

Nizam Uddin
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EDUCATION

Ph. D., Old Dominion University, Virginia, USA, 1989.
M. Sc., University of Saskatchewan, Canada, 1985.
M. Sc., University of Dhaka, Bangladesh, 1979.
B. Sc., University of Dhaka, Bangladesh, 1977.

TEACHING EXPERIENCE

University of Central Florida (August 2001 to present)
Tennessee Technological University (August 1994 to July 2001)
University of Southern Maine (September 1989 to July 1994)

AWARDS AND RECOGNITIONS

COS Awards:

- Teaching Incentive Program (TIP) Awards- 2025, 2011
- Recognized for contributions to outstanding instruction in the College of Sciences, 2023.
- Research Incentive Award (RIA) - 2009

Digital Curriculum Innovation Award

“Redesigning Large-Enrollment Online Course STA 2023-Statistical Methods I Using Personalized Adaptive Learning”, PI- Nizam Uddin, Co-PI Rong Zhou, Funded for \$28,000.00. May 2023 to June 2025.

AIM Initiative Participant:

Recognized for participating in Affordable Instructional Materials (AIM) Initiative program 2021, 2022, 2023, 2024.

Student Paper Awards

The following students received best paper awards for their presentations (I am co-author of these papers):

- “A Regional Corridor-Level Approach to Predict Wrong-Way Driving Crashes and Identify Wrong-Way Driving Hotspots on Florida Arterials, Presented by Shahad Ibrahim; Other authors: Adrian Sandt, Haitham Al-Deek, John McCombs, and Nizam Uddin, University of Central Florida. Transportation Research Board Annual Meeting, Washington D.C., January, 2025.
- “Best TRB Freeway Operations Committee Young Professional/Student Paper Award, 2022”. Paper title “Using Wrong-Way Driving Detection Data to Identify Factors that Affect Wrong-Way Driving Behavior and Compare Detection Technologies”. Authors: Adrian Sandt, Haitham Al-Deek, Ph.D., P.E., Nizam Uddin, Eric Ginsberg, **John McCombs**, Angel Lopez Sanchez. Presented by **John McCombs**.
- “Best TRB Freeway Operations Paper Award, 2019”. Paper title “Modeling wrong-way driving entries at limited access facility exit ramps in Florida”. Authors: **Md Imrul Kayes**, Haitham Al-Deek, Adrian Sandt, and Nizam Uddin. Presented by **Md Imrul Kayes**.

- “Best TRB Freeway Operations Paper Award”, 2015”. Paper title “Wrong Way Driving Multifactor Risk-Based Model for Florida Interstates and Toll Facilities”. Authors: **John Rogers**, Adrian Sandt, Haitham Al-Deek, Ahmad Alomari, Nizam Uddin, Eric Gordin, Cristina Santos, Jessica Renfrow, Grady Carrick. Presented by **John Rogers**.

TEACHING DEVELOPMENT

Successfully completed FCTL’s online courses and participated in multiple training to gain knowledge and skills to create open educational materials and webcourses that are accessible to all students. In particular, I have developed one PAL course, three fully online courses that received CDL’s ”Quality Rating”. A brief description of developed courses and training sessions are displayed below.

PAL Course:

Developed one Personalized Adaptive Learning (PAL) section for our STA - 2023 (Statistical Methods I). I served as team leader in developing this course and have been teaching this PAL course in large sections of about 450 students since Fall, 2024. The course contents are prepared in such a way that no textbook is required (need only free open educational resources).

Online Courses with Quality Designations:

Developed the following three ”Quality Online Courses” that have met the evidence-based criteria necessary to be recognized within the State University System of Florida as Quality Online Courses.

- STA 2023-Statistical Methods I, 2021. Received CDL’s Quality online course designation badge.
- STA 6236-Regression Analysis, 2021. Received CDL’s Quality online course designation badge.
- STA 5206-Statistical Analysis, 2021. Received CDL’s Quality online course designation badge.

Training:

- Received certificate for successfully completing PAL6000 (Personalized Adaptive Learning Course) and the criteria for delivering personalized adaptive learning courses as established by the University of Central Florida, 2023.
- Received certificate for successfully completing TLC-z Teaching with Lecture Capture”, 2020.
- Received certificate for successfully completing IDL6543 offered by Center for Distributed Learning.

Teaching Related Workshops and Conference Sessions:

