, Vol. 29, pp. 282–291.  
[https://www.researchgate.net/profile/Selima\\_Sultana/publication/](https://www.researchgate.net/profile/Selima_Sultana/publication/)
- 2006 **Sultana, S.** "What About Dual–Earner Households in Jobs–Housing Balance Research? An Essential Issue in Transport Geography." *Journal of Transport Geography*, Vol. 14, pp. 393–395. <https://doi.org/10.1016/j.jtrangeo.2006.06.004>.
- 2006 **Sultana, S.** and Miller P. "Hispanic Immigrant Clusters and the Local Labor Market: Preliminary Evidence from North Carolina." *The North Carolina Geographer*, Vol. 13, pp. 44–56.  
[http://libres.uncg.edu/ir/uncg/f/S\\_Sultana\\_Hispanic\\_2005.pdf](http://libres.uncg.edu/ir/uncg/f/S_Sultana_Hispanic_2005.pdf).
- 2006 Johnston–Anumonwo, I. and **Sultana, S.** "Race, Location and Access to Employment in Buffalo, NY." in John W. Frazer and Eugene L. Tettey–Fio (eds.) *Race, Ethnicity and Place in a changing America*. pp. 119–130, Global Academic Publishing, Binghamton.  
[https://www.researchgate.net/profile/Selima\\_Sultana/contributions](https://www.researchgate.net/profile/Selima_Sultana/contributions).
- 2005 **Sultana, S.** "Effects of Dual–earners Households on Metropolitan Commuting: Evidence from Metropolitan Atlanta" *Urban Geography*, Vol.26 (4), pp. 328–352.  
<https://doi.org/10.2747/0272-3638.26.4.328>.
- 2005 **Sultana, S.** 2005. "Racial Variation in Males Commuting time: What does the Evidence Suggest?" *The Professional Geographer*, Vol. 57(1), pp. 66–82.  
<https://doi.org/10.1111/j.0033-0124.2005.00460.x>.
- 2005 **Sultana, S.**, Hare, J., and Weber, J. "The Relationship of Income, Density, and Commuting Times on Overweight/Obesity Rates in North Carolina." *Papers and Proceedings of the Applied Geography Conference*, Vol. 28, pp. 254–263.  
[https://www.researchgate.net/profile/Selima\\_Sultana/contributions](https://www.researchgate.net/profile/Selima_Sultana/contributions).
- 2005 Talbot, M. R. and **Sultana, S.** "The Relationship between Pedestrian Deaths and Metropolitan Areas with High Density Vehicle Use." *Papers and Proceedings of the Applied Geography Conference*, Vol. 28, pp. 264–272.  
[https://www.researchgate.net/profile/Selima\\_Sultana/contributions](https://www.researchgate.net/profile/Selima_Sultana/contributions).
- 2004 **Sultana, S.** and Marzen, L. J. "Quantifying Urban Encroachment in Dhaka, Bangladesh from 1989–2000." *Papers and Proceedings of the Applied Geography Conference*, Vol. 27, pp.231–238.  
[https://www.researchgate.net/profile/Selima\\_Sultana/contributions](https://www.researchgate.net/profile/Selima_Sultana/contributions).
- 2004 Adri, N. and **Sultana, S.** "Grameen Bank's Housing Program for Rural Poor in Bangladesh: A Case Study." *Papers and Proceedings of the Applied Geography Conference*, Vol. 27, pp.247–253.  
[https://www.researchgate.net/profile/Selima\\_Sultana/contributions](https://www.researchgate.net/profile/Selima_Sultana/contributions).
- 2003 **Sultana, S.** "Commuting Constraints of Black Female Workers in Atlanta: An Examination of Spatial Mismatch Hypothesis in Married–couple Dual–earner Households," *Southeastern Geographer*, Vol. 43 (2), pp. 249–259.  
<http://muse.jhu.edu/article/425629/pdf>.
- 2003 **Sultana, S.** and Chaney, P. "Impact of Urban Sprawl on Travel Behaviors and Local Watersheds in the Auburn–Opelika Metropolitan Area: A Case Study on a

Small MSA." *Papers and Proceedings of the Applied Geography Conference*, Vol. 26, pp. 20–28. [https://www.researchgate.net/profile/Selima\\_Sultana/contributions](https://www.researchgate.net/profile/Selima_Sultana/contributions).

