Profile: Dr. Eshita Boral

Name: Dr. Eshita Boral Phone number: +91 9830389229

E-mail's: e.boral@cssscal.org, e.boral@gmail.com

Academic Qualifications: M.Sc., Ph.D.

Present Designation/position: Associate Professor in Geography **Specialization:** Urban and Transport Geography

Topics of Interest: Transport Geography, Urban Geography,

Population and Settlement Geography, Social, Cultural and Political Geography, Regional Planning, Statistical Techniques, Quantitative

Techniques

Academic Qualification

- Awarded Ph.D. in the year of 2016 from University of Calcutta
- Passed M.Sc. in Geography from University of Calcutta with 1st class in 2008
- Passed B.Sc. in Geography from Lady Brabourne College under University of Calcutta with 2nd class in 2006
- Passed ISC from Calcutta Girls' High School under Council of Indian School Certificate Examination, New Delhi in 2003

Research Experience:

- Ph.D. thesis on the "Role of Highways in Area Development of West Bengal; A Geospatial Analysis" under University of Calcutta.
- Dissertation on "Calcutta Tramways: Plying Through the Heart of The City till Date" (M.Sc. 2008)
- Field work on "Chamba Town: An Urban Perspective" (M.Sc. Field Project, 2008)
- Field work on the A Passage Through Nainital: Socio-economic Survey of Ward 1 and 2 (B.Sc. Field Project, 2006)

Teaching Experience:

- Department of Geography and Disaster Management, Tripura University: 15.12.2015 30.09.2024
- Worked in Gokhale Memorial Girls' College as Guest Lecturer in Geography from August 2009 to June 2011.
- Taught in Netaji Subhas Open University as Guest Lecturer since August 2013 to 2015

Projects

Completed ICSSR funded Short-term Empirical Research project (Individual) on Pradhan Mantri Bharatiya Janaushadhi Pariyojana (PMBJP) amounting to Rs 5 lakhs as Principal Investigator.

Awards and Scholarships

- University of Calcutta travel grant to present paper in Krakow, Poland in 2014
- UGC travel grant to present paper in IGC conference in Cologne, Germany in 2012
- Attained Senior Research Fellowship in 2011
- Qualified the National Eligibility Test (NET-UGC) with Junior Research Fellowship, 2009

Research Guidance:

• Supervising Ph.D. level research work of four students.

Name	Title of Ph.D. Research	Status
Debasish Kundu	Role of Metro Railway in Mass Transportation Scenario of Kolkata Corporation Area	Awarded
Sajal Ghosh	Road Infrastructure and Traffic Characteristics of Kolkata Municipal Corporation Area: A Geospatial Analysis	Submitted
Bulti Das	Study of Vehicular Pollution and Implementation of Compressed Natural Gas as an Alternative Fuel in Agartala Municipal Corporation	Ongoing
Arti Kumari	A Geographical Study of Gentrification in the City of Lucknow, Uttar Pradesh	Ongoing

• Supervised Master degree dissertation projects since 2016

Administrative and Professional Responsibilities

- Member of BPGS, Department of Geography and Disaster Management, Tripura University
- Member of IQAC, Tripura University (2017-2020)
- Research Advisory Committee (RAC) Member of

Kaushik Panja (Awarded)

Atoshi Chakma and James Dev Verma (Submitted)

Manika Mallick, Deepa Rai, Asif Iqbal Shah, Sudeshna Debbarma, Sudipta Pal Debasis Das Moumita Hati, Pankaj Debbarma, Vajana Mondal (Ongoing)

Publications:

Research papers in referred journals

Reji, A.K., Das, B., Ray, T.K. and Boral, E. (2025) Assessment of compressed natural gas as