- Attended 12th Annual Big Data Analytics Symposium, March 24, 2025, UCF Campus.
- Attended 2025 ASA Annual Florida Chapter Meeting, Feb 7- 8, 2025, UCF Campus.
- Attended HIP course designation workshop, January, 2025, FCTL, UCF Campus.
- Attended UCF Digital Learning Day Conference, April 14, 2023
- Attended a workshop session on Using ChatGPT as a Tool to Help Students , Teaching and Learning Day, March 6, 2023 organized by FCTL, UCF.
- Attended an online instructor training session on Exam Integrity Across the Entire Campus Offered by Respondus UCF, 2021.
- Attended a session on Keep Teaching- Online Grading: Are You Ready?, 4/10/2020, UCF.
- Attended a course evaluation/transfer training session on April 24, 2020, UCF.
- Attended a session on Instructor Training for Lockdown Browser and Respondus Monitor: Prevent Cheating During Online Exams Offered by The Training Team at Respondus thru UCF. May 5, 2020.
- Attended a lecture session on Active Learning Across Modalities: Techniques for Fostering Active Learning in Online Courses, March 27, 2019. UCF Faculty Multimedia Center/FMC.
- Attended a session on Using MyStat lab to Encourage Active Learning Using the Adaptive Features of MyStat Lab: Interactive Statistics MyStat Lab Course offered by Pearson, March 20, 2019.
- Attended a session on Active Learning (Mathematics), May 7, 2018. Florida University System Mathematics Action Planning Conference organized by SUS Board of Governors.
- Attended a session on Mathematics Action Planning, May 7, 2018. Florida University System Mathematics Action Planning Conference organized by SUS Board of Governors.
- Attended a session on ALTA- Knewtons fully integrated adaptive learning course ware, March 30, 2018.
- Attended several sessions on MyStatLab with Pearson Techs and representatives during this Tip Cycle to learn and effectively use MyStatLab and Mastering modules associated with our STA 2023 course.

- Attended a conference session on "Clicker in Statistics Classes organized by American Statistical Association in its 2011 annual meeting in Miami, Florida.

ADVISING ACTIVITIES

- **Undergraduate Coordinator of two programs: Statistics and Actuarial Science**

Responsibilities: Advise all majors and minors (Statistics as well as Actuarial Science), maintain extra office hours for students during orientation (FTIC and Transfer) sessions, evaluate and certify degree audits for graduation, evaluate courses of other institutions for their UCF course equivalencies, respond to numerous emails and phone calls regarding major, minor and course equivalencies/substitutions, etc.

- **Mentoring:**

Served as mentor of junior tenure track faculty. Responsibilities: Visit lectures and provide feedback on teaching, advise on tenure and promotion process and offer tips for success.

- **Supervision of graduate teaching assistants**

Supervised activities (grading, proctoring, office hours, etc.) of several graduate teaching assistants (approximately two per year).

- **Thesis/dissertation Committee Services**

Chaired three thesis committees in our department, and served on many thesis/dissertation committees of students of other disciplines. More details about these students are displayed below :

Student, Department, Type of Thesis/Dissertation

Kazi Salsabil, Psychology, Honors Thesis
 Victor Nkwocha, Statistics and Data Science, PhD
 Thien Pham, Statistics and Data Science, MS
 Shahad Ibrahim, Civil, Environmental and Construction Engineering, PhD
 John McCombs, Civil, Environmental and Construction Engineering, PhD
 Fahmida Akhter, Statistics and Data Science, MS
 Ghalia Gamaleldin, Civil, Environmental and Construction Engineering, PhD
 Patrick Blue, Civil, Environmental and Construction Engineering, MS
 Ryan Rust, Industrial Engineering and Management Systems, PhD
 Lishengsa Yue, Civil, Environmental and Construction Engineering, PhD
 Hazhar Blbas, Statistics and Data Science, MS
 Dawn Turnage, College of Nursing, DNP
 Kandis Natoli, College of Nursing, DNP
 Charles Harris, Modeling and Simulation, PhD
 Lolita Melhado, College of Nursing, DNP
 Faraz Hussain, Computer Science, PhD
 Taylor Lochrane, Civil, Environmental and Construction Engineering, PhD
 Frank Consoli, Civil, Environmental and Construction Engineering, PhD
 Ling Wang, Civil, Environmental and Construction Engineering, PhD
 Yahya Alassaf, Civil, Environmental and Construction Engineering, PhD
 Zain Al-Kofahi, Civil, Environmental and Construction Engineering, PhD
 Nowreen Keya, Civil, Environmental and Construction Engineering, PhD
 Md Moshir Rahman, Civil, Environmental and Construction Engineering, PhD
 Md Omar Faruk, Civil, Environmental and Construction Engineering, MS
 John Rogers, Civil, Environmental and Construction Engineering, PhD
 Zia Rahman, Civil, Environmental and Construction Engineering, PhD
 Md Imrul Kayes, Civil, Environmental and Construction Engineering, PhD
 Ahmad Mohamed, Civil, Environmental and Construction Engineering, PhD
 Saif Alarifi, Civil, Environmental and Construction Engineering, PhD
 Meshal Almoshaogeh, Civil, Environmental and Construction Engineering, PhD

COURSES TAUGHT

Undergraduate Courses:

Statistical Methods I- STA 2023
Statistical Methods III- STA 4164
Sample Survey- STA 4222
HON Statistical Methods I- STA 2023H
Statistical Methods II- STA 4163
Statistical Graphics- STA 3096
Computer Processing of Statistical Data- STA 4102
Biostatistical Methods- STA 4173

Graduate Courses:

Fundamental Data Analytical Methodology with Business Applications - STA 5735
Business Analytics Statistics - STA 6136
Regression Analysis - STA 6236
Logistic Regression Analysis- STA 6238
Statistical Analysis- STA 5206
Experimental Design- STA 5205
Nonlinear Regression - STA 6237
Nonparametric Methods- STA 6507
Categorical Data Methods-STA 5505
Advanced Statistical Inference I - STA 6938
Advanced Statistical Inference II - STA 6347