- 2002 **Sultana, S.** "Jobs–Housing Imbalance and Commuting in the Atlanta Metropolitan Area: Exploration of Causes of Longer Commuting," *Urban Geography*, Vol. 23 (8), pp. 728–749. <https://doi.org/10.2747/0272-3638.23.8.728>.
- 2002 **Sultana, S.** "Intra–Regional Variations of Commuting Times in a Decentralized Urban Area," *Papers and Proceedings of the Applied Geography Conference*, Vol. 25, pp. 183–189. [https://www.researchgate.net/profile/Selima\\_Sultana/contributions](https://www.researchgate.net/profile/Selima_Sultana/contributions).
- 2000 **Sultana, S.** "Some Effects of Employment Centers on Commuting Times in the Atlanta Metropolitan Area, 1990," *Southeastern Geographer*, Vol. 41, No. 2, pp. 225–233. <http://muse.jhu.edu/article/425532/pdf>.

### Refereed Research Report

- 2009 Tapp, A., Bunch, R., **Sultana, S.** GIS for building School Routes in Guilford County Child Development Centers. Guilford County School.
- 2005 Weber, J. and **Sultana, S.** *Impact of Sprawl on Commuting in Alabama*. University Transportation Center for Alabama, Report no. 04108. The University of Alabama. <http://utca.eng.ua.edu>.

### Non-Refereed Critical Book Reviews & Report in Journals, Magazines, Blogs, and Others

- 2014 **Sultana, S.** Transportation Geography Specialty Group Report. *Journal of Transport Geography*. Vol. 35, 162-163. <http://dx.doi.org/10.1016/j.jtrangeo.2012.11.005>.
- 2014 **Sultana, S.** and Weber, J. Commuting times increase as cities grow, and then fall as areas mature. London School of Economics and Political Science (LSE) and American Politics and Policy (USApp) blog site. <http://blogs.lse.ac.uk/usappblog/2014/02/24/commuting-time-city-maturity/>
- 2013 **Sultana, S.** Transportation Geography Specialty Group Report. *Journal of Transport Geography*. Vol. 27, pp. 81. <http://dx.doi.org/10.1016/j.jtrangeo.2012.11.005>.
- 2010 **Sultana, S.** *Motoring: The Highway Experience in America*, by John A. Jakle and Keith A. Sculle. University of Georgia Press: Athens, 2008. *The Professional Geographer*, Vol. 62(2): 290–292. <https://doi.org/10.1080/00330121003600892>.
- 2010 **Sultana, S.** *Transforming Race and Class in Suburbia: Decline in Metropolitan Baltimore*, by Thomas J. Vicino. Palgrave Macmillan: New York, 2008. *Urban Geography*, Vol. 31(2): 273–274. <https://doi.org/10.2747/0272-3638.31.2.273>.
- 2009 **Sultana, S.** and Powell, T. W. *Planning the Good Community: New Urbanism in Theory and Practice*, by Jill Grant. Routledge, New York. 2006. *Southeastern Geographer*, 49(3), pp. 308–315. <http://muse.jhu.edu/article/271071>.
- 2008 **Sultana, S.** *Spatial Planning, Urban Form and Sustainable Transport*, edited by Katie Williams, Ashgate Publishing Limited, 2005. *Growth and Change*. Vol 39, No 2, pp. 380–382. <https://doi.org/10.1111/j.1468-2257.2008.00428.x>.

- 2008 Sultana, S. "Overcoming the post-tenure blues". University of North Carolina at Greensboro Geography Newsletter.
- 2006 **Sultana, S.** *GIS: Geographic Information Systems for the Social Sciences: Investigating Space and Place*, by Stevens J. Steinberg and Shiela L. Steinberg. Sage Publications, 2006. *Journal of Cultural Geography*, Vol. 24 (1), pp.121–122. <https://doi.org/10.1080/08873630709478219>.
- 2005 **Sultana, S.** *Social Change and Sustainable Transport*, by William R. Black and Peter Nijkamp (eds.), Indiana University Press, 2002. *Annals of the Association of American Geographers*. Vol. 95 (2), pp. 487–489. [https://doi.org/10.1111/j.1467-8306.2005.470\\_8.x](https://doi.org/10.1111/j.1467-8306.2005.470_8.x).
- 2001 Islam, M., Karim, M., Manan, S., and **Sultana, S.** "Management of Urban Air Quality in Bangladesh." in *An Introduction to Bangladesh Environment Network*, Nazrul Islam (eds.). Muktohdhara: Dhaka, Bangladesh.
- 1985 **Sultana, S.** "Small Industries: Towards Solving the Poverty Gaps." Palolik, Departmental working papers, Jahangirnagar University, Dhaka, Bangladesh (in Bengali).