- an alternative transportation fuel in reducing CO₂ emissions: A case of Agartala city, Environment, Development and Sustainability, Springer Nature, Vol. 111, 661 666, ISSN 1387-585X; E-ISSN 1573-2975 DOI: https://doi.org/10.1007/s10668-024-05777-x
- Das, B., Reji, A.K., Ray, T.K. and **Boral, E.** (2024) Impact of Compressed Natural Gas in Changing the Air Quality of Agartala City with reference to CO2 Emissions, Chemical Engineering Transactions Vol. 111, 661 666, ISBN 979-12-81206-11-3; ISSN 2283-9216 DOI: 10.3303/CET24111111
- Ghosh, S., Das, B. and **Boral, E.** (2024) GIS-based Assessment of Best route in Complex Traffic Environment: A Case of Kolkata Municipal Corporation, Indonesian Journal of Geography Vol 56, No 2 (2024): 188-197, ISSN 2354-9114 (online), ISSN 0024-9521 (print) DOI: 10.22146/ijg.85478 website: https://jurnal.ugm.ac.id/ijg
- Ghosh, S., **Boral, E.** Das, B. and Ray, T.K. (2024) Impact of Road Geometric Elements and Traffic Characteristics on Vehicular Emissions in Kolkata, Urban India, Vol 44 (I), 16 30, ISSN 0970-9045.
- Kundu, D. and **Boral, E.** (2023). Role of Kolkata Metro in increasing mobility and improving ambient air quality, Urban India, Vol.43. (1), 40 59, ISSN 0970-9045
- Adhikary, M. and **Boral, E.** (2022). An Analytical Study on the Railway Network Connectivity and its association with the Development of Built-up Area in Tripura, India, Indian journal of Spatial Science, Issue 13(4) pp.43 50, ISSN: 2249 3921/ EISSN: 2249 4316
- Kundu, D. and **Boral, E.** (2022). Probability of choice of Transport Modes using Multinomial Logit Model: A case study of Kolkata, India, Geographical Review of India. Vol 84, No. 1&2, 84 103. ISSN 0375-6386
- Das, B. and **Boral, E.** (2020). Assessment of road characteristics of selected north-south and east-west aligned roads within Agartala Municipal Corporation, Tripura, India. Current Science. Vol 19, No. 1, 112 118. ISSN 0011-3891, Impact factor 0.883
- Kundu, D. and **Boral, E.** (2018). Trend of Residential Real Estate Development after Metro Railway extension: A Case Study of some selected wards of south Kolkata. International Journal of Recent Scientific Research. Vol 9, Issue 4(C), 25683 25688. DOI: http://dx.doi.org/10.24327/ijrsr.2018.0904.1908. ISSN 0976-3031
- **Boral, E** and Bhaduri, S. (2015). Nodal Network Analysis to assess the Transport Efficiency through Highways in the state of West Bengal. International Journal of Current Research and Review, Vol 19(1). ISSN 0975-5241.
- **Boral, E.** (2015). The Status of Urban Forestry: A Case of Salt Lake City, ESRI Journal Vol 6 No. 1 &2 pp 102, ISSN 0095-7635.
- **Boral, E.** and Bhaduri, S. (2014). Bus Services along Highways in West Bengal: An Evaluation of the performance of State Transport Corporations, Researchers World Vol V Issue 2(1), pp 11 25, ISSN 2231-4172.
- **Boral, E.** (2013). The Viability of Mass Rapid Transit System: A Case of Kolkata City, Hill Geographer, Vol XXIX:2, 17-32, ISSN 0970-5023
- Boral, E. and Bhaduri, S. (2012). Importance of Highways in Regional Development: A Case

Study of North and South 24 Parganas, West Bengal, Geographical Review of India, Vol 74(1), 71-84, ISSN 0375-6386.

Boral, E. (2012). Tramways – An Eco-Friendly Mode of Mass Transportation : A Case of Kolkata, Researchers World Vol III Issue 3(2), pp 64 – 73, ISSN 2231-4172.

Books/Book chapters/Articles having ISBN/ISSN.

Ray, K, T. Sarkar, P. Das, B. and **Boral, E.** (2023). An Exercise on Valuation on Urban Heritage Site, A comparative study on Victoria Memorial Hall and Indian Museum, Kolkata published by Spinger, Cham, ISBN 978-3-031-31399-8, https://doi.org/10.1007/978-3-031-31399-8_19

Debnath, P. Ghosh, S. Kundu, D. Debnath, J. Ray, K, T. and **Boral, E.** (2023). An assessment of traffic noise level in Agartal Municipal Corporation using Geo-spatial Technology in Tripura, India published by Springer, Cham, ISBN: 978-3-031-21578-2, doi:https//doi.org/10.1007/978-3-031-21578-2_21

Boral, E.; Sarkar, P.; and Ray, K.T. (2023). Intra-Urban Road Characteristics of Siliguri Municipal Corporation with Special reference to Population, in Population Dynamics and Environmental Sustainability published by Manak Publications Pvt. Ltd., New Delhi, ISBN 978-93-91897-57-4

Karmakar S.; **Boral, E.** and Ray, K. T. (2023). Urban Crime Scenario in Kolkata: An Appraisal of Few Selected Crime, in Population Growth, Resource Utilization and Environmental Sustainability, published by Crescent Publishing Corporation, New Delhi, ISBN 978-93-91771-47-8.