RESEARCH PUBLICATIONS

JOURNAL PAPERS WITH STUDENTS (student name in bold format)

- 2025 “A Regional Corridor-Level Approach to Predict Wrong-Way Driving Crashes and Identify Wrong-Way Driving Hotspots on Florida Arterials”, **Shahad Ibrahim**, Adrian Sandt, Haitham Al-Deek, John McCombs, Nizam Uddin. Accepted for publication in *Transportation Research Record: Journal of the Transportation Research Board*.
- 2024 “Identifying Corridor-Level Safety Improvements for Urban and Suburban Arterials in Florida Within a Safe System Framework”, **John McCombs**, Haitham Al-Deek, Adrian Sandt, Nizam Uddin, Grady Carrick. Accepted for publication in *Transportation Research Record: Journal of the Transportation Research Board*. OnlineFirst <https://doi.org/10.1177/0361198124123491>.
- 2022 “Transfer Function Model for COVID-19 Deaths in USA using Case Counts as Input Series, **Fahmida Akter Shahela** and Nizam Uddin, *Bulletin of the Malaysian Mathematical Sciences Society (BMMS)- A special issue on "Marginal, Conditional and Joint Modeling Framework for Big Data Analysis: A Tribute and Memorial to M. Ataharul Islam"*, Volume 45, pp 461475.
- 2022 “Using Wrong-Way Driving Detection Data to Identify Factors that Affect Wrong-Way Driving Frequency and Behavior and Compare Detection Technologies”, **Adrian Sandt**, Haitham Al-Deek, Ph.D., P.E., Nizam Uddin, Eric Ginsberg, **John McCombs**, Angel Lopez Sanchez. *Transportation Research Record: Journal of the Transportation Research Board*, Volume 2676, Issue 7, pp 434-444.
- The above paper was selected to receive the “Best TRB Freeway Operations Committee Young Professional/Student Paper Award - 2022”.

- 2022 “Analyzing Disabled Vehicle Incident Durations and Crash Response to Identify Service Patrol Expansions and Reduce the Need for Law Enforcement Involvement, **John McCombs**, Haitham Al-Deek, Adrian Sandt, Grady Carrick, Nizam Uddin. *Transportation Research Record: Journal of the Transportation Research Board*, Volume 2676, Issue 7, pp 630-641.
- 2022 “Developing Context-Specific Safety Performance Functions for Florida Intersections to More Accurately Predict Intersection Crashes, **Ghalia Gamaleldina**, Haitham Al-Deeka, Adrian Sandta, John McCombsa, Alan El-Urfalib, Nizam Uddin. *Transportation Research Record: Journal of Transportation Safety and Security* Vol 14, pp 607-629.
- 2020 “Comparing two means using partially paired and unpaired data, Nizam Uddin and **M. S. Hasan**, *Journal of Statistical Theory and Applications*.19(2), 238 - 247
- 2019 “Modeling wrong-way driving entries at limited access facility exit ramps in Florida”, **Md Imrul Kayes**, Haitham Al-Deek, Adrian Sandt, and Nizam Uddin. *J. Transportation Research Board*, 2673, 567576
- **The above paper won the ”Best TRB Freeway Operations Paper for the Year 2019”** (Email copies of the award notification is attached in the supporting materials section). The student completed the Ph.D. and is now holding a senior engineering position in Jacob Engineering Company in Florida.
- 2017 “Testing equality of two normal means using combined samples of paired and unpaired data, Nizam Uddin and **M. S. Hasan**, *Commun. Statis.- Simulation and Computation*, 46, 2430-2446.
- **The above student graduated from our department with an MS degree in Statistics and recently completed his Ph.D. from the University Georgia. He is now holding a senior statistician position in Johnson & Johnson Company.**
- 2017 “Longitudinal study of stress, social support, and depression in married Arab immigrant women”, Karen Aroian, Nizam Uddin & **Hazhar Blbas**, *Health Care for Women International*, 38, 100-117. International Refereed Journal.

OTHER JOURNAL PAPERS

- 2017 Airline Ancillary Services: An Investigation into Passenger Purchase Behavior, Steven Leon and Nizam Uddin, Revised version accepted and Published during this reporting period in the Journal of the Transportation Research Forum, 56, vol 1. International Refereed Journal.
- 2017 Data-Driven Insights: Assessment of Airline Ancillary Services, Steven Leon and Nizam Uddin, Submitted, accepted and published during this reporting period in the Journal of the Transportation Management, 27, Vol 2. International Refereed Journal.
- 2017 “Longitudinal study of stress, social support, and depression in married Arab immigrant women”, Karen Aroian, Nizam Uddin & **Hazhar Blbas**, *Health Care for Women International*, 38, 100-117. International Refereed Journal.
- 2016 “Finding Supply Chain Talent: An Outreach Strategy”, Steve Leon and Nizam Uddin, *Supply Chain Management- International Refereed Journal*, 21, 1, 20-44
- 2015 “Predictors of Intention to Refer to Pediatric Palliative or Hospice Care, Norma Conner and Nizam Uddin, *American Journal of Hospice and Palliative Care*, 1-8.
- 2015 “Stress, Social Support and Depression in Arab Muslim Immigrant Women in the Detroit Area of the United States, Karen Aroian, Nizam Uddin and Darshana Ullah. In: Nazilla Khanlou and F. Berry Pilkington

(Ed), *Women's Mental Health: Resistance and Resilience in Community and Society*, Springer International Publishing Switzerland 2015, 69-81.

- 2015 "Wrong Way Driving Multifactor Risk-Based Model for Florida Interstates and Toll Facilities, John Rogers, Adrian Sandt, Haitham Al-Deek, Ahmad Alomari, Nizam Uddin, Eric Gordin, Cristina Santos, Jessica Renfrow, Grady Carrick, *Transportation Research Record: Journal of the Transportation Research Board*.
 - The above paper won the "Best TRB Freeway Operations Paper for the Year 2015" The student completed the Ph.D. and is now holding a senior engineering position in Alabama Department of Transportation.
- 2014 "Nursing student end-of- life attitudes after an online death and dying course, Norma Conner, Vicky Loerzel, and Nizam Uddin, *Journal of Hospice and Palliative Nursing*, 2014, 16, 374-382.
- 2014 "Tigecycline for severe clostridium diffivile infection, Ashley Thomas, Farhan Khan, Nizam Uddin and Mark R. Wallace. *International Journal of Infectious Diseases*, 2014, 26, 171-172.
- 2012 "Use of Locking Plate and Screws in the Triple Pelvic Osteotomy Procedure, Scott Rose, Ken Bruecker, Steve Petersen and Nizam Uddin, *Veterinary Surgery*, 41, 2012, 114-120. International Refereed Journal.
- 2012 "Effect of Locking Triple Pelvic Osteotomy Plate on Screw Loosening in 26 Dogs, Scott Rose, Jeffrey Peck, Cheryl Tano, Nizam Uddin, and Jacek Haan, *Veterinary Surgery*, 41, 2012, 156-162. International Refereed Journal.
- 2012 "Alteration of brain water content in H-Tx hdrocephalic rat, Rammling, Uddin, Paul, Madan, and Pattisapu. *Journal of Neurosurgery: Pediatrics*. In review.
- 2011 "Comparison of Some Series of Binary and Nonbinary Balanced Nested Row-Column Designs for Correlated Errors, Nizam Uddin, *JSM Proceedings of American Statistical Association*, Miami, FL, 4386-4397, 2011.
- 2011 "Comment on An alternative proof of the number og m-flats n-dimensional finite Projective Geometry formed from Galois Field $G. F. (p^n)$, where p is a prime number and n is a positive integer, By Q. M. Hossain, Nizam Uddin, Nova Science, New York, 2011..
- 2011 "Should a Cardiologist be the Principal Attending Physician or the Consultant to a Hospitalist or General Internist for Cardiovascular Disease Admissions?", Everett G. D. and Uddin, N., *American Heart Hospital Journal*, 9, 2011, 81-86. International Refereed Journal.
- 2011 "Two constructions for neighbor balanced block designs with nested rows and columns", **Nizam Uddin**, *Journal of statistical Theory and Applications* 10, 347-356. (International refereed journal)
- 2010 "Colistin Dosing and Nephrotoxicity in a large community teaching hospital, DeRyke, Crawford, Uddin, Wallace. *Antimicrobial Agents and Chemotherapy*, 54, 4503-4505. (Refereed Journal of American Society of Microbiology).
- 2010 "Beta-blocking drug use in cocaine abusers: is it safe and effective therapy in hospitalized patients? , Everett G. D., Uddin, N. and others. *Journal of Investigative Medicine*, 58, 357-357 (Meeting Abstract).
- 2008 "Optimal block designs for three treatments when observations are correlated", **Nizam Uddin**, *Journal of statistical Planning and Inference*, 138, 1960-1966. (International refereed journal)
- 2008 "MV-Optimal block designs for correlated errors", **Nizam Uddin**, *Statistics & Probability Letters*, 17, 2926-2931. (International refereed journal)

- 2008 “Optimality and efficiency of small chessboard designs for correlated errors”, **Nizam Uddin**, *Metrika*, 68, 343-350. (International refereed journal)
- 2008 “E-optimal designs when errors follow a conditional autonormal process”, **Nizam Uddin**, *Linear Algebra and Its Applications*, doi:10.1016/j.laa.2008.09.009. (International refereed journal).
- 2008 “MV-Optimal designs for three treatments when observations are correlated”, **Nizam Uddin**, Accepted for publication in *Sankhya, Series B*, - The Indian Journal of Statistics, 70, 113-120. (International refereed journal).
- 2008 “When should a cardiologist seek hospital co-management support from a hospitalist or general internist?”, George Everett and Nizam Uddin, Accepted for publication in *The American Heart Hospital Journal*. (International refereed journal).
- 2007 “Neighbor properties of some classes of *BIBRCs* and their efficiencies for correlated errors”, **Nizam Uddin**, *Journal of Statistical Planning and Inference*, 137, 1669-1680. (International refereed journal)
- 2007 “Pilot-scale verification and analysis of iron release flux model”, Mutoti, Dietz, Imran, **Nizam Uddin**, and Taylor, *ASCE Journal of Environmental Engineering*, 133, 173-179. (International refereed journal)
- 2007 “Comparison of Hospital costs and length of stay for community internists, hospitalists, and academicians”, George Everett, **Nizam Uddin**, and Beth Rudloff, *Journal of General Internal Medicine*, 22, 662-667. (International refereed journal)
- 2007 “Serum and Forskolin Cooperate to Promote G1 Progression in Schwann Cells by Differentially regulating Cyclin D1, Cyclin E1 and p27Kip Expression”, Iacovell, Lopera, Bott, Baldwin, Khaled, **Uddin** and Fernandez-Valle, *GLIA*, 55, 1638-1647. (International refereed journal)
- 2007 “A note on E-optimal incomplete block designs for correlated observations, **Nizam Uddin**, *Journal of Statistical Studies*, 2007, 26, 139-142.
- 2006 “Occurrence of infected amoebae in cooling towers compared with natural aquatic environments: implications for emerging pathogens”, *ACS Journal: Environmental Science and Technology*, Berk, Gunderson, Newsome, Farone, Hayes, **Uddin**, Williams, Johnson, Farsian, Reid, Skimmyhorn, Farone; *Environ. Sci. Technol.*; 2006; 40(23); 7440-7444. (International refereed journal)
- 2005 “Universally optimal structurally balanced row column designs with some empty nodes”, **Nizam Uddin**, *Journal of Statistical Planning and Inference*, 133, 509-522. (International refereed journal)
- 2005 “Constructions of some classes of neighbor balanced designs”, **Nizam Uddin** and M. Hanif Talukder, *Ars Combinatoria: Australian-Canadian Journal of Combinatorics*, 74, 275-289. (International refereed journal)
- 2005 “Split models for predicting multivehicle crashes during high-speed and low-speed operating conditions on freeways”, M. Abdel-Aty, **Nizam Uddin** and Anurag Pande, *Transportation Research Record - Journal of the Transportation Research Board No.-1908*, pp 51-58. International Refereed Journal.
- 2005 “Traffic surveillance from a safety perspective: An ITS data application”, M. Abdel-Aty, Anurag Pande and **Nizam Uddin**, *Proceedings of the 8th International IEEE Conference on Intelligent Transportation Systems (ITSC2005)*, Vienna, September, 2005 (Refereed, published in CD).
- 2005 “Proactive real-time safety implementation strategy on freeways”, M. Abdel-Aty, Anurag Pande, and **Nizam Uddin**, , *Proceedings of the 13th International Conference on Road Safety on Four Continents*, Warsaw, October, 2005 (Refereed, published in CD).

- 2005 “Improving safety and security by developing a traffic accident prevention system”, M. Abdel-Aty, **Nizam Uddin** and Anurag Pande, Proceedings of the first International Conference on Safety and Security Engineering, Rome, Italy, June, 2005 (Refereed, published in CD).
- 2004 “Comparison of hospital Cost and length of stay associated with general internist and hospitalist physicians at a community hospital”, George Everett, Anton, Jackson, Swigert, and **Nizam Uddin**, *The American Journal of Managed Care*, 10, 626-630. (International refereed journal)
- 2004 “Predicting free-way crashes based on loop detector data using matched case-control logistic regression” Abdel-Aty, **Nizam Uddin**, Fathy Abdalla, and Anurag Pande, *Transportation Research Record - 1897: Journal of Transportation Research Board*, 88- 95. (International refereed journal)
- 2004 “A Behavior Checklist Comparative Investigation of the Speech-Associated Coping Responses of Persons who do and do not Stutter”, Martinee Vanryckeghem, Gene Brutton, **Nizam Uddin**, and John Borsel, *Journal of Fluency Disorders*, 29, 237-250. (International refereed journal)
- 2004 “Two series constructions of nearest neighbor balanced *BIBRCs*”, **Nizam Uddin**, *Pak. J. Statistics*, 20, 123-128.
- 2003 “Ethnic Identity, Self-Esteem, and Ethnocentrism: A Study of Social Identity Versus Multicultural Theory of Development”, Charles Negy, Tara Shreve, Bernard Jensen and **Nizam Uddin**, *Cultural Diversity and Ethnic Minority Psychology*, 9, 333-344. (International refereed journal)
- 2003 “Optimal row-column designs for two treatments”, John P. Morgan and **Nizam Uddin**, *Journal of Statistical Planning and Inference*, 115, 603-622. (International refereed journal)
- 2002 “A method of construction of a class of universally optimal structurally incomplete row-column designs”, **Nizam Uddin**, *Statistics & Probability Letters*, 59, 93-98. (International refereed journal)
- 2002 “A note on optimal design in $3 \times q$ blocks with correlated errors”, **Nizam Uddin**, *Jahangirnagar University Studies*, Special Volume, 219-213.
- 2000 “Optimal cylindrical-block designs for correlated observations”, **Nizam Uddin**, *Journal of Statistical Planning and Inference*, 84, 2000, 323-336. (International refereed journal)
- 1999 “Efficient block designs for settings with spatially correlated errors- Errata”. **Nizam Uddin** and John P. Morgan. *Biometrika*, 86, 1999, 233. (International refereed journal)
- 1999 “A class of neighbor balanced block designs and their efficiencies for spatially correlated errors”, John P. Morgan and **Nizam Uddin**, *Statistics*, 32, 1999, 317-330. (International refereed journal)
- 1999 “Some E-optimal partially balanced nested row-column designs with unequal block sizes”, **Nizam Uddin**, *Calcutta Statistical Association Bulletin*, 49, 1999, 41-54. (International refereed journal)
- 1999 “On optimal row-column designs for two treatments”, David Caughran and **Nizam Uddin**, *Journal of Statistical Research*, 33, 1999, 27-34.
- 1998 “On optimal two-period repeated measurements designs”, **Nizam Uddin**, *Communications in Statistics-Theory and Methods*, 27, 1998, 827-837. (International refereed journal)
- 1997 “Universally optimal designs with blocksize $p \times 2$ and correlated observations”. **Nizam Uddin** and John P. Morgan. *Annals of Statistics*, 25, 1997, 1189 - 1207. (International refereed journal)

- 1997 “Efficient block designs for settings with spatially correlated errors”. **Nizam Uddin** and John P. Morgan. *Biometrika*, 84, 1997, 443-454 (International refereed journal)
- 1997 “Optimal partially balanced nested row-column designs”, **Nizam Uddin**. *Journal of Statistical Planning and Inference*, 60, 1997, 351-366. (International refereed journal)
- 1997 “Further constructions for orthogonal sets of balanced incomplete block designs with nested rows and columns”, **Nizam Uddin** and John P. Morgan, *Sankhya*, B, 59, 1997, 156-163. (International refereed journal)
- 1997 “Orthogonal sets of balanced incomplete block designs with nested rows and columns”, John P. Morgan and **Nizam Uddin**. *Journal of Statistical Planning and Inference*, 59, 1997, 360-378. (International refereed journal)
- 1997 “Equireplicate balanced block designs with nested rows and columns with at most two distinct block sizes”. **Nizam Uddin**, Q. Chen and S. A. Patil. *Utilitas Mathematica - A Canadian Journal of Discrete and Applied Mathematics*, 52, 1997, 49-64. (International refereed journal)
- 1997 “Row-column designs for comparing two treatments in the presence of correlated errors”, **Nizam Uddin**, *Journal of Statistical Research*, 31, 1997, 75-81.
- 1996 “E-optimal incomplete block designs with two distinct block sizes”, **Nizam Uddin**. *Journal of Statistical Planning and Inference*, 55, 1996, 235-248. (International refereed journal)
- 1996 “Optimal blocked main effects plans with nested rows and columns and related designs”, John P. Morgan and **Nizam Uddin**. *Annals of Statistics*, 24, 1996, 1185-1208. (International refereed journal)
- 1996 “On MV -optimal incomplete block designs with unequal block sizes ”. **Nizam Uddin** and Leiming Li. *Metron*, 30, 1996, 195-205. (International refereed journal)
- 1995 “The robustness of binary and non-binary nested row-column designs under the unavailability of blocks : a comparison”, **Nizam Uddin** and Dexter C. Whittinghill. *The Australian Journal of Statistics*, 37, 1995, 111-124. (International refereed journal)
- 1995 “E-optimal nested row-column designs with unequal replications of treatments”, **Nizam Uddin** and S. A. Hossain. *Sankhya - The Indian Journal of Statistics, Series B*, 57, 1995, 112-121. (International refereed journal)
- 1995 “On recursive construction for balanced incomplete block designs with nested rows and columns ”. **Nizam Uddin**. *Metrika - International Journal of Theoretical and Applied Statistics*, 42, 1995, 341-345. (International refereed journal)
- 1995 “Optimal, Non-Binary, Variance Balanced Designs”. John P. Morgan and **Nizam Uddin**. *Statistica Sinica*, 5, 1995, 535-546. (International refereed journal)
- 1993 “Optimality and construction of nested row and column design”. John P. Morgan and **Nizam Uddin**. *Journal of Statistical Planning and Inference*, 37, 1993, 81-93. (International refereed journal)
- 1993 “On mutually orthogonal and totally balanced sets of balanced incomplete block designs with nested rows and columns”. John P. Morgan and **Nizam Uddin**, *Statistica Sinica*, 3, 1993, 435-451. (International refereed journal)

- 1992 “Constructions for some balanced incomplete block designs with nested rows and columns”. **Nizam Uddin**. *Journal of Statistical Planning and Inference*, 31, 1992, 253-261. (International refereed journal)
- 1992 “Optimal block designs with maximum blocksize and minimum replication constraints”, **Nizam Uddin** and John P. Morgan, *Communications in Statistics*, 21(1), 1992, 179 - 195. (International refereed journal)
- 1991 “Two dimensional design for correlated observations”. John P. Morgan and **Nizam Uddin**. *Annals of Statistics*, 19, 1991, 2160-2182. (International refereed journal)
- 1991 “Optimal and near optimal sets of Latin squares for correlated errors”, **Nizam Uddin** and John P. Morgan, *Journal of Statistical Planning and Inference*, 29, 1991, 279-290. (International refereed journal)
- 1991 “Two constructions for balanced incomplete block designs with nested rows and columns”, **Nizam Uddin** and John P. Morgan. *Statistica Sinica*, 1, 1991, 229-232. (International refereed journal)
- 1990 “Some constructions of balanced incomplete block designs with nested rows and columns”, **Nizam Uddin** and John P. Morgan. *Biometrika*, 77, 1990, 193-202. (International refereed journal)
- 1990 “Some series constructions for minimal size equineighboured balanced incomplete block designs with nested rows and columns”, **Nizam Uddin**, *Biometrika*, 77, 1990, 829 - 833. (International refereed journal)
- 1990 “Some constructions for rectangular, Latin square and pseudocyclic nested row-column designs”, J. P. Morgan and **Nizam Uddin**, *Utilitas Mathematica*, 38, 1990, 43-51. (International refereed journal)

PRESENTATIONS

- “Optimal block designs for three treatments when observations are correlated”. International Conference on *Designed Experiments: Recent Advances in Methods and Applications*, August 11-15, 2008, Isaac Newton Institute for Mathematical Sciences, Cambridge, UK.
- “Optimal block designs for correlated observations”. International Conference on Interdisciplinary Mathematical and Statistical Techniques, May 16-18, 2008, Memphis, Tennessee.
- “E-optimal designs when errors follow conditional autonormal process”, The 16th International Workshop on Matrices and Statistics, University of Windsor, Canada, June 1-3, 2007.
- “Some optimal designs for two treatments in row-column settings with correlated errors, International Conference on Design of Experiments, May, 2005, Memphis, Tennessee.
- “Neighbor Properties of some classes of *BIBRC*s and their efficiencies for correlated errors”, International Conference on Statistics, Combinatorics and Related Areas, Portland, Maine, USA, October 3- 5, 2003.
- “Some contributions to the optimality and construction of design of experiments”. 1st North American New Researchers Conference, Berkeley, California, August, 1993.
- “Optimal cylindrical-block designs for correlated observations”. Forum for Interdisciplinary Mathematics, Mobile, Alabama, 1999.
- “Optimal partially balanced nested row-column designs”. Presented at IMS Eastern Regional Meeting and International Biometric Society Spring Meeting, Birmingham, Alabama, March 25-29, 1995.

- “Efficient block designs for settings with spatially correlated errors”. IMS Eastern Regional Meeting, Richmond, Virginia, March 17-20, 1996.
- “ON E -optimal incomplete block designs ”, The 4-th New England Statistics Symposium, April-1990.
- “A method for the construction of balanced incomplete block designs with nested rows and columns ” The 218th meeting of the Institute of Mathematical Statistics, Philadelphia, June/91, and Joint Statistical Meetings of the American Statistical Association, the Institute of Mathematical Statistics and the Biometric Society, Atlanta, August/91.
- “On E -Optimal incomplete block designs with unequal block sizes ”, The 6-th New England Statistics Symposium, April-1992.
- “ E -optimal incomplete block designs with two distinct block sizes” Joint Meetings of The Biometric Society, American Statistical Association, and the Institute of Mathematical Statistics, Philadelphia, March/92.
- “On recursive construction for balanced incomplete block designs with nested rows and columns ” Joint Statistical Meetings of the American Statistical Association, the Institute of Mathematical Statistics and the Biometric Society, Boston, August/92.
- “Optimal block designs for three treatments with correlated errors, Department of Statistics, Dhaka University, Bangladesh, July 2007.
- “Optimal block designs for three treatments with correlated errors, Department of Statistics, Jahangirnagar University, Bangladesh, July, 2007.
- “Statistically Designed Experiments - An Introduction”, Department of Biology, UCF, October, 2004.
- “Optimal two-period repeated measurements designs”, Department of Statistics, University of Dhaka, Bangladesh, May, 1996.
- “Optimal two-period repeated measurements designs”, Department of Statistics, University of Chittagong, Bangladesh, May, 1996.
- “Introduction to *SAS* Interactive Matrix Language (*SAS/IML*)”, University of Southern Maine, Spring - 1994.
- “Optimal incomplete block designs with variable replications and block sizes ”, University of Southern Maine, Spring-1990.
- “Optimal and near optimal sets of Latin squares for correlated errors ” , University of Southern Maine, Fall-1989.

FUNDED RESEARCH PROJECTS

PI/Co-PI /Funding Agency/Amount/Year

- Statistician on one Central Florida Expressway Authority Grant "Evaluation of internally illuminated raised pavement markers at exit ramps and exit ramp improvements to reduce WWD on the CFX system Central Florida Expressway Authority" PI Dr. Al-Deek, Department of Civil, Transportation and Environmental Engineering. AWD00006102, 3/4/2024 - 6/3/2026, Total Amount \$125,826, Statistician's share 2.7%.
- PI - Nizam Uddin, Co-PI- Rong Zhou, UCF grant on Redesigning Large-Enrollment Online Course STA 2023-Statistical Methods I Using Personalized Adaptive Learning , Funded for \$28,000.00. May 2023 - June 2025.
- Statistician on one Florida Department of Transportation Grant "Development of a Roadway Corridor Safety Approach to Identify High-Risk Corridors and Prevent Fatalities on Florida Roadways", Funded by Florida Department of Transportation (FDOT), PI Dr. Al-Deek of the Department of Civil, Transportation and Environmental Engineering, UCF. Total Amount \$293,804. Estimated dollar amount for my work: \$2690. 3/3/2022 -2/28/2024
- Statistician on one Florida Department of Transportation Grant Development and evaluation of wrong-way driving (WWD) countermeasures for the Florida Turnpike Enterprise toll road system, Phase-2 study-continued, PI- Dr Al-Deek, Civil and Environmental Engineering, (Estimated dollar amount for my work: \$7969.00), received as summer salary in 2018 and 2019).
- Statistician on one Florida Department of Transportation Grant A model for the determination of the service life of traffic signs, PI- Dr Amr Oloufa, Civil and Environmental Engineering, (Estimated dollar amount for my work: \$7031.00 in 2017, received as summer salary in 2017).
- **Nizam Uddin** (PI), Orlando Regional Healthcare System, \$36,245.00, 2001-2006.
- **Nizam Uddin** (PI), Incharge Institute, \$18,100.00, 2003- 2005.
- **Nizam Uddin**, Principal Consultant, Institute of Statistics and Data Mining, \$19,750.00 (fee received by the Department of Statistics and Actuarial Science for miscellaneous projects through the Institute), 2001 - 2008.
- David Nickerson (PI) and **Nizam Uddin** (Co-PI) Golfweek's Super News, \$8,500.00, Co-PI's share 50%, 2006.
- Abdel-Aty (PI) and **Nizam Uddin** (Co-PI), Florida Department of Transportation, \$507,966.00, Co-PI's share \$45,716.00, 2004 - 2006.
- Abdel-Aty (PI) and **Nizam Uddin** (Co-PI), Florida Department of Transportation, \$122,650.00, CO-PI's share was equivalent to two months summer salary, 2002 - 2004.
- Cristina Fernandez-Valle (PI) and **Nizam Uddin** (Statistical Consultant), Department of Defence, \$926,698, Consultant's share: one month summer salary, 2003- 2007.
- Sharon Berk (PI) and **Nizam Uddin** (Statistical Consultant), Environmental Protection Agency, \$396,060.00, Consultant's share: one month summer salary, 1998-2001.
- **Nizam Uddin** (PI), National Science Foundation, \$30,000.00, 1992-94.

- **Nizam Uddin** (PI), Maine EPSCoR, \$ 10,000.00, 1991 -1992.
- **Nizam Uddin** (PI) University of Southern Maine, \$3,000.00, 1991.
- **Nizam Uddin** (PI), Tennessee Technological University, \$ 8,800.00, 1997-2001.

SERVICE ACTIVITIES

- Undergraduate Coordinator of two programs: Statistics, Actuarial Science.
- Served as Chair/Member of numerous committees including undergraduate Statistics and Actuarial Science program assessment committees; Masters and Ph.D. program assessment committees; Faculty Search Committee; Undergraduate program committee; Colloquium committee; Chair's advisory committee; AESP committee; Equitable workload committee; Webmaster committee; P&T committee; COS TIP/RIA committees; Undergraduate curriculum and standards committee; Faculty Senate;

PROFESSIONAL AND OTHER ACTIVITIES

- Elected Member, International Statistical Institute, 2006.
- Member, Editorial Board, Far East Journal of Theoretical, 2004-present. Statistics.
- Associate Editor, Journal of Statistical Theory and Applications, 2007 - present.
- Member, American Statistical Association.
- Refereed research papers for the following journals:
 - Annals of Statistics*
 - Biometrika*
 - Journal of Statistical Planning and Inference*
 - Journal of Royal Statistical Society-Series B*
 - Communications in Statistics*
 - Annals of the Institute of Statistical Mathematics,*
 - Statistica Sinica*
 - Metrika*
 - Utilitas Mathematica*
 - Calcutta Statistical Association Bulletin*
 - Sankhya, Series B*
 - Far East Journal of Theoretical Statistics.*
 - Journal of Transportation Research Board*
 - Journal of Statistical Theory and Applications*
 - Journal of Statistical Theory and Practice*
 - Statistical Methodology*
 - ASCE's Journal of Transportation Engineering*

CONSULTING ACTIVITIES

- Served as Principal Consultant, Institute of Statistics and Data Mining, Department of Statistics and Actuarial Science, University of Central Florida, 2001 - 2007. Activities include
 - Work on five funded research projects and many small consulting projects (listed under grants section).
 - Preparation of final statistical reports of all completed projects.
 - Oral presentation of summary reports to clients of some consulting projects.
 - Twelve publications in refereed journals outside of mainstream statistics.
 - Supervision of graduate students assigned to work for the Institute.
 - Free consultation meetings with many faculty members and students of UCF as well as members of local organizations such as Orlando Regional Hospital, Florida Hospital, Incharge Institute, etc.
 - Response to numerous phone calls and email inquiries regarding the services of the Institute.
 - Review of research papers and documents related to various funded projects.
 - Preparation and submission of annual budget of the Institute.
 - Preparation/revision of some important documents (e.g., Value of our Institute to the State, Mission and Areas of Focus of the Institute, etc.) submitted to UCF as well as to the State Board of Education
- Consultant/Technical Expert, International Agricultural Programs, University of Minnesota, USA, June 1-July 1, 1997.

COMPUTER BACKGROUND

- Statistical packages : *SAS, R, SYSTAT, SPSS, MINITAB, BMDP, EXCEL*.
- Programming Languages : *Pascal & Fortran*.
- Word Processor : *TEX, LATEX, Microsoft Word*.