#### **Funded Research:**

- 2018 Visitation and African American underrepresentation in Great Smoky Mountains National Park. PI, \$5,000, Faculty First Grant, UNCG.
- 2017 Tackling Socioeconomic Disparities in North Carolina through Integrated Solutions in Public Health, Education, Housing, and Transportation. Co-PI, \$24,969. University of North Carolina Stage 1 Planning Grant.
- 2016 A Geographic Assessment of Urban Land Use Planning on Households' Energy Use within Fifteen Metropolitan Statistical Areas of NC: A first look at micro scale. PI, \$5000. Faculty First Summer Scholarship, UNCG.
- 2015 A Geographic Assessment of Urban Land Use Planning on Households' Energy Use in Greensboro-High Point Metropolitan Statistical Area: A first look at micro scale. PI, \$3500. Undergraduate Research and Creative Activity Award at University of North Carolina at Greensboro.
- 2013 A Geographical Assessment of the Importance of Route Connectivity for Active Transportation Modes to School. PI, \$2000. Undergraduate Research and Creative Activity Award at University of North Carolina at Greensboro.
- 2012 *A Geographical Assessment of the Importance of Route Connectivity for Active Transportation Modes to School*. PI, \$5,000, Regular Faculty Grant, University of North Carolina at Greensboro.
- 2010 *Where Does the Green Economy Grow?* PI, \$3000, Undergraduate Research Assistantship at University of North Carolina at Greensboro.
- 2010 *Commuting Choices by Immigrants from Less Developed Countries: Are They More Likely Motivated by Environmental Impact or Upward Mobility?* PI, \$3000, Undergraduate Research Assistantship at University of North Carolina at Greensboro.
- 2009 *Students' Residential Built Environment, Accessibility to Campus through the Non-Car*



- Network, and their Association with Parking Decision at the UNCG Campus.* PI, with Mark Schulz, Public Health and Education, \$6,000, Interdisciplinary Undergraduate Research Assistant at University of North Carolina at Greensboro.
- 2009 *GIS for building School Routes in Guilford County Child Development Centers.* PI, \$5,000. Guilford Child Development.
- 2007 *Measuring Accessibility of Bicycle Riders in Greensboro: Searching for a more Sustainable Transport System.* PI, \$2000, Undergraduate Research Assistantship at University of North Carolina at Greensboro.
- 2006 *The Journey to School by K–12 children: Assessing the Needs of a Sustainable School Transport System.* PI, \$4,000, Summer Research Excellence Grant, University of North Carolina at Greensboro.
- 2006 *Measuring Bicycling Accessibility to Work and Shopping Locations for Greensboro Residents.* PI, \$2000, Undergraduate Research Assistantship at University of North Carolina at Greensboro.
- 2005 *Mapping Job–Housing Balance in Sprawl Areas and their Relationship to Commuting Patterns: A Case Study of the Greensboro—Winston–Salem—High Point MSA.* PI, \$4,160, New Faculty Grant, University of North Carolina at Greensboro.
- 2004 *Assessing the Impact of Dual–earner Households on Urban Commuting Flows and their Implications Job/Housing Concept in Urban and Transport Policy.* PI, \$4,000, Summer Research Excellence Grant, University of North Carolina at Greensboro.
- 2004 *Do Information and Telecommunication Technologies Lead to Sustainability or Unregulated Urban Growth? An Assessment.* PI with Dian Hite in Agriculture Economics \$53,286, Auburn University Environmental Institute. (Funded, but declined by the PI due to moving to University of North Carolina at Greensboro)
- 2003 *An Assessment of Urban Sprawl on K–12 School Transportation.* PI, \$10,000, Dean Research Initiative Grant at Auburn University.
- 2003 *The Impact of Sprawl on Commuting.* PI with Joe Weber, \$20,000, University Transportation Center for Alabama at University of Alabama, University of Alabama.
- 2003 *Spatial Analysis and Land Use History in West Georgia.* PI with Josh McDaniel at Forestry, \$88,488, Auburn Peak of Excellence Research, Auburn University.
- 2002 *Cultural Models of the Environment and Land Use Change Along an Urban–Rural Gradient.* Faculty affiliate with Kelly Alley in Anthropology and Josh McDaniel, Forestry, \$50,000, Center for Forest Sustainability, Auburn University. (Funded)
- 2002 *Mapping Change: Using GIS and Remote Sensing for Modeling Sustainable Urban Forms.* PI, \$6,000, Competitive Research Grant at Auburn University.
- 2001 *Sustainable Eufaula Project Grant to Assess Recreation and Environmental Aspects in Eufaula,* Senior Research Faculty with PI Michael Robinson, Department of Landscape Architecture, \$60,000.