Boral, E. and Ray, K. T. (2022). Impact of Covid-19 Pandemic on Lifestyle Changes of Population of Agartala Municipal Corporation, published by Manak Publications Pvt. Ltd., New Delhi, ISBN 978-91897-22-2.

Boral, E. and Bhaduri, S. (2015). Influence of Twenty-Year Road development Plan in bringing about societal and environmental changes in an area: A study along NH 2 and NH 6 published by Kunal Books, New Delhi. ISBN 978-81-932499-6-3.

Boral, E. (2015). Disparities in Road Network Development of Howrah Municipal Corporation in Urban Development in Howrah: Socio-Economic Perspectives published by Primus Books. ISBN 978-93-84082-39-0.

Invited Talks

Invited Lecturer on "Vulnerability in Urban transport Scenario to Sustainable Mobility-An Appraisal of Agartala Municipal Corporation" at Chandernagore College held on March 27, 2022

Invited Speaker at ICSSR sponsored National level Webinar on Population Growth, Resource Utilization and Environmental Sustainability organised by Department of Geography, Surya Sen Mahavidyalaya, Siliguri, West Bengal on 14 – 15, November, 2021.

Paper presented in Seminar/Conference etc.

The 44^{th} IIG Annual Meet and International Conference on Shaping Tomorrow: Society, Culture and Environment in an Interconnected World organized by Department of Geography, Cotton University on January, 22-24, 2024 and presented paper entitled "Estimation of CO_2 Absorbent by Plants based on Woody Biomass Method at the Traffic Intersections of Agartala City"

International Seminar on Recent Advancement in Geographical Studies: A Multidimensional Outlook organized by Department of Geography, Rampurhat College on September 01-03, 2023 and presented paper entitled "Viability of compressed natural gas as an alternative vehicular fuel in Agartala Municipal Corporation: An economic analysis"

International colloquium on Mobility Dialogues: Urban Experiences organized by Department of Geography, Lokmanya Tilak Bhavan, Mumbai on March 20-21, 2023 and presented paper entitled "Empirical assessment of urban traffic congestion on traffic flow analysis in Agartala Municipal Corporation"

International Geographical Union (IGU) Thematic Conference organized by Department of Geography, Central University of Haryana, India on November 24-25, 2022 and presented paper entitled "Sustainable Mobility in Urban Transport: A case of Agartala Municipal Corporation"

42nd IIG Annual Meet 2021 and International E-Conference on Geography for People, Planet, Prosperity and Peace organised by Department of Geography, Savitribai Phule Pune University, Pune and Institute of Indian Geographers on October 04-06, 2021 and presented paper entitled "Role of Eco-friendly Mass Rapid Transit System to attain Sustainable Transport: An Appraisal with reference to Kolkata Metro Railway".

XIV International Geographical Union (IGU)-India organised International Conference on Agriculture, food, water, biodiversity and Health in changing climate on March 6-8, 2020 and presented paper entitled "Travel Behaviour of Agartala Municipal Corporation: A Sustainable Approach".

International Conference on Planning Sustainable Regions: The Social-Economic-Ecological Triad organised by Amity University, Kolkata, on February 13-15, 2020 and presented paper entitled "Role of Metro Railway in Addressing Congestion and Improving Mobility: A case study of Kolkata".

International Conference on Environment, Development and Livelihood organised by South Calcutta Girls' on February 22-23, 2019 and presented paper entitled "Development and Potentiality of Temple Centric Tourism in different Environmental Situation of Indian Sundarban Region"

National seminar Development induced Changes, Environmental Concerns and Sustainable Management organised by Rabindra Bharati University on March, 10-11, 2017 and presented paper entitled "CNG based Vehicle in Agartala Municipal Corporation : A Sustainable mode of Transport"

2 days National Conference on Advances in Interdisciplinary Sciences 2017 (NCAISC 2017) during 27th and 28th of January 2017 at Bhairab Ganguly College and presented poster on "Evaluation of Passengers' Satisfaction on Platform Amenities: A Study of Stations along Sealdah South Division".

International Conference and 48th Regional Science Conference on Rural Habitat, Institutions and Development: Changing Nature and Challenges organised by Tripura University on January 5-7, 2017 and presented paper entitled "Sustainable Living, Methods and Adaptation to Extremes of Climate: A Case study of Phyang Village, Ladakh"

9th International Geographical Union (IGU) Conference on Land Use change, Climate Extremes and Disaster Risk Reduction organised by Shaheed Bhagat Singh College, University of Delhi on March 18-20, 2016 and presented paper entitled "Performance of CNG vehicles in Agartala Municipal Corporation: A drive towards Environmental Sustainability".

International Conference on Urbanisation and Regional Sustainability (47th Annual Seminar of Regional Science Association, India) organized by Department of Geography, University of Calcutta on January 28-30, 2016 and presented paper entitled "Role of elevated roadways in urban mobility to and from Kolkata Municipal Corporation".

National Conference on Hazard, Development and Social Conflict organised by University of Calcutta, March 27-28, 2015 and presented paper entitled "Urban – Industrial Space Expansion Along Highways in West Bengal"

International Geographical Union Regional Conference on Changes, Challenges, Responsibility organised by Jagiellonian University, Krakow, Poland on August 18-22, 2014 and presented paper entitled "The Changing Urban Scenario and the Status of Green Spaces in and around the city of Kolkata"

National Conference on Development and Environmental Transformation organised by University of Calcutta on March 28-29, 2014 and presented paper entitled "Socio-Environmental Impact of Infrastructural Development along National Highways under NHAI"

International Conference of International Geographical Union on Geoinformatics for Biodiversity and Climate Change, Maharshi Dayan and University on March 14-16, 2013 and presented paper entitled "Role of National Highways in Population – Development – Environment Dynamics: A Study along NH 2 and NH 6 in West Bengal"

National Conference of Institute of Indian Geographers on Natural Resource Management and Decentralised Planning, organised by Centre for Earth Science Studies on December 13-15, 2012 and presented paper entitled "Impact of Traffic flows along NH 2 and NH 6 in West Bengal: A study on Convergence and Divergence of services"

32nd International Geographical Congress organised by International Geographical Union, University of Cologne on August 26-30, 2012 and presented paper entitled "The Viability of Mass Rapid Transit System: A Case of Kolkata City"

International Conference on Dimensions of Development and Resource Conservation organised by University of Calcutta on March 10-12, 2012 and presented paper entitled "Transport Efficiency of South Bengal with reference to National Highways"

Eleventh Asian Urbanization Conference organised by Osmania University on December 10-13, 2011 and presented paper entitled "Importance of Highways in Regional Development: A Case Study of North and South 24 Parganas, West Bengal"

33rd Indian Geography Congress organised by National Association of Geographers, India, University of Burdwan on November 11-13, 2011 and presented paper entitled "The Circular Railway: Its Viability within the Transport Scenerio of Kolkata"

National Seminar on National Resource Management organised by University of Calcutta on March 10-11, 2011 and presented paper entitled "The Status of Urban Forestry: A Case of Salt Lake City"

National Seminar on Applied Geography: Issues and Techniques organised by University of Calcutta, January 14-15, 2011 and presented paper entitled "An Analysis of Road Network Development of Howrah Municipal Corporation"

Indian Geography Congress organised by National Association of Geographers, India, at University of Chandigarh on November 19-21, 2010 and presented paper entitled "Road Network Development: A Case of Howrah Municipal Corporation"

National Seminar on Ganga Delta: Planning Perspectives organised by University of Calcutta on March 12-13, 2010 and presented paper entitled "Urban Parks in Kolkata – A Planning Perspective"

International Conference of Institute of Indian Geographers on Environment, Agriculture and Food Security organised by University of Bangalore on February 19-21, 2010 and presented paper entitled "The Changing Urban Scenerio and the Status of Green Spaces"

Conference of Indian Geographical Foundation on Contemporary Issues in Geography held on February 27-28, 2009 and presented paper entitled "Perspectives of Sustainability of Tramcars in Kolkata"

30th Annual conference of Institute of Indian Geographers organised by University of Pune, Pune on February 2009 and presented paper entitled "Tramways as an Eco-friendly Transport mode : A Case of Kolkata City :"

Conference/Workshop Organized

Organizer

• Organization of Community Workshop as Convener on PMBJP

Session Chair

 Acted as chair person in the ICSSR funded national webinar organized by Surya Sen Mahavidyalaya.

Membership of Learned Academic Bodies/ organisations:

- Life Member of the Institute of Indian Geographers (IIG), Pune,
- Life Member of the Geographical Society of India, Kolkata.
- Life Member National Association of Geographers, India (NAGI)

Country Visited for Academic and Research Purpose:

Germany (2012), Poland (2014)

Technical Skills:

- Survey using Global Positioning System
- Computer Skills
 - Operating Systems : Windows 98, Windows XP
 - Software: MS Word, MS Excel, Powerpoint, MS Access, HTML
 - Specialized Mapping Software : Mapinfo, 21st Century, QGIS, ArcGIS

Additional Qualification:

- Computer course from DOEACC Centre, Kolkata.
- Learnt German from Max Mueller Bhavan, Kolkata.