

Oscar González Jr.

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RESEARCH INTERESTS

Psychometrics; statistical mediation analysis; machine learning; Bayesian estimation; measurement invariance; prevention science; self-regulation; screening assessments

EDUCATION

Ph.D., Quantitative Research Methods Arizona State University, Tempe, AZ	2018
M.A., Quantitative Research Methods Arizona State University, Tempe, AZ	2016
B.A., Psychology – Honors, Minor in European Studies University of Notre Dame, Notre Dame, IN	2012

PROFESSIONAL EXPERIENCE

Associate Professor (tenured) Department of Psychology <i>University of Notre Dame, Notre Dame, IN.</i>	2025-present
Associate Professor (tenured) Department of Psychology and Neuroscience <i>University of North Carolina at Chapel Hill, Chapel Hill, NC.</i>	2024-2025
Assistant Professor Department of Psychology and Neuroscience <i>University of North Carolina at Chapel Hill, Chapel Hill, NC.</i>	2018-2024
ETS-NAEP Summer Corporate Intern, Cognitive Learning Sciences <i>Educational Testing Service (ETS), Princeton, NJ</i>	Summer 2015

HONORS

Editorial Fellowship in <i>Psychological Methods</i>	2025
UNC P&N Ann Rankin Cowan Excellence Award for High Impact Research	2023
Tanaka Award for Best Paper in <i>Multivariate Behavioral Research</i> in 2021	2022
Induction, Society of Multivariate Experimental Psychology (SMEP)	2021
Early Career Prevention Scientist Trainee, Society for Prevention Research	2020
CLAS Graduate Excellence Award, Arizona State University	2014-2018
ETS Testing, Evaluation, Assessment, and Measurement (TEAM) Fellowship	2014, 2015
NSF Graduate Research Fellowship– Honorable Mention	2014
Doctoral Enrichment Fellowship, Arizona State University	2013-2014

Doctoral Recruitment Fellowship, Arizona State University
Annexstad Family Foundation Scholar, University of Notre Dame
Balfour-Hesburgh Scholar, University of Notre Dame

2013
2008-2012
2008-2012

BOOKS & CHAPTERS – CONTRIBUTIONS (N=3)

1. **Gonzalez, O.**, Valente, M. J., Cheong, J. W., & MacKinnon, D. P., (2022). Mediation/Indirect effects in Structural Equation Modeling. In R. Hoyle (Ed.) *Handbook of Structural Equation Modeling* (Vol. 2, pp. 409-426). The Guilford Press.
2. **Gonzalez O.**, Pelham, W. E. III, & Georgeson A. R. (2020). Impact of measurement bias on screening measures. In Wiberg, M., Molenaar, D., González ,J., Böckenholt, U., & Kim, J. S. (Eds.) *Quantitative Psychology: IMPS 2019*. Springer Proceedings in Mathematics & Statistics (pp. 275-284). Springer, Cham. DOI:1007/978-3-030-43469-4_21.
3. **Gonzalez, O.** & MacKinnon, D. P. (2018). Statistical mediation in lifespan developmental analysis. In *Oxford Research Encyclopedia of Psychology*. Oxford University Press. DOI: 10.1093/acrefore/9780190236557.013.358.

REFEREED PUBLICATIONS (N=35)

* denotes my graduate students

1. Browne, J., Kunicki, Z., Jarskog, L. F., Sheeran, P., Abrantes, A. M., Elliott, T., **Gonzalez, O.**, Battaglini, C., & Penn, D. L. (in press). Psychosocial outcomes of a virtual group-based walking intervention or adults with schizophrenia-spectrum disorders. *Community Mental Health Journal*. DOI: 10.1007/s10597-025-01488-3
2. Aks, I. R., Schwarz-Torres, J. C., Davis, I. S., Racz, S. J., Patel, H., **Gonzalez, O.**, & Pelham III, W. E. (in press) Is parental monitoring just a way to acquire knowledge? Re-evaluating a re-Conceptualization. *JCPP Advances*. DOI: 10.1002/jcv2.70008.
3. Browne, J., Battaglini, C., Imamoglu, A., Stiles, B., Jarskog, L. F., Sheeran, P., Abrantes, A., Elliott, T., **Gonzalez, O.**, & Penn, D. L. (in press). Engagement in a virtual group-based walking intervention for persons with schizophrenia: A qualitative study. *BMC Psychiatry*
4. Valente, M. J., Rijnhart, J. J. M., & **Gonzalez, O.** (2025). A novel approach to estimating moderated treatment effects and moderated mediation effects with continuous moderators. *Psychological Methods*, 30, 1-15. DOI: 10.1037/met0000593.
5. **Gonzalez, O.** (2025). Combining psychometric and machine learning approaches to select items and score responses. *Behaviormetrika*, 25, 259-292. DOI: 10.1007/s41237-025-00257-6.
6. Pelham III, W. E., Racz, S. J., Davis, I. S., Aks, I. R., Patel, H., McMahon, R. J., Thornburg, M. A., Huang, Y. W., **Gonzalez, O.**, Tapert, S. F., & Brown, S. A. (2024). What is parental

monitoring? *Clinical Child and Family Psychology Review*, 27, 576-601 DOI: 10.1007/s10567-024-00490-7.

7. **Gonzalez, O.**, Georgeson, A. R., & Pelham, W. E. III. (2024). Estimating classification consistency of machine learning models for screening measures. *Psychological Assessment*, 36, 395-406. DOI: 10.1037/pas0001313.
8. Webb, C. A., Hirshberg, M. J., **Gonzalez, O.**, Davidson, R. J., & Goldberg, S. B. (2024). Revealing subgroup-specific mechanisms of change via moderated mediation: A meditation intervention example. *Journal of Consulting and Clinical Psychology*, 92, 44-53. DOI: 10.1037/ccp0000842.
9. **Gonzalez, O.**, Millechek, J. R.,* & Georgeson, A. R. (2023). Estimating latent baseline-by-treatment interactions in statistical mediation analysis. *Structural Equation Modeling: A Multidisciplinary Journal*, 30, 914-925. DOI: 10.1080/10705511.2023.2193312.
10. **Gonzalez, O.** & Valente, M. J. (2023). Accommodating a latent XM interaction in statistical mediation analysis. *Multivariate Behavioral Research*, 28, 659-674. DOI: 10.1080/00273171.2022.2119928
11. **Gonzalez, O.**, Georgeson, A. R., & Pelham, W. E. III. (2023). How accurate and consistent are score-based assessment decisions? A procedure using the linear factor model. *Assessment*, 30, 1640-1650. DOI: 10.1177/10731911221113568.
12. Browne, J., Battaglini, C., Jarskog, L. F., Sheeran, P., Abrantes, A. M., Elliott, T., **Gonzalez, O.**, & Penn, D. L. (2023) Virtual group-based walking intervention for persons with schizophrenia-spectrum disorders: A randomized controlled trial. *Mental Health and Physical Activity*, 23, e100515. DOI: 10.1016/j.mhpa.2023.100515.
13. **Gonzalez, O.** (2023). Summary intervals for model-based classification accuracy and consistency indices. *Educational and Psychological Measurement* 83, 240-261. DOI: 10.1177/00131644221092347.
14. Suzuki, H. L.* & **Gonzalez, O.** (2022). Relative predictive performance of treatments of ordinal outcome variables across machine learning algorithms and class distributions. *Journal of Behavioral Data Science*, 2, 1-26. DOI: 10.35566/jbds/v2n2/suzuki
15. Georgeson, A. R., Valente, M. J., & **Gonzalez, O.** (2022). The effect of partial invariance on the estimation of the mediated effect in the two-wave mediation model. *Structural Equation Modeling: A Multidisciplinary Journal*, 29, 909-918. DOI: 10.1080/10705511.2022.2067164.
16. Valente, M. J., Georgeson, A. R., & **Gonzalez, O.** (2021). Clarifying the implicit assumptions of two-wave mediation models via the latent change score specification. *Frontiers in Psychology*, 12, e709198. DOI: 10.3389/fpsyg.2021.709198.

