CURRICULUM VITAE JEFFREY N. ROUDER

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EDUCATION

1991 - 1995	Ph.D. Mathematical Behavioral Sciences (Psychology) University of California, Irvine
1988-1990	M.A. Social Sciences (Anthropology) University of California, Irvine
1984-1988	B.A. Physics Washington University, St. Louis, Missouri

ACADEMIC POSITIONS

2017-	Falmagne Chair and Professor, University of California, Irvine.
2013-2017	Middlebush Chair of The Social Sciences, University of Missouri.
2009-2017	Professor, University of Missouri.
2005-2009	Associate Professor, University of Missouri.
2004-2005	Visiting Scholar, Universidad da La Coruna, Spain. Leuven, Belgium.
1999-2005	Assistant Professor, University of Missouri.
1996 -1999	Post-doctoral Fellow, Northwestern University.
HONORS	
2017	Awarded Mercator Fellow by the Deutsche Forschungsgemeinschaft

2016	Inducted into Society for Experimental Psychology.
2016-	Elected Fellow of the American Psychological Society

2013 Luce Award for Most Outstanding Paper in J. Mathematical

Psychology.

2013	Appointed Frederick A. Middlebush Professor of Social Sciences (Missouri).
2009	Best Paper in $Psychonomic\ Bulletin\ \mathcal{C}\ Review.$
2008	Recipient of the University of Missouri's Gold Chalk Award for the Advancement of Graduate Student Education.
2007	Recipient of the University of Missouri's Excellence in Teaching with Technology Award.
2007	Recipient of The Albert Winemiller Psychological Statistics Researdch Award.
2005	Recipient of University of Missouri Provost's Outstanding Junior Faculty Researcher Award.
2001	Recipient of The Albert Winemiller Psychological Statistics Research Award.
1997	Junior Scholar: NSF Summer Workshop for Junior Scholars in Quantitative Methods in Psychology

EXTRAMURAL FUNDING

- Rouder, J. N. and Speckman, P. L. (2012-2015) Can Behavioral Data Underlying Receiver Operating Characteristic (ROC) Analysis Support Complex Theories of Perception and Memory? National Science Foundation (SBE-PAC) and Air Force Office of Sponsorer Research. Total of \$378K.
- Cowan, N. and Rouder, J. N. (2012-2017). Mechanism of Working Memory Capacity Limits and Their Development. National Institute of Child Health and Human Development. Total of \$1.9M.
- Geary, D. C., vanMarle, K., and Rouder, J. N. (2012-2017). The Development of Quantitative Competencies in Preschool Children. National Science Foundation. Total of \$1.9M.
- Sun, D., Rouder, J. N., and Speckman, P. L. (2010-2013) Bayesian hierarchical models for inference with behavioral data. National Science Foundation (SBE-MMS). Total of \$340K.
- Sun, D., Rouder, J. N., and Speckman, P. L. (2008-2010) Bayesian hierarchical models for inference with behavioral data. National Science Foundation (SBE-MMS). Total of \$290K.
- Rouder, J. N., Sun, D. and Speckman, P. L. (2005-2009). Parametric hierarchical models for psychological research. National Institute of Mental Health. Total of \$640K.

- Speckman, P. L., Sun, D., and Rouder, J. N. (2004-2007). Bayesian hierarchical models for inference with behavioral data. National Science Foundation (SBE-MMS). Total of \$300K.
- Rouder, J. N. and Valle-Inclan, F. (2004-2005) Physiological correlates of the diffusion process. Granted by the Ministry of Education, Government of Spain, Total of \$40K.
- Rouder, J. N., Speckman, P. L. and Sun, D. (2001-2005). A parametric hierarchical framework for inference with skewed distributions. National Science Foundation (SBE-MMS). Total of \$300K.
- Rouder, J. N. (1999-2001) Information processing models for attention, categorization, and multiple choice paradigms. National Science Foundation (SBE-PAC). 7/99-7/01. Total of \$40K.

JOURNAL ARTICLES

- 1. Riefer, D. M., & Rouder, J. N. (1992). A multinomial modeling analysis of the mnemonic benefits of bizarre imagery. *Memory & Cognition*, 20, 601-611.
- 2. Rouder, J. N., (1996). Premature sampling in random walks. *The Journal of Mathematical Psychology*, 40, 287-296.
- 3. Dhzafarov, E. N., & Rouder, J. N. (1996). Empirical discriminability of two models for stochastic relationship between additive components of response time. *The Journal of Mathematical Psychology*, 40, 48-63.
- 4. Ratcliff, R. & Rouder, J. N. (1998). Modeling response time for decisions between two choices. *Psychological Science*, 9, 347-356.
- 5. Love, B., Rouder, J. N., & Wisniewski, E. (1999). A structural account of global and local processing. *Cognitive Psychology*, 38, 291-316.
- Rouder, J. N. (2000). Assessing the roles of change discrimination and accumulation: Evidence for a hybrid race model of perceptual decision making in luminance discrimination. The Journal of Experimental Psychology: Human Perception and Performance. 26, 359-368.
- 7. Rouder, J. N., Ratcliff, R., & McKoon, G. M. (2000). A neural network model of implicit memory for object recognition. *Psychological Science* 11 13-19.
- 8. Ratcliff, R. & Rouder, J. N. (2000). A diffusion model analysis of masking in letter identification. *The Journal of Experimental Psychology: Human Perception and Performance.* 26, 127-140.

- 9. Cowan, N., Rouder, J. N., and Stadler, M. A. (2000) Conjuring a work from the dream time of cognitive psychology. Book review of "On human memory: Evolution, progress, and reflections on the 30th anniversary of the Atkinson-Shiffrin Model." *American Journal of Psychology.* 113, 639-671.
- 10. Rouder, J. N. (2001) Testing evidence accrual models by manipulating stimulus onset. *Journal of Mathematical Psychology.* 45, 334-354.
- 11. Rouder, J. N. (2001) Absolute identification with simple and complex stimuli. *Psychological Science*. 12, 318-322.
- 12. Rouder, J. N. and Gomez, P. (2001) Modeling serial position curves with temporal distinctiveness. *Memory*. Special Edition on Short Term and Working Memory. 9, 301-311.
- 13. Thapar, A. & Rouder, J. N. (2001) Bias in conceptual priming. *Psychonomic Bulletin and Review.* 8, 791-797.
- 14. Rouder, J. N. and King, J. W. (2003) Flanker and negative flanker effects in letter identification. *Perception and Psychophysics*. 65, 287-297.
- 15. Rouder, J. N., Sun, D., Speckman, P. L., Lu, J. and Zhou, D. (2003) A parametric hierarchical framework for response time distributions. *Psychometrika*. 68, 587-604.
- 16. Rouder, J. N. (2004) Efficiency in processing letters and words. *Psychological Review*. 111, 80-93.
- 17. Rouder, J. N. and Ratcliff, R. (2004) Comparing models of categorization. *Journal of Experimental Psychology: General.* 133, 63-82.
- 18. Jiang, Y. Rouder, J. N., and Speckman, P. L. (2004) A note on the sampling properties of the Vincentizing (quantile averaging) procedure. *Journal of Mathematical Psychology.* 48, 186-195.
- 19. Rouder, J. N. and Speckman, P. L. (2004) An evaluation of the Vincentizing method of forming group-level response time distributions. *Psychonomic Bulletin and Review*, 11, 419-427.
- 20. Speckman, P. L. and Rouder, J. N. (2004) A comment on Heathcote, Brown and Mewhort's QMLE estimation method for response time distributions. *Psychonomic Bulletin and Review*, 11, 574-576.
- 21. Cowan, N., Chen, Z., and Rouder, J. N. (2004) Constant capacity in an immediate serial-recall task: A logical sequel to Miller (1956). *Psychological Science*, 15, 634-640.

- 22. Rouder, J. N. and Morey, R. D. and Cowan, N., and Pfaltz, M. (2004) Learning in a unidimensional absolute identification task. *Psychonomic Bulletin and Review*, 11, 932-938.
- 23. Rouder, J. N. and Morey, R. D. (2005) Relational and arelational confidence intervals: A comment on Fidler et al. (2004). *Psychological Science*, 16, 77-79.
- 24. Rouder, J. N., Lu, J., Speckman, P. L., Sun, D., and Jiang, Y. (2005) A hierarchical model for estimating response time distributions. *Psychonomic Bulletin and Review*, 12, 195-223.
- 25. Rouder, J. N. (2005) Are unshifted distributional models appropriate for response time? *Psychometrika*, 70, 377-381.
- 26. Rouder, J. N. (2005) The applicability of deadline models: A comment on Glickman et al. *Psychometrika*, 70.427-430.
- 27. Rouder, J. N. and Lu, J. (2005) An introduction to Bayesian hierarchical models with an application in the theory of signal detection. *Psychonomic Bulletin & Review*, 12, 573-604.
- 28. Rouder, J. N. and Ratcliff, R. (2006) Comparing exemplar- and rule-based theories of categorization. *Current Directions in Psychological Science*, 15, 9-13.
- 29. Rouder, J. N., Morey, R. D., Speckman, P. L., and Pratte, M. S. (2007). Detecting chance: A solution to the null sensitivity problem in subliminal priming *Psychonomic Bulletin & Review*, 14, 597-605.
- 30. Rouder, J. N., Lu, J., Speckman, P. L., Sun, D., Morey, R. D., and Naveh-Benjamin, M. (2007) Signal detection models with random participant and item effects *Psychometrika*, 72, 621-642.
- 31. Morey, R. D., Rouder, J. N., and Speckman, P. L. (2008) A statistical model for discriminating between subliminal and near-liminal performance. *Journal of Mathematical Psychology*, 52, 21-36.
- 32. Rouder, J. N., Morey, R. D., Cowan, N. Zwilling, C. E., Morey, C. C. and Pratte, M. S. (2008) An Assessment of fixed-capacity models of visual working memory. *Proceedings of the National Academy of Sciences*, 105, 5976-5979.
- 33. Rouder, J. N., Lu, J., Morey, R. D., Speckman, P. L., and Sun, D. (2008) A hierarchical process dissociation model. *Journal of Experimental Psychology: General*, 137, 370-389.
- 34. Speckman, P. L., Rouder, J. N., Morey, R. D., & Pratte, M. S. (2008) Delta plots and coherent distribution ordering. *The American Statistician*. 62, 262-266.

- 35. Gomez, P. L. Shutter, J. and Rouder, J. N. (2008) Memory for objects in canonical and non-canonical viewpoints. *Psychonomic Bulletin & Review* 15. 940-944.
- 36. Rouder, J. N., Tuerlinckx, F., Speckman, P. L., Lu, J. and Gomez, P. (2008) A Hierarchical Approach for Fitting Curves to Response Time Measurements. *Psychonomic Bulletin & Review.* 15. 1201-1208.
- 37. Morey, R. D., Pratte, M. S., and Rouder, J. N. (2008) Problematic effects of aggregation in zROC analysis and a hierarchical modeling solution. *Journal of Mathematical Psychology.* 52. 376-388.
- 38. Cowan, N. and Rouder, J. N. (2009) Comment on "Dynamic shifts of limited working memory resources in human vision." *Science*. 323, 877c.
- 39. Rouder, J. N., Speckman, P. L., Sun, D., Morey, R. D., and Iverson, G. (2009) Bayesian t-tests for accepting and rejecting the null hypothesis. *Psychonomic Bulletin & Review.* 16, 225-237.
- 40. Pratte. M. S. and Rouder, J. N. (2009) A task-difficulty artifact in subliminal priming. *Attention, Perception, & Psychophysics*, 71, 1276-1283.
- 41. Rouder, J. N. and Morey, R. D. (2009) The nature of psychological thresholds. *Psychological Review*, 116, 655-660.
- 42. Thapar, A. and Rouder, J. N. (2009) Aging and Recognition Memory for Emotional Words: A Bias Account. *Psychonomic Bulletin & Review*, 16, 699-704.
- 43. Morey, R. D., Rouder, J. N., and Speckman, P. L. (2009) A truncated-probit item response model for estimating psychophysical thresholds. *Psychometrika*. 74, 603-618.
- 44. Pratte M. S., Rouder, J. N., and Morey, R. D. (2010) Separating mnemonic process from participant and item effects in the assessment of ROC asymmetries. *Journal of Experimental Psychology: Learning, Memory and Cognition.* 36, 224-232.
- 45. Despins, L. A, Scott-Cawiezell, J., and Rouder, J. N (2010) Detection of patient risk by nurses: A theoretical framework. *Journal of Advanced Nursing.* **66**, 465–474.
- 46. Rouder, J. N., Pratte, M. S., and Morey, R. D. (2010) Latent mnemonic strengths are latent: A comment on Mickes, Wixted, and Wais (2007). *Psychonomic Bulletin & Review.* 17, 427–435.

- 47. Pratte, M. S., Rouder, J. N., Morey, R. D., and Feng, C. (2010) Exploring the Differences in Distributional Properties Between Stroop and Simon Effects Using Delta Plots. *Attention, Perception, & Psychophysics.* 72, 2013–2025.
- 48. Rouder, J. N., Yue, Y., Speckman, P. L., Pratte, M. S., and Province, J. M. (2010). Gradual Growth vs. Shape Invariance in Perceptual Decision Making. *Psychological Review.* **117**, 1267–1274.
- 49. Pratte, M. S. and Rouder, J. N. (2011) Hierarchical single- and dual-process models of recognition memory. *Journal of Mathematical Psychology.* **55**. 36–46.
- 50. Morey, C. C., Cowan, N. Morey, R. D., and Rouder. J. N. (2011) Flexible attention allocation to visual and auditory working memory tasks: Manipulating reward induces a trade-off. *Attention, Perception, & Psychophysics.* 73. 458–472.
- 51. Rouder, J. N., Morey, R. D., Morey, C. C., and Cowan, N. (2011) How to measure capacity in the change-detection paradigm. *Psychonomic Bulletin & Review.* **18**. 324–330.
- 52. Wetzels, R., Matzke, D., Lee, M. D., Rouder, J. N., Iverson, G. J., and Wagenmakers, E.-J. (2011) Statistical evidence in experimental psychology: An empirical comparison using 855 t tests. *Perspectives in Psychological Science*. **6**. 291–298.
- 53. Rouder, J. N. and Morey, R. D. (2011) A Bayes-Factor Meta Analysis of Bem's ESP Claim. *Psychonomic Bulletin & Review.* **18**. 682–689
- 54. Morey, R. D. and Rouder, J. N. (2011) Bayes factor approaches for testing interval null hypotheses. *Psychological Methods*. **16** 406–419.
- 55. Thiele, J. E., Pratte, M. S., and Rouder, J. N. (2011) On perfect working-memory performance with large numbers of items. *Psychonomic Bulletin & Review.* **18** 958–963.
- 56. Morey, R. D., Rouder, J. N., Pratte, M. S., and Speckman, P. L. (2011) Using MCMC chain outputs to efficiently estimate Bayes factors. *Journal of Mathematical Psychology.* **55**. 368–378.
- 57. Cowan, N. C., Rouder, J. N., Blume, C. L., & Saults, J. S. (2012). Models of verbal working memory capacity: What does it take to make them work? *Psychological Review.* **119**. 480–499.
- 58. Rouder J. N., Morey, R. D., Speckman, P. L., and Province, J. M. (2012). Default Bayes Factors for ANOVA Designs. *Journal of Mathematical Psychology*. **56**. 356–374.

- 59. Province, J. M. & Rouder, J. N. (2012) Evidence for Discrete-State Processing in Recognition Memory. *Proceedings of the National Academy of Sciences.* **109**. 14357-14362.
- 60. Pratte, M. S. & Rouder, J. N. (2012). Assessing the Dissociability of Recollection and Familiarity in Recognition Memory. *Journal of Experimental Psychology: Learning, Memory, and Cognition.* **38**. 1591–1607.
- 61. Rouder, J. N. and Morey, R. D. (2012) Default Bayes Factors for Model Selection in Regression. *Multivariate Behavioral Research.* 47. 877-903.
- 62. Morey, R. D., Romeijn J. W., and Rouder J. N. (2013). The humble Bayesian: Model checking from a fully Bayesian perspective. *British Journal of Mathematical and Statistical Psychology.* **66**. 68-75.
- 63. Rouder, J. N., Morey, R. D., and Province, J. M. (2013). A Bayes-factor Metaanalysis of Recent ESP Experiments: Comment on Storm Tressoldi and Di Risio (2010). *Psychological Bulletin.* **139**. 241-247.
- 64. Lin, X., Sun, D., Speckman, P. L. and Rouder, J. N. (2013) Existence of MLE and posteriors for a recognition-memory model. *Statistics and Probability Letters.* 83. 2415-2421.
- 65. Rouder, J. N. and Geary, D. C. (2014). Children's cognitive representation of the mathematical number line. *Developmental Science.* 17. 525-536.
- 66. Hoekstra, R., Morey, R. D., Rouder, J. N., and Wagenmakers, E.-J. (2014). Robust Misinterpretation of Confidence Intervals. *Psychonomic Bulletin & Review.* 21. 1157-1164.
- 67. Rouder, J. N. (2014) Optional Stopping: No Problem For Bayesians. *Psychonomic Bulletin & Review.* 21. 301-308.
- 68. Morey, R. D., Rouder, J. N., Verhagen, J., and Wagenmakers, E.-J. (2014) Why hypothesis tests are essential for psychological science: A comment on Cummings. *Psychological Science*. **25**. 1289-1290.
- 69. Swagman, A. R., Province, J. M., and Rouder, J. N. (2015) Performance on perceptual word identification is mediated by discrete states. *Psychonomic Bulletin & Review* 22. 265-273.
- Rouder, J. N., Province, J. M., Morey, R. D., Gomez, P. and Heathcote, A. (2015). The Lognormal Race: A Cognitive-Process Model of Choice and Latency with Desirable Psychometric Properties. *Psychometrika*. 80. 491-512.

- Wagenmakers, E.-J., Verhagen, J., Ly, A., Bakker, M. Lee, M. D., Matzke, D. Rouder, J. N., and Morey, R. D. (2015). A power fallacy *Behavioral Research Methods*. 47, 913-917.
- 72. Geary, D. C., Hoard, M. K., Nugent, L., and Rouder, J. N. (2015) Individual differences in algebraic cognition: Relation to the approximate number and sematic memory systems. *Journal of Experimental Child Psychology*, **140**, 211-227.
- 73. Engelhardt, C. E., Mazurek, M. O., Hilgard, J., Rouder, J. N., and Bartholow, B. D. (2015) Effects of violent-video-game exposure on aggressive behavior, aggressive-thought accessibility, and aggressive affect among adults with and without autism spectrum disorder *Psychological Science*. **26**. 1187-1200
- 74. Love et al. (total of 14 authors, 2015) Software to sharpen your stats. *APS Observer.* **28**, Issue 3 (read it online, not sure if there is a page number). Briefly, we wrote an article that was published in the Observer about our JASP software. JASP is an SPSS clone that performs Bayes factor computations in several designs.
- 75. Morey, R. D., Wagenmakers E.- J., and Rouder J. N. (2016). Calibrated Bayes factors should not be used: a reply to Hoijtink, van Kooten, and Hulske. *Multivariate Behavioral Research*. **51**. 11-19.
- 76. Morey, R. D., Hoekstra R., Rouder J. N., Lee M. D., and Wagenmakers E. J. (2016). The Fallacy of Placing Confidence in Confidence Intervals. *Psychonomic Bulletin & Review.* 23. 131-140.
- 77. Morey, R. D., Hoekstra, R., Rouder, J. N., and Wagenmakers, E.-J. (2016). Continued misinterpretation of confidence intervals: Response to Miller and Ullrich. *Psychonomic Bulletin & Review.* 23. 103-123.
- 78. Rouder, J. N., Morey R. D., Verhagen J., Province J. M., and Wagenmakers E.
 J. (2016). Is There a Free Lunch In Inference? Topics in Cognitive Science.
 8., 520-547.
- 79. Rouder, J. N., Morey R. D., and Wagenmakers E. J. (2016). The Interplay between Subjectivity, Statistical Practice, and Psychological Science. *Collabra*. **2**, 1-12.
- 80. Morey, R. D., Romeijn J.- W., and Rouder J. N. (2016). The philosophy of Bayes factors and the quantification of statistical evidence. *Journal of Mathematical Psychology.* **72.** 6-18.

- 81. Mou, Y., Li Y., Hoard M. K., Nugent L. D., Chu F. W., Rouder J. N., et al. (2016). Developmental foundations of children's fraction magnitude knowledge. *Cognitive Development.* **39**, 141-153.
- 82. Rouder, J. N. (2016). The What, Why, and How of Born-Open Data. Behavioral Research Methods. 48. 1062-1069
- 83. Rouder, J. N., Engelhardt C. R., McCabe S., and Morey R. D. (2016). Model Comparison In ANOVA. *Psychonomic Bulletin & Review.* 23, 1779-1786.
- 84. Vergauwe, E, Hardman K. O., Rouder J. N., Roemer E., McAllaster S., and Cowan N. (2016). Searching for serial refreshing in working memory: Using response times to track the content of the focus of attention over time. *Psychonomic Bulletin and Review.* 23, 1818-1824.
- 85. Rouder, J. N., Morey R. D., Verhagen J., Swagman A. R., and Wagenmakers E.- J. (2017). Bayesian Analysis of Factorial Designs. *Psychological Methods*. **22** 304-321.
- 86. Hilgard, J., Engelhardt C. R., and Rouder J. N. (2017). Overstated Evidence for Short-Term Effects of Violent Games on Affect and Behavior: A Reanalysis of Anderson et al. (2010) *Psychological Bulletin*. **143** 757-774
- 87. Ricker, T. C., Thiele J. E., Swagman A. R., and Rouder J. N. (2017). Recognition decisions from visual working memory are mediated by continuous latent strengths. *Cognitive Psychology.* **41**. 1510-1532.
- 88. Hilgard, J., Engelhardt C. R., Bartholow B. D., and Rouder J. N. (2017). How Much Evidence Is p > .05? Stimulus Pre-Testing and Null Primary Outcomes in Violent Video Games Research. *Psychology of Popular Media Culture*. **6**. 361-380.
- 89. Thiele, J. E., Haaf, J. M., and Rouder, J. N. (2017). Is There Variation Across Individuals in Processing? Bayesian Analysis for Systems Factorial Technology *Journal of Mathematical Psychology.* 81. 40-54.
- 90. Haaf, J. M. and Rouder, J. N. (2017). Developing Constraints in Bayesian Mixed Models. *Psychological Methods.* **22.** 779-798.
- 91. Benjamin, D. J. et al., (2018) Redefine statistical significance. *Nature Human Behaviour*. 2(1), 6.
- 92. vanMarle, K, Chu, F. W, Mou, Y., Seok, J. Rouder, J. N., and Geary, D. C. (2018). Attaching Meaning to the Number Words: Contributions of the Object Tracking and Approximate Number Systems. *Developmental Science*. **21** (1) el1295.

- 93. Rouder, J. N., Haaf, J. M., and Aust, F. (2018). From theories to models to predictions: A Bayesian model comparison approach. *Communication Monographs*. **85**. 41-56.
- 94. Chu, F. W., Rouder, J. N., and Geary, D.C. (2018) Children's early understanding of number predicts their later problem-solving sophistication in addition. *Journal of Experimental Child Psychology.* **169**. 73-92.
- 95. Wixted, J. T., Christianfeld, N. J. S., and Rouder, J. N. (2018). A Bayesian Statistical Analysis of the DNA Contamination Scenario. *Jurimetrics*. Winter, 2018, 211-242.
- 96. Rouder, J. N. and Haaf, J. M. (2018). Power, Dominance, and Constraint: A Note on the Appeal of Different Design Traditions. *Advances in Methods and Practices in Psychological Science.* 1. 19-26.
- 97. Vandekerckhove, J., Rouder, J. N., and Kruschke, J. K. (2018) Bayesian methods for advancing psychological science. *Psychonomic Bulletin & Review.* **25**. 1-4.
- 98. Wagenmakers, E.-J. et al. (2018). Bayesian inference for psychology. Part I: Theoretical advantages and practical ramifications. *Psychonomic Bulletin & Review.* **25**. 35-57.
- 99. Wagenmakers, E.-J. et al. (2018). Bayesian inference for psychology. Part II: Example applications with JASP. *Psychonomic Bulletin & Review.* **25**. 58-76.
- 100. Rouder, J. N., Haaf, J. M., and Vandekerckhove, J. (2018). Bayesian inference for psychology, Part IV: Parameter estimation and Bayes factors. *Psychonomic Bulletin & Review.* **25**. 102-113.
- 101. Geary, D. C., van Marle, K. Chu, F., Rouder, J. N., Hoard, M. and Nugent, L (2018). Early Conceptual Understanding of Cardinality Predicts Superior School-Entry Number System Knowledge. *Psychological Sciences.* 29. 191-205.
- 102. Davis-Stober, C. P., Dana, J., and Rouder, J. N. (2018). Estimation accuracy in the psychological sciences *PLoS One*, **13**. e0207239.
- 103. Rouder, J. N., Wixted, J. T., and Christenfeld, N. J. S. (2018). Cognitive-psychology expertise and the calculation of the probability of a wrongful conviction *Psychonomic Bulletin & Review.* **25**. 2380-2388.
- 104. Etz, A., Haaf, J. M., Rouder, J. N., and Vandekerckhove, J. (2018). Bayesian inference and testing any hypothesis you can specify. *Advances in Methods and Practices in Psychological Science*. **1**. 281-295.

- 105. Wixted, J. T., Christenfeld, N. J. S., and Rouder, J. N. (2019). Calculating the posterior odds from a single-match DNA database search. *Law, Probability and Risk.* 18. 1-23.
- 106. Rouder, J. N., Wixted, J. T., and Christenfeld, N. J. S. (2019). Rejoinder for Calculating the Posterior Odds from a Single-Match DNA Database Search. *Law, Probability and Risk.* **18**. 43-51.
- 107. Rouder, J. N. and Haaf, J. M (2019). Minimizing Mistakes In Psychological Science. Advances in Methods and Practices in Psychological Science. 2. 3-11.
- 108. Rouder, J. N. and Haaf, J. M. (2019). A psychometrics of individual differences in experimental tasks *Psychonomic Bulletin & Review.* **26**. 452-467.
- 109. Rouder, J. N. and Morey, R. D. (2019) Teaching Bayes' Theorem: Strength of Evidence as Predictive Accuracy. *The American Statistician.* **73**. 186-190.
- 110. Li, Y., Sheldon, K.M., Rouder, J. N., Bergin, D. A., and Geary, D. C. (2019). Long-Term Prospects and College Students' Academic Performance Journal of Psychoeducational Assessment. 37. 358-371.
- 111. Haaf, J. M. and Rouder, J. N. (2019). Some do and some don't? Accounting for variability of individual difference structures. *Psychonomic Bulletin & Review*. **26**. 772-789.
- 112. Hilgard, J., Engelhardt, C. R., Rouder, J. N., Segert, I. L., and Bartholow, B. D. (2019) Null effects of game violence, game difficulty, and 2D: 4D digit ratio on aggressive behavior. *Psychological Science*. **30**. 606-616.
- 113. Love, J.,..., Rouder, J. N., ..., Wagenmakers, E.-J. (2019) JASP: Graphical Statistical Software for Common Statistical Designs. *Journal of Statistical Software*. **88/2**. (total of 16 authors)
- 114. Wixted, J. T. and Rouder, J. N. (in press). Calculating the posterior odds from a single-match DNA database search with hidden assumptions. *Law, Probability and Risk.* 18. 229?234.
- 115. Snyder, H. J., Rafferty, S. M., Haaf, J. M. and Rouder, J. N. (2019). Common or distinct attention mechanisms for contrast and assimilation? *Attention, Perception, and Performance.* 81. 1944-1950.
- 116. Lee, M.D., ..., Rouder, J. N., ..., Vandekerckhove, J. (in press) Robust modeling in cognitive science. *Computational Brain and Behavior*. (total of 11 authors)

117. Rouder, J. N., Haaf, J. M., Davis-Stober, C. P., and Hilgard, J. (in press) Beyond overall effects: A Bayesian approach to finding constraints across a collection of studies in meta-analysis *Psychological Methods*.

BOOK CHAPTERS

- 1. Rouder, J. N., & Batchelder, W. H. (1998). Multinomial models for the separation of storage and retrieval in paired associate learning. In C. Dowling, F. Roberts, and P. Theuns, (Eds.), *Recent Progress in Mathematical Psychology*. Mahwah, NJ: Erlbaum.
- Rouder, J. N., Speckman, P. L., Steinley, D. Pratte, M. S., and Morey, R. D. (2010). A bootstrap test of shape invariance across distributions. In S. Kolenikov, D. Steinley, & L. Thombs, (Eds.), Statistics in the Social Sciences: Current Methodological Developments New York: Wiley. 159–174.
- 3. Rouder, J. N., Morey, R. D., and Pratte, M. S. (2017) Hierarchical Bayesian Models. In W. H. Batchelder, H. Colonius, E. Dzhafarov, and J. I. Myung, (Eds.), The New Handbook of Mathematical Psychology, Volume 1: Measurement and Methodology. London: Cambridge University Press.
- 4. Wagenmakers, E. J., Verhagen J., Ly A., Matzke D., Steingroever H., Rouder J. N., and Morey R. D. (2017) The Need for Bayesian Hypothesis Testing in Psychological Science. In Lilienfeld, S. O., and Waldman, I. (Eds.) Psychological Science Under Scrutiny: Recent Challenges and Proposed Solutions. Wiley.
- 5. Rouder, J. N. (2018) Delta Plots. In Frey, B. (Eds) The SAGE Encyclopedia of Educational Research, Measurement, and Evaluation. Sage.
- Rouder, J. N. and Province, J. M. (in press) Bayesian Hierarchical Models In Psychological Science: A Tutorial. In Spieler, D. (Eds.) New Methods in Cognitive Psychology. Psychological Press. Expected publication: 11/19.

SOFTWARE

- Morey R. M. and Rouder, J. N. (2013-) BayesFactor Package. An R package for computing Bayes factors with default priors in common designs.
- Love et al. (2015-) JASP. An SPSS clone for statistical analysis. The novel aspect is the inclusion of Bayes factors for model comparisons. I serve as a consultant and cheerleader.

CONFERENCE AND INVITED PRESENTATIONS

Rouder, J. N., Riefer, D. M., and Han, J. (1991). Multinomial modeling the benefits of bizarre imagery. Presented at the 24th Annual Mathematical Psychology Meeting in Bloomington, IN.

- Riefer, D. M. & Rouder, J. N. (1991). Memory for bizarre imagery: A multinomial modeling analysis. Presented at the 32nd Annual Meeting of the Psychonomics Society in San Francisco, CA.
- Rouder, J. N. (1992). A multinomial model for separating storage and retrieval in paired associate learning. Presented at the 25th Annual Mathematical Psychology Meeting in Palo Alto, CA.
- Rouder, J. N. (1993). Towards a nonasymptotic, distribution-free decomposition of simple reaction time. Presented at the 26th Annual Mathematical Psychology Meeting in Norman, OK.
- Rouder J. N. (1994). On change detectors, level detectors, and timing mechanisms in choice response times. Presented at the 27th Annual Mathematical Psychology Meeting in Seattle, WA.
- Rouder, J. N. & Dzhafarov, E. N. (1995). Empirical discriminability of two models for the stochastic relationship between additive components of response time. Presented at the 28th Annual Mathematical Psychology Meeting in Irvine, CA.
- Rouder, J. N. & Ratcliff, R. (1996). An object recognition model of implicit memory effects. Presented at the Hoosier Mental Life Conference, Northwestern University.
- Ratcliff, R. & Rouder, J. N. (1996). The random walk model of two-choice reaction time I. Presented at the Midwest Response Times Conference, Purdue University.
- Rouder, J. N. and Ratcliff R. (1996). The random walk model of two-choice reaction time II. Presented at the Midwest Response Times Conference, Purdue University.
- Rouder, J. N. (1996). Assessing the roles of change discrimination and accumulation: Evidence for a hybrid model of perceptual decision making. Presented at the 29th Annual Mathematical Psychology Meeting in Chapel Hill, NC. Abstract published, *Journal of Mathematical Psychology*.
- Rouder, J. N. (1997). An object recognition model of implicit memory effects. Quantitative Psychology Colloquium Series, Purdue University.
- Ratcliff, R. and Rouder, J. N. (1997). A diffusion model analysis of masking in letter identification. Presented at the Annual Meeting of the Australian Mathematical Psychology Meeting, Newcastle, Australia.

- Rouder, J. N., Ratcliff, R., & McKoon, G. M. (1997). An object recognition model of implicit memory effects. Presented at the 30th Annual Mathematical Psychology Meeting in Bloomington, IN. Abstract published, Journal of Mathematical Psychology.
- Rouder, J. N., Ratcliff, R., & McKoon, G. M. (1997). An object recognition model of implicit memory effects. Presented at 38th Annual Psychonomics Meeting.
- Rouder, J. N. (1998). An object recognition model of implicit memory effects. Johns Hopkins University Psychology Department.
- Rouder, J. N. (1998). An object recognition model of implicit memory effects. University of North Texas Psychology Department.
- Rouder, J. N. (1998) Integration and differentiation in luminance discrimination. Presented as a poster at the 39th Annual Psychonomics Meeting.
- Rouder, J. N. (1999). An object recognition model of implicit memory effects. Georgia Institute of Technology, Department of Psychology.
- Rouder, J. N. (1999). An object recognition model of implicit memory effects. University of Missouri - Columbia, Department of Psychology. University.
- Rouder, J. N. (1999). An object recognition model of implicit memory effects. University of Texas at Arlington, Department of Psychology.
- Rouder, J. N. (1999). A paradigm for testing models of categorization. SUNY-Albany & Williams College Cognitive Psychology Summer Workshop.
- Rouder, J. N. and Ratcliff, R. (1999). A paradigm for testing models of categorization. Poster presented at the 40^{th} Annual Psychonomics Meeting.
- Thapar, A. and Rouder, J. N. (1999). Bias in semantic priming. Poster presented at the 40^{th} Annual Psychonomics Meeting.
- Rouder, J. N. (2000) The case for opposing processing deficits in line-length and letter identification. Presented at Showme Mental State Conference, Washington University.
- Rouder, J. N. (2001) The case for opposing processing deficits in line-length and letter identification. Presented at Showme Mental State Conference, University of Missouri-Columbia.

- King J. W. and Rouder, J. N. (2001) Assimilation and contrast in the Eriksen flanker effect. Presented at Showme Mental State Conference, University of Missouri-Columbia.
- Rouder, J. N. (2001) The case for opposing processing deficits in line-length and letter identification. Presented at Applied Statistics Conference, University of Missouri-Columbia.
- Rouder, J. N. (2001) The case for opposing processing deficits in line-length and letter identification. Presented at the University of Indiana Department of Psychology Colloquium.
- Rouder, J. N. (2001) The case for opposing processing deficits in line-length and letter identification. Presented at the American Psychological Science Meetings, Toronto.
- Rouder, J. N. (2001) The case for opposing processing deficits in line-length and letter identification. Presented at Psychonomics Meetings, Orlando, FL.
- Rouder, J. N. (2002) A Hierarchical Bayesian Approach to the Statistical Analysis of Response Time. Presented at Washington University's Department of Psychology Colloquium..
- Rouder, J. N. (2002) Decision Processes in Pattern Recognition. Presented at The University of Texas at Arlington's Department of Psychology Colloquium.
- Rouder, J. N. (2002) Decision Processes in Pattern Recognition. Presented at Lehigh University's Department of Psychology Colloquium.
- Rouder, J. N., Sun, D., Speckman, P. L., and Lu, J. (2002) A Hierarchical Bayesian Approach to the Statistical Analysis of Response Time. Presented at Psychonomics Meetings, Kansas City, MO.
- Bowling, A. M. and Rouder, J. N. (2003) Behavioral Evidence for the Where-What Pathway Dissociation. Presented at the Midwestern Psychological Association Meetings in Chicago, Il.
- Lu, J., Sun, D., Speckman, P. L, and Rouder, J. (2003) Hierarchical Priors for Practice Effects in Response Time. Presented at the Joint Meetings of the American Statistical Association, San Francisco, CA.
- Rouder, J. N., Lu, J., Speckman, P. L., and Morey, R. D. (2003) Statistical

- Models of Skill Learning. Presented at Psychonomics Meetings, Vancouver, BC.
- Rouder, J. N. (2004) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at University of Illinois's Department of Psychology Colloquium.
- Pratte, M. S., Rouder, J. N., and Thapar, A. (2004) A double-prime test of spreading activation in semantic priming. Presented at the Midwestern Psychological Association Meetings in Chicago, II.
- Rouder, J. N., Lu, J., Speckman, P. L., and Morey, R. D. (2004) Statistical Models of Skill Learning. Presented at the American Psychological Society Meetings, Chicago, IL.
- Morey, R. D., and Rouder, J. N. (2004) Models of Absolute Identification. Presented at the American Psychological Society Meetings, Chicago, IL.
- Lu, J., Sun, D., Speckman, P. L, and Rouder, J. (2004) Bayesian hierarchical models for process dissociation procedure in memory research. Presented at the Joint Meetings of the American Statistical Association, San Francisco, CA.
- Rouder, J. N. (2004) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at University of Gent, Belgium.
- Rouder, J. N. (2004) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at University of Leuven, Belgium.
- Rouder, J. N. & Ratcliff, R. (2004) Comparing categorization models. Presented at University of Leuven, Belgium.
- Rouder, J. N. (2005) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at Valencia University, Spain.
- Rouder, J. N. (2005) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at Purdue University.
- Rouder, J. N., Lu, J., Sun, D., Speckman, P. L. and Morey, R. D. (2005) Hierarchical Models of Process Dissociation. Presented at Psychonomics Meetings, Toronto.
- Rouder, J. N. (2005) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at University of Southern Florida.

- Rouder, J. N. and Tuerlinckx, F. (2006) Stochastic dominance and hierarchical approaches in modeling parameteric functional relations. Presented at the Conference on Diffusion Processes in Psychology, Frieburg, Germany.
- Rouder, J. N. (2006) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at University of Virginia
- Rouder, J. N. (2006) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at University of Maryland.
- Rouder, J. N. (2006) The Power Law of Word Frequency Effects. Presented at Showme Mental State Conference, Washington University.
- Rouder, J. N. and Tuerlinckx, F. (2006) The Power Law of Word Frequency Effects. Presented at Psychonomics Meetings, Houston.
- Rouder, J. N. (2006) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at University of California, Irvine
- Rouder, J. N. (2007) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at University of Missouri-Rolla
- Rouder, J. N. (2007) Hierarchical Models for Perceptual and Cognitive Psychology. Presented at Iowa State University
- Rouder, J. N. (2007) Antetheory in the study of cognition. Presented at Washington University.
- Morey, R. D. and Rouder, J. N. (2007) A Mass-At-Chance model for assessing subliminal perception. Presented at the European Society for Experimental Psychology, Edinborough, Scotland.
- Rouder, J. N. (2007) Dispersion in Hierarchical Models. Presented at the Meetings of the Society for Mathematical Psychology, Costa Mesa, CA.
- Pratte, M. S., Rouder, J. N. and Morey, R. D. (2007) Modeling participant and item effects in the theory of signal detection Presented at the Meetings of the Society for Mathematical Psychology, Costa Mesa, CA.
- Rouder, J. N. (2007) Bayesian hierarchical models for experimental psychologusts. Presented at Indiana University.
- Morey, R. D., Rouder, J. N., and Speckman, P. (2007) A Mass-At-Chance model for assessing subliminal perception. Presented at the Psychonomic Society Annual meeting, Long Beach, CA

- Pratte, M. S. and Rouder, J. N. (2007) A task-difficulty artifact in subliminal priming. Presented at the Psychonomic Society Annual meeting, Long Beach, CA
- Rouder, J. N. (2007) Bayesian hierarchical models for experimental psychologusts. Presented at University of Massachusetts.
- Wenzlick, K. Rouder, J. N. and Pratte, M. S. (2008) The time course of Simon and Stroop tasks. Presented at the Midwestern Psychological Association meeting, Chicago, IL.
- Rouder, J. N. (2008) Bayesian t-tests for accepting and rejecting the null hypothesis. Presented at Showme Mental State Conference, University of Missouri.
- Rouder J. N. (2008) Hierarchical models of mnemonic process. Presented at the Conference on Memory and Judgement, Mannheim, Germany.
- Rouder, J. N. and Morey, R. D. (2008) Adapting item-response models to measure psychophysical thresholds. Presented at the Society for Mathematical Psychology. Washington, D.C.
- Rouder, J. N. and Morey, R. D. (2008) Keynote Address: Adapting itemresponse models to measure psychophysical thresholds. To be presented at the European Mathematical Psychology Group. Graz, Austria.
- Morey, R. D. and Rouder, J. N. (2008) Is there subliminal priming? European Mathematical Psychology Group. Graz, Austria.
- Rouder, J. N. (2008) Bayesian t-tests for accepting and rejecting the null hypothesis. Psychonomic Society Annual meeting, Chicago, IL.
- Rouder, J. N. (2009) Using Bayesian hierarchical models to search for structure in recognition memory. Department of Psychology Colloquium. University of Leuven, Belgium.
- Rouder, J. N. (2009) Item-Response Models of Psychophysical Thresholds. Statistical and Applied Mathematical Sciences Institute (SAMSI) Summer Workshop on Psychometrics.
- Rouder, J. N. (2009) The Assessment of Invariances in Behavioral Experiments. Department of Statistics Colloquium, University of Missouri.
- Cusumano, M., Rouder, J. N., and Cowan, N. (2010) Evidence for discrete slots in wisual working memory. Presented at the Midwestern Psychological

- Association meeting, Chicago, IL.
- Moss, G., Pratte, M.S., and Rouder, J. N., (2010) Is recognition memory mediated by one or more than one process? Presented at the Midwestern Psychological Association meeting, Chicago, IL.
- Cade, E., Pratte, M.S., and Rouder, J. N., (2010) The time course of Stroop and Simon interference. Presented at the Midwestern Psychological Association meeting, Chicago, IL.
- Rouder, J. N. (2010) An Axiomatic Definition of Single Process in Recognition Memory. Presented at Showme Mental State Conference, Washington University.
- Rouder, J. N. (2010) Axioms of a single-process memory system. Presented at the Psychonomics Society Conference, St. Louis, MO
- Rouder, J. N. and Pratte, M. S. (2010) A Hierarchical Bayesian Dual-Process Model Reveals That Recognition Memory May Be Mediated by a Single Process. Presented at the Psychonomics Society Conference, St.Louis, MO
- Rouder, J. N. (2011) Bayes Factors for Psychological Research. Presented at U.C. Irvine.
- Rouder, J. N. (2011) Exploring the structure of recognition memory. Presented at U.C. Davis
- Rouder, J. N. (2011) Exploring the structure of recognition memory. Presented at Newcastle University (Australia).
- Rouder, J. N. (2011) Bayes factors for psychological research. Presented at the Midwestern Psychological Association Meetings, Chicago, IL.
- Province, J. M. and Rouder, J. N. (2011) Discrete-state processing in recognition memory. Presented at the Society for Mathematical Psychology Meetings. Boston, MA.
- Rouder, J. N. (2011) The structure of recognition memory. Presented at University of Texas-Austin.
- Rouder, J. N. (2012) The structure of recognition memory. Presented at the University of Groningen. Groningen, Netherlands.

- Swagman, A. and Rouder, J. N. (2012) Discrete-state processing in recognition memory. Presented at the Showme Mental State Conference, Columbia, MO.
- Hargrove, S. K., Province, J. M. and Rouder, J. N. (2012) Assessing Whether the Remember-Know Paradigm Provides Evidence for Separate Mnemonic Processes: An Examination of Word and Non-word Effects. Presented at The Midwestern Psychological Association. Chicago, IL
- Downing, D., Thiele, J. E., and Rouder, J. N. (2012) Isolating Top-Down and Bottom-Up Influences in Eriksen Flanker Inhibition. Presented at The Midwestern Psychological Association. Chicago, IL
- Rouder, J. N.(2012) Default Bayes factors for ANOVA designs. Presented at the Psychometrics Society Meetings. Lincoln NE.
- Rouder, J. N., Theile, J. E., and Cowan, J. N. (2012) The evidence for discrete-state models of working memory. Presented at the Portland Conference on Working Memory. Portland, OR.
- Rouder, J. N., Province, J. M. and Swagman, A. (2012) Recognition memory is a discrete-state process. Presented at the Psychonomics Conference, Minneapolis, MN.
- Rouder, J. N. (2013) The structure of recognition memory. Presented at the Air Force Office of Sponsored Research: Cognitive, Decision, and Computational Intelligence Program Review. Washington D.C.
- Rouder, J. N. (2013) Bayesian inference in psychology. Presented at Kansas State University, Manhattan, KS.
- Rouder, J. N. (2013) Bayesian inference in psychology. Presented at Purdue University, West Lafayette, IN
- Rouder, J. N.(2013) From ROC curves to psychological theory. Presented at University of Mannheim, Germany.
- Rouder, J. N. (2013) From ROC curves to psychological theory. Presented at University of Cologne, Germany.
- Rouder, J. N. (2013) From ROC curves to psychological theory. Presented at University of Frieburg, Germany.
- Rouder, J. N. (2013) Bayesian inference in psychology. Presented at Katholieke Universiteit, Leuven, Belgium.

- Rouder, J. N. (2013) Bayesian inference in psychology. Presented at Zurich University, Zurich, Switzerland.
- Rouder J. N. (2013) From ROC curves to psychological theory. Presented at Annual Summer Interdisciplinary Conference For Cognitive Science. Corina d'Ampezzo, Italy.
- Rouder, J. N. (2013) Bayesian inference in psychology. Presented at Vanderbilt University, Nashville, TN. Included a two-hour workshop on our new Bayes Factor R package.
- Rouder, J. N. (2014) Bayesian inference in psychology. Presented at University of California, Irvine.
- Rouder, J. N. (2014) Benchmarks in recognition memory. Benchmarks in Working Memory, Emmerton, Switzerland
- Rouder, J. N. and Thiele, J. E. (2014) Discrete states in working nemory. Presented at The Psychonomics Society, Long Beach CA
- Rouder, J. N. (2014) Discrete states in working memory. Presented at Annual Summer Interdisciplinary Conference For Cognitive Science. Moab, UT.
- Rouder, J. N. (2015) How to Tell if Memory and Perceptual Processes Are Mediated By Continuous Strength or Discrete States. Invited lecture at Association for Psychological Sciences, New York
- Rouder, J. N & Morey, R. D. (2015) The Need for Bayesian Hierarchical Modeling in Cognition: Assessing Subliminal Priming Joint Meetings of the American Statistical Association.
- Rouder, J. N. (2015) Why Beliefs Matter for Good Science. University of Missouri Distinguished Lecture Series.
- Swagman, A. R. & Rouder, J. N. (2015) Testing Bayesian Ideal-Observer Models of Perception. Psychonomics, Chicago.
- Gomez, P. L. & Rouder, J. N. (2016) Taller de estad Statistica Bayesiana. VII Convencion Intercontinental de Psicologia., Havana, Cuba.
- Rouder, J. N. (2016) *Modeling Constraints in Psychological Science*. Dept. of Cognitive Science, University of California, Irvine, CA.
- Rouder, J. N. (2016) *Modeling Constraints in Psychological Science*. Dept. of Psychology / Cognitive Area. Ohio State University, Columbus, OH.

- Rouder, J. N. (2016) Modeling Constraints in Psychological Science. School of Education, Central Normal University, Wuhan, China.
- Haaf, J. M. & Rouder, J. N. (2016) Assessing invariances and order constraints in mixed linear models. Psychonomics, Boston, Mass.
- Rouder, J. N. (2017) Elements of constraint: A Bayesian approach to defining and assessing invariances, order constraints, and mixtures. Society for Experimental Psychology, Nashville, TN 2017.
- Rouder, J. N. (2017) Does Everyone Stroop? Developing Constraints in Bayesian Mixed Models. Department of Psychology, University of Leuven, Leuvan, Belgium
- Rouder, J. N. (2017) Inference on Systems of Order Constraints. Keynote of Meeting of the Belgium Statistical Society. Leuven, Belgium.
- Haaf, J. M. and Rouder, J. N. (2017) Does everyone or do some not? Model comparison with variation in strategy. Psychonomics, Vancouver, Canada.
- Snyder, H. K., Rafferty, S. M., Haaf, J. M., and Rouder, J. N. (2017) Common or Distinct Mechanisms of Contrast and Assimilation. Psychonomics, Vancouver, Canada.
- Rouder, J. N. (2017) Teaching Open Science. Psychonomics, Vancouver, Canada.
- Rouder, J. N. and Haaf, J. M (2017) Inference on Constellations of Orders. Psychonomics, Vancouver, Canada.
- Rouder, J. N. (2018) Theory as Order Constraints: A Bayes Factor Approach. SMiPs, Freiburg, Germany.
- Rouder, J. N. (2018) Theory as Order Constraints: A Bayes Factor Approach. DGPS, Frankfurt, Germany.
- Rouder, J. N. (2018) Theory as Order Constraints: A Bayes Factor Approach. Invited Colloquium, UC Riverside Department of Psychology.
- Rouder, J. N. (2018) Conceptualizing and Measuring Individual Variation in Simple Cognitive Tasks: The Case of Inhibition. Invited Colloquium, Claremont Graduate School.
- Rouder, J. N. (2018) *Bayes Factors*. Invited Colloquium, UC Riverside Department of Psychology.

- Rouder, J. N., Kumar, A., and Haaf, J. M. (2018) Conceptualizing and Measuring Individual Variation in Simple Cognitive Tasks: The Case of Inhibition. Psychonomics, New Orleans.
- Haaf, J. M. and Rouder, J. N. Beyond Overall Effects: A Bayesian Approach to Finding Constraints In Meta-Analysis. (2018) Psychonomics, New Orleans.
- Rouder, J. N. (2019) Why Individual Difference Studies With Cognitive Tasks Are Doomed to Fail. Invited Colloquium, Freiburg University (Germany), Department of Psychology.
- Rouder, J. N. (2019) I Why Individual Difference Studies With Cognitive Tasks Are Doomed to Fail. Invited Colloquium, University of Zurich (Switzerland), Department of Psychology.
- Rouder, J. