MAJ Daniel Baller

Instructor, United States Military Academy 3213 Meigs Rd. West Point, NY 10996

Updated: 23 March 2020

Education

M.S., Operations Research, Georgia Institute of Technology

B.S., Operations Research with Honors, The United States Military Academy

2008

Academic Experience

Instructor, Department of Mathematical Sciences United States Military Academy

2018-2020

Courses Directed

United States Military Academy

| MA206 - (Assistant) Introduction to Probability and Statistics | 2020 |
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| MA206 - Introduction to Probability and Statistics | 2019 |

Courses Taught

United States Military Academy

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| MA206 - Introduction to Probability and Statistics | 2019 - 2020 |
| MA103 - Mathematical Modeling and Introduction to Calculus | 2018 |

Refereed Publications

Baller, D., Thomas, D., Cummiskey, K., Bredlau, K., Schwartz, N., Orzechowski, K., Miller, R., Odibo, A., Shah, R., Salafia, C. (2019) Gestational growth trajectories derived from a dynamic fetal—placental scaling law, *Journal of the Royal Society Interface*, Impact factor: 3.224. https://royalsocietypublishing.org/doi/10.1098/rsif.2019.0417

Adams, B., Baller, D., Jonas, B., Joseph, A., Cummiskey, K., (Manuscript Under Review) Computational Skills for Multivariable Thinking in Introductory Statistics. *Journal of Statistics Education Special Edition*. https://www.overleaf.com/project/5db09b2889e75a00012e5fab

Presentations

Baller, D., Thomas, D., Cummiskey, K., Bredlau, K., Schwartz, N., Orzechowski, K., Miller, R., Odibo, A., Shah, R., Salafia, C. (2019) Gestational growth trajectories derived from a dynamic fetal–placental scaling law, *MAA MathFest*.

Conference Proceedings

Morin, T., Clark, N., **Baller, D.**, Watts, K. (2018) Estimating Phase Angle Percentiles in Elite Athletes, *Experimental Biology*. Abstract Published in *The FASEB Journal*, April, 2020, Impact factor: 5.391, presentation canceled due to COVID-19.

Aloma, Z., Hughes, D., **Baller, D.**, Thomas, D. (2018) The Pitching Problem: Proxy Measures for the Identification of Pitcher Fatigue, *Experimental Biology*. Abstract Published in *The FASEB Journal*, April, 2020, Impact factor: 5.391, presentation canceled due to COVID-19.

Baller, D., Johnson, A., McCulloh, I., Schrieber, C., Carley, K. (2008) Specific Communication Network Measure Distribution Estimation I, Sunbelt XXVIII, International Sunbelt Social Network Conference. https://assets.noviams.com/novi-file-uploads/insna/PDFs/Sunbelt_2008.pdf

Baller, D., Lospinoso, J. (2008) Specific Communication Network Measure Distribution Estimation II, 13th ICCRTS. http://www.dodccrp.org/events/13th_iccrts_2008/CD/html/papers/251.pdf

Baller, D., Lospinoso, J., Johnson, A. (2008) An Empirical Method for the Evaluation of Dynamic Network Simulation Methods, 2008 International Conference on Information & Knowledge Engineering, IKE 2008.

Funding Awarded

Grant, Faculty Development Research Fund (FRF)

2019

Professional Memberships

| Mathematical Association of America | 2019 |
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| Alpha Pi Mu - Industrial Engineering Honor Society | 2018 |
| Institute of Industrial and Systems Engineers (IISE) | 2016-2018 |
| Pi Mu Epsilon - Mathematics Honors Society | 2007 |

Faculty Development

Presenter | Department Bayesian Statistics Study Group

2019

Student Research

Co-Adviser, Honors Thesis. Previte, Peter, "The Anti-Cycle in Baseball."

Co-Adviser, Honors Thesis. Morin, Thomas, "Estimating Phase Angle Percentiles in Elite Athletes."

Co-Adviser, Honors Thesis. Hurtubise, Jacob, "Analysis of Base Stealing – the fastest 3.3 seconds in sports."

Co-Adviser, Honors Thesis. Aloma, Zachary, "The Pitching Problem: Proxy Measures for the Identification of Pitcher Fatigue."

Second Reader, Nicosia, Gino, "Modeling Madness."

Second Reader, Wilby, Bridget, "Forecasting Medical Screening Demand: Analysis of the Cadet Foreign Travel Medical Screening Process." Hollis Award Winner 2019.

Institutional and Student Developmental Service

| Triage Judge, Interdisciplinary Contest in Modeling by COMAP | 2020 |
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| Journal Reviewer for PLOS ONE | 2019-Present |
| Military Intelligence Branch Mentor | 2018-Present |
| IISE Graduate Chapter President, Georgia Institute of Technology | 2017 |
| Department Photographer | 2018-Present |

Selected Military Service

| Camp Humphreys, KOR | 2014-2015 |
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| Company Commander, A Co, 719th MI BDE, 501st MI BDE | |
| Camp Casey, KOR | 2013-2014 |

Battalion Intelligence Officer, 2-9 Infantry Battalion, 1 ABCT

Deployments

Operation Iraqi Freedom/Operation New Dawn, Iraq

2010

Selected Awards

Meritorious Service Medal (1)

Army Commendation Medal (3)

Air Assault Badge

Overseas Service Ribbon (3)

Office of the Secretary of Defense Network Science Excellence Award – Best Student Project Network Science – United States Military Academy, West Point, New York, 2008