17. **Gonzalez, O.** (2021). Psychometric and machine learning approaches to reduce the length of scales. *Multivariate Behavioral Research*, 56, 903-919. DOI: 10.1080/00273171.2020.1781585.
18. Georgeson, A. R., Valente, M. J., & **Gonzalez, O.** (2021). Evaluating response shift in statistical mediation analysis. *Advances in Methods and Practices in Psychological Science*, 4, 1-13. DOI: 10.1177/25152459211012271.
19. Browne, J., Battaglini, C., Jarskog, L. F., Sheeran, P., Abrantes, A., McDermott, J., Elliot, T., **Gonzalez, O.**, & Penn, D. L. (2021). Targeting physical health in schizophrenia: Results from the Physical Activity Can Enhance Life (PACE-life) 24-Week Open Trial. *Mental Health and Physical Activity*, 20, e100393. DOI: 10.1016/j.mhpa.2021.100393.
20. **Gonzalez, O.**, Georgeson, A. R., Pelham, W. E. III., & Fouladi, R. T. (2021). Estimating classification consistency of screening measures and quantifying the impact of measurement bias. *Psychological Assessment*, 33, 596-609. DOI: 10.1037/pas0000938.
21. **Gonzalez, O.** (2021). Psychometric and machine learning approaches for diagnostic assessment and tests of individual classification. *Psychological Methods*, 26, 236-254. DOI: 10.1037/met0000317.
22. **Gonzalez, O.**, MacKinnon, D. P., & Muniz, F. B., (2021). Extrinsic convergent validity evidence to prevent Jingle and Jangle fallacies. *Multivariate Behavioral Research*, 56, 3-19. DOI: 10.1080/00273171.2019.1707061.
Tanaka Award winner for best article in Multivariate Behavioral Research in 2021
23. **Gonzalez, O.** & MacKinnon, D. P. (2021). The measurement of the mediator and its influence on statistical mediation conclusions. *Psychological Methods*, 26, 1-17. DOI: 10.1037/met0000263.
24. **Gonzalez, O.** & Pelham, W. E. III. (2021). When does differential item functioning matter for screening? A method for empirical evaluation. *Assessment*, 28, 446-456. DOI: 10.1177/1073191120913618.
25. Mazza, G. L., Smyth, H. L., Bissett, P. G., Canning, J. R., Eisenberg, I. W., Enkavi, A. Z., **Gonzalez, O.**, Kim, J. S., Metcalf, S. A., Muniz, F., Onken, L., Pelham, W. E. III, Scherer, E. A., Stoeckel, L. E., Valente, M. J., Xie, H., Poldrack, R. A., Marsch, L. A., MacKinnon, D. P. (2021). Correlation database of 60 cross-disciplinary survey and cognitive tasks assessing self-regulation. *Journal of Personality Assessment*, 103, 238-245. DOI: 10.1080/00223891.2020.1732994.
26. **Gonzalez, O.**, Canning, J. R., Smyth, H., & MacKinnon, D. P. (2020). A psychometric evaluation of the Short Grit Scale: A closer look at its factor-structure and scale functioning.

European Journal of Psychological Assessment, 36, 646-657. DOI: 10.1027/1015-5759/a000535.

27. MacKinnon, D. P., Valente, M. J., & **Gonzalez, O.** (2020). The correspondence between causal and traditional mediation analysis: The link is in the mediator by treatment interaction. *Prevention Science*, 21, 147-157. DOI: 10.1007/s11121-019-0107604.
28. Pelham, W. E. III, **Gonzalez, O.**, Metcalf, S. A., Whicker, C. L., Witkiewitz, K. A., Marsch, L. A., & MacKinnon, D. P. (2019). Evaluating the factor structure of each facet of the Five Facets Mindfulness Questionnaire. *Mindfulness*, 10, 2629-2646. DOI: 10.1007/s12671-019-01235-2.
29. Pelham, W. E. III, **Gonzalez, O.**, Metcalf, S. A., Whicker, C. L., Scherer, E. A., Witkiewitz, K., Marsch, L. A., Mackinnon, D. P. (2019). Item response theory analysis of the Five Facet Mindfulness Questionnaire and its short forms. *Mindfulness*, 10, 1615–1628. DOI: 10.1007/s12671-019-01105-x.
30. Eisenberg, I. W., Bissett, P. G., Canning, J. R., Dallery, J., Enkavi, A. Z., Gabrieli, S. W., **Gonzalez, O.**, Green, A. I., Greene, M. A., Kiernan, M., Kim, S. J., Li, J., Lowe, M., Mazza, G. L., Metcalf, S. A., Onken, L., Peters, E., Prochaska, J. J., Scherer, E. A., Stoeckel, L. E., Valente, M. J., Xie, H., MacKinnon, D. P., Marsch, L. A., & Poldrack, R. A. (2018). Applying novel technologies and methods to inform the ontology of self-regulation. *Behavior Research and Therapy*. 101, 46-57. DOI: 10.1016/j.brat.2017.09.014.
31. **Gonzalez, O.**, O'Rourke, H. P., Wurpts, I. C., & Grimm, K. J. (2018). Analyzing Monte Carlo simulation studies with Classification and Regression Trees. *Structural Equation Modeling: A Multidisciplinary Journal*, 25, 403-413. DOI: 10.1080/10705511.2017.1369353.
32. Miočević, M., **Gonzalez, O.**, Valente, M. J., & MacKinnon, D. P. (2018). A tutorial on Bayesian potential outcomes mediation analysis. *Structural Equation Modeling: A Multidisciplinary Journal*, 25, 121-136. DOI: 10.1080/10705511.2017.1342541.
33. Olivera-Aguilar, M., Rikoon, S., **Gonzalez, O.**, Kisbu-Sakarya, Y., & MacKinnon, D. P. (2018). Bias, Type 1 error rates, and statistical power of a latent mediation model in the presence of violations of invariance. *Educational and Psychological Measurement*, 78, 460-481. DOI: 10.1177/0013164416684169.
34. **Gonzalez, O.** & MacKinnon, D. P. (2018). A bifactor approach to model multifaceted constructs in statistical mediation analysis. *Educational and Psychological Measurement*, 78, 5-31. DOI:10.1177/0013164416673689.

35. Valente, M. J., **Gonzalez, O.**, Miočević, M., & MacKinnon, D. P. (2016). A note on testing mediated effects in structural equation models: Reconciling past and current research on the performance of the test of joint significance. *Educational and Psychological Measurement*, 76, 889-911. DOI: 10.1177/0013164415618992.

CONFERENCE PRESENTATIONS

1. **Gonzalez, O.** (October, 2025). *Review of fairness frameworks in psychometrics and machine learning*. Paper presented at the Society of Multivariate Experimental Psychology, Notre Dame, IN.
2. Millechek, J. R., & **Gonzalez, O.** (April, 2024). *The FAMILIAR methods: Potential for a factor model based approach to estimate meaningful score region agreement between COAs?* Talk at the 2024 Health Outcomes Society of the Triangle, Durham, NC.
3. **Gonzalez, O.** (October, 2023). *Model implied estimates of classification accuracy and consistency in screeners*. Paper presented at the Society of Multivariate Experimental Psychology, Iowa City, IA.
4. **Gonzalez, O.** (May, 2023). *Improving health equity by assessing the impact of item bias on screeners*. Presentation at the 31st annual meeting of the Society for Prevention Research, Washington, DC.
5. **Gonzalez, O.** (October, 2022). *Measurement issues in mediation models with interactions*. Paper presented at the Society of Multivariate Experimental Psychology, Monterey, CA.
6. **Gonzalez, O.** (July, 2022). *Estimating latent baseline-by-treatment interactions in statistical mediation analysis*. Paper presented at the 87th International Meeting of the Psychometric Society, Bologna, Italy.
7. **Gonzalez, O.**, & Valente, M. J. (June, 2021). *Machine learning in longitudinal mediation analysis*. Presentation at the 29th (virtual) annual meeting of the Society for Prevention Research. ***Symposium Co-chair***
8. **Gonzalez, O.** (February, 2021). *The measurement of the mediator and its effect on detecting indirect effects*. Paper presented at the (virtual) Annual Convention of the Society of Personality and Social Psychology.
9. **Gonzalez, O.** & Georgeson, A. R. (July, 2020). *Measurement bias and consistency in classification for screening measures*. Paper presented at the 85th (Virtual) International Meeting of the Psychometric Society, College Park, MA.
10. Georgeson, A. R., & **Gonzalez, O.** (July, 2020). *Treating ordinal items as continuous in multiple group CFA*. Paper presented at the 85th (Virtual) International Meeting of the

Psychometric Society, College Park, MA.

11. Georgeson, A. R., & **Gonzalez, O.** (February, 2020). *What happens when ordinal items are treated as continuous in invariance tests?* Poster presented at the 3rd meeting of the Triangle Health Measurement Group, Chapel Hill, NC.
12. **Gonzalez, O.** (July, 2019). *Impact of measurement bias on diagnostic assessment.* Paper presented at the 84th annual International Meeting of the Psychometric Society, Santiago, RM, Chile.
13. **Gonzalez, O.**, & Valente, M. J. (May, 2019). *Potential contributions of machine learning to statistical mediation analysis.* Presentation at the 27th annual meeting of the Society for Prevention Research, San Francisco, CA. ***Symposium Co-chair***
14. MacKinnon, D. P., & **Gonzalez, O.** (October, 2018). *Mediation as a measurement challenge.* Presentation at the Society of Multivariate Experimental Psychology, Albuquerque, NM.
15. **Gonzalez, O.**, & MacKinnon, D. P., (May, 2018). *Impact of reducing assessment length on statistical mediation conclusions.* Poster presented at the 26th annual meeting of the Society for Prevention Research, Washington, DC.
16. MacKinnon, D. P., Valente, M. J., **Gonzalez, O.**, & Mazza, G. L. (October, 2017). *Mediated interaction in the potential outcomes and traditional mediation models.* Presentation at the Society of Multivariate Experimental Psychology, Minneapolis, MN.
17. **Gonzalez, O.**, Valente, M. J., & MacKinnon, D. P., (May, 2017). *Violations of longitudinal measurement invariance in the two-wave mediation model.* Paper presented at the 25th annual meeting of the Society for Prevention Research, Washington, DC.
18. **Gonzalez, O.**, Canning, J. R., Smyth, H., & MacKinnon, D. P., (May, 2017). *Assessing and improving the reliability of the Short Grit Scale scores.* Poster presented at American Psychological Science. Boston, MA.
19. **Gonzalez, O.**, & MacKinnon, D. P. (July, 2016). *Modeling multifaceted constructs in statistical mediation analysis.* Paper presented at the 81st annual International Meeting of the Psychometric Society, Asheville, NC.
20. **Gonzalez, O.**, & MacKinnon, D. P. (June, 2016). *Measurement and psychometric issues in statistical mediation analysis.* E-poster presented at the 24th annual meeting of the Society for Prevention Research, San Francisco, CA.

21. **Gonzalez, O.**, Grimm, K. J., Wurpts, I.C., & O'Rourke, H. P. (May, 2016). *Analyzing Monte Carlo simulations with data mining approaches*. Paper presented at the 6th annual Modern Modeling Methods (M3) Conference, Storrs, CT.
22. **Gonzalez, O.** (June, 2015). *Exploring and analyzing continuous motion data with virtual manipulatives*. Presentation at the 2015 ETS-NAEP Corporate Internship Symposium. Princeton, NJ.
23. **Gonzalez, O.** (February, 2014). *Evaluating accuracy in tests for selection*. Presentation at the Interdisciplinary Research Colloquium, Arizona State University, Tempe, AZ.
24. Park, I., **Gonzalez, O.**, Hughes, J., Kim, M., CTSI-CHEP Notre Dame (May, 2013). *Coping with discrimination: Anger regulation, identity, and distress among Hispanic adults*. Poster presented at the American Psychological Science Convention. Washington, DC
25. Park, I., **Gonzalez, O.**, Hughes, J., Kim, M., CTSI-CHEP Notre Dame (April, 2013). *Role of anger regulation and ethnic socialization in the discrimination—distress link among Mexican-Origin adolescents*. Poster presented at the Society for Research in Child Development. Seattle, WA.
26. **Gonzalez, O.** (May, 2012). *Self-concept consistency and stability in American, Spanish, South African, and Hispanic students*. Paper Presented at the Honors Psychology Research Symposium. Notre Dame, IN.

INVITED TALKS

1. **Gonzalez, O.**, (April, 2025). *Statistical mediation and behavior change in aging*. Talk at the 2025 NIA Roybal Annual Meeting, Washington, DC.
2. **Gonzalez, O.** (October, 2024). *Measurement issues in statistical mediation models*. Talk at quantitative brown bag at Arizona State University, Tempe AZ.
3. **Gonzalez, O.** (April, 2024). *Evaluating screening measures and implications for health equity*. Talk at the Department of Biostatistics and Informatics at the University of Colorado Anschutz, Aurora, CO.
4. **Gonzalez, O.** (November, 2023). *Measurement issues in mediation models*. Talk at quantitative brown bag at University of California, Davis, Davis, CA.
5. **Gonzalez, O.** (May, 2022). *Psychometric and machine learning approaches to measure construction*. Invited talk at the American Psychological Science convention, Chicago, IL.

6. **Gonzalez, O.** (April, 2021). *Quantifying the effect of item bias on screening assessment*. Talk at the quantitative brown bag at Arizona State University, Tempe, AZ.
7. **Gonzalez, O.** (January, 2021). *Statistical mediation analyses: traditional and causal perspectives*. Talk at the SAMSI opening workshop on Data Sciences in the Social and Behavioral and Sciences. University of North Carolina at Chapel Hill.
8. **Gonzalez, O.** (October, 2020). *Estimating classification consistency of machine learning models used for screening*. Talk at the quantitative brown bag at the University of California, Los Angeles, CA.
9. **Gonzalez, O.** (September, 2020). *Estimating classification consistency for screening measures*. Talk for the Quantitative Study Group at the University of Notre Dame, Notre Dame, IN.
10. **Gonzalez, O.** (May, 2020). *Measures for score precision and measures that predict well*. Talk at the quantitative psychology colloquium at McGill University, Montreal, QC, Canada.
11. **Gonzalez, O.** (February, 2020). *On learning machine learning*. Talk at the Carolina Population Center Interdisciplinary Research Seminar. University of North Carolina at Chapel Hill, Chapel Hill, NC.
12. **Gonzalez, O.** (October, 2019). *Thoughts on learning machine learning*. Keynote at the UNC Mood and Neuroscience Conference. University of North Carolina at Chapel Hill, Chapel Hill, NC.
13. **Gonzalez, O.** (April, 2019). *A machine learning perspective on basic assessment*. Talk at clinical colloquium at the University of North Carolina at Greensboro, Greensboro, NC.
14. **Gonzalez, O.** (February, 2018). *Psychometric and machine learning approaches for diagnostic assessment*. Visitation weekend talk at Arizona State University, Tempe, AZ.
15. **Gonzalez, O.** (December, 2017). *Psychometric issues in statistical mediation analysis*. Talk for the Quantitative Study Group at the University of Notre Dame, Notre Dame, IN.
16. **Gonzalez, O.** (November, 2017). *Psychometric and machine learning approaches for better assessment*. Talk at the Quantitative Forum at the University of North Carolina at Chapel Hill, Chapel Hill, NC.

SOFTWARE

1. **Gonzalez, O.** (2015). *SAIL.VM: Data management, visualization, and movement pattern recognition for the SAIL Virtual Manipulatives Project: Earth and Space Science Task*. R package version 0.9. ETS Internal Use License.

TEACHING EXPERIENCE

Courses at University of Notre Dame:

PSY40122 Machine Learning in the Social and Behavioral Sciences

Fall 2025, Students: 11

Courses at University of North Carolina at Chapel Hill:

PSYC531 Tests and Measurements

Fall 2024, Students: 32 – Departmental Undergraduate Teaching Commendation.

Maymester 2024, Students: 9

Fall 2023, Students: 32 – Departmental Undergraduate Teaching Commendation.

Fall 2022, Students: 31

Spring 2021, Students: 32

PSYC559/490(002) Applied Machine Learning in Psychology

Spring 2024, Students: 27

Spring 2023, Students: 32

Fall 2021, Students: 26

Spring 2021, Students: 29

Fall 2019, Students: 22

Spring 2019, Students: 29

Fall 2018, Students: 25 – Departmental Undergraduate Teaching Commendation.

PSYC791/834 Machine Learning

Spring 2024, Students: 15

Fall 2021, Students: 14

Spring 2020, Students: 9

PSYC842 Test Theory and Analysis

Fall 2022, Students: 14

Fall 2020, Students: 7

PSYC859 Introduction to Statistical Mediation

Fall 2024, Students: 15

Workshops:

Introduction to Psychometrics in R (Half-day; Instructor Assistant)

2019

American Psychological Association (Div. 5) with William R. Revelle

Bayesian Causal Mediation Models (One-day; Instructor)

2018

Society for Prevention Research with David P. MacKinnon

Modern Mediation Methods (One-day; Instructor)

2017

Society for Prevention Research with David P. MacKinnon

Structural Equation Modeling in Longitudinal Data (Five-day; Lab Assistant) 2016

APA Advanced Training Institute with Kevin J. Grimm

MENTORSHIP EXPERIENCE

Students Supervised:

University of North Carolina at Chapel Hill

Jeno Millechek, PhD (2025 grad, placement: TBD)

Honoka Suzuki, M.A. (2024 grad, placement: The Joint Commission)

Sponsor:

Student Funding Awards

Rodrigo Roque-Hernandez: Carolina Covenant Development Grant (2024)

Honoka Suzuki: NSF Graduate Research Fellowship (Quantitative; 2023)

Milestone Supervisor:

Dissertations Chaired

Jeno Millechek: Approaches to meaningful change (Quantitative, 2025)

Comprehensive Exam Lead

Jeno Millechek: Meaningful change in COA's (Quantitative, 2024)

Master's Theses Chaired

Honoka Suzuki: Fairness in machine learning (Quantitative; 2024)

Jeno Millechek: Methods for classification agreement (Quantitative; 2024)

Student Milestone Committees:

Dissertations (8)

Catherine Breman: Predictors of community trust (Social, 2025)

Michael Ilagan: Detecting noncareless responding (Quantitative, 2025 – McGill)

Lan Luo: Time series and prediction (Quantitative, 2024)

Joshua Langfus: Assessing impulsive aggression (Clinical; 2024)

Angelina Tsai: Measuring child deprivation (Clinical; 2024)

Marco Chen: Bayesian estimation for longitudinal IRT models (Quantitative; 2023)

Cara Arizmendi: Clustering factor structures (Quantitative; 2021)

Henry Willis: Ethnic identity and online racial discrimination (Clinical; 2019)

Comprehensive Exams (9)

Chaewon Lee: Precision psychiatry and machine learning (Quantitative; 2024)

Atiyah Hamilton-Barlow: School dropout and machine learning (Quantitative; 2023)

Sarah (Saifa) Pirani: Item selection and machine learning (Quantitative; 2023)

Lan Luo: Classification in machine learning (Quantitative; 2022)

Sandra (Williams) Lee: Trees in machine learning (Quantitative; 2021)

Will Belzak: Validating mediators in organizational research (Quantitative; 2019)
 Noah Greifer: Regularization and causal inference (Quantitative; 2019)
 Cara Arizmendi: Genetic algorithms and time series (Quantitative; 2019)
 Michael Giordano: Feature selection and model-implied IV's (Quantitative; 2019)

Master's Theses (5)

Alejandro Martinez III: Estimation of latent interactions (Quantitative; 2024)
 Atiyah Hamilton-Barlow: Methods for testing anxiety (Quantitative; 2022)
 Christopher Urban: Deep learning and item factor analysis (Quantitative; 2021)
 Chris Strauss: Factor scoring and statistical mediation (Quantitative; 2021)
 Joshua Langfus: Irritability construct in diagnoses (Clinical; 2020)

Senior Honors Theses (3)

Susan Lin: Nonverbal synchrony in couples (Psychology, 2024)
 Zhuoyu Shi: Machine learning in psychiatric diagnoses (Psychology, 2024)
 Iris Kang: Sleep/screen time effect on language development (Psychology; 2023)

FUNDING ACTIVITY

(CURRENT)

NIH R01 (PI: Pelham, SubContract PI: Gonzalez)	2025-2030
Total subcontract costs: \$154,392 (8.3% FTE/yr)	

(SUBMITTED / TO SUBMIT)

NIH R01 (PI: Myers, Co-I Gonzalez)	(Oct 2025)
NIH R01 (PI: Vargas, Co-I Gonzalez)	(Feb 2026)
NIH R01 (PI: Buck, Co-I Gonzalez)	(Feb 2026)

(PAST)

UNC Junior Faculty Development Award	2019-2020
<i>Principal Investigator: How does measurement bias affect a screener's performance in protected populations? (JFDA - \$10,000)</i>	

National Science Foundation Graduate Research Fellowship	2015-2018
<i>Principal Investigator: Modeling complex psychological constructs in statistical mediation analysis (NSF No. DGE-1311230 - \$138,000)</i>	

PROFESSIONAL SERVICE

To the discipline

Editorial Board:

American Psychologist (2024 -)

Psychological Methods (2025 -)

Grant Reviewer:

DFG Grant – German Research Foundation

Ad hoc Reviewer:

American Journal of Drug and Alcohol Abuse; Applied Psychological Measurement; Behavioral Research Methods; Collabra: Psychology; Current Psychology; Educational and Psychological Measurement; Genetics; Journal of Behavioral Data Science; Journal of Classification; Journal of Educational and Behavioral Statistics; Journal of Evaluation and Health Professions; Journal of Mental Health; Journal of Multicultural Counseling and Development; Journal of Personality Assessment; Journal of Personality and Social Psychology; Journal of the Society for Social Work and Research; Journal of Well-being Assessment; Multivariate Behavioral Research; Prevention Science; Psychological Methods; Psychological Science; Psychometrika; SAGE Open; Social Development; Structural Equation Modeling: A Multidisciplinary Journal; The BMJ

Health Outcomes Society of the Triangle:

Steering committee (2024 - 2025)

Psychometric Society:

Volunteer symposium chair (2020, 2022)

Mentor in the Graduate Student Mentorship Program (2020)

Planning committee (2021, 2022)

Society for Prevention Research

ECPN Poster Contest Reviewer (2024)

Panelist:

NSF-QRM Meet the methodologist

Columnist:

The Score – APA Newsletter

Proposal Reviewer:

NCME Graduate Student Issues Committee Research Session

Clinical Study Oversight Committee

National Institute of Dental and Craniofacial Research (2023-2024)

Data Safety and Monitoring Board

National Institute of Aging – Roybal Centers (2024 -)

To the university

Committees @ Notre Dame Department of Psychology:

Undergraduate Curriculum Review Committee (2025 -)

Developmental Neuroscience Faculty Search Committee (2025 -)

Cognitive Neuroscience Faculty Search Committee (2025 -)

Committees @ UNC Department of Psychology and Neuroscience:

Faculty Review Subcommittee – S. Parekh [2024; Teaching Assistant Prof Reappointment]

Advisory committee (2021-2024)

Chair selection committee (2021)

Quantitative Program:

Quantitative Teaching Lead, (2024-2025)

Quantitative Forum Organizer (2019-2021)

Student Chair:

Quantitative Methods Faculty Search Committee, Arizona State University

Panelist:

National Science Foundation GRFP at Arizona State University

Diversity Initiatives

Mentor

Carolina Covenant Program (2021-2025)

Speaker/Panelist:

Keynote: Building Bridges Reception (August, 2025)

The Kick-off: Virtual Send-off for Incoming ND students (July, 2025)

UNC Latinxs in Tech (April, 2024)

UNC Choosing a psych major (Nov, 2022)

Annexstad Family Foundation Scholars (Feb, 2021)

University of Notre Dame – Building Bridges Program (Feb, 2021)

Quant Program Liaison

Diversifying Psychology Weekend (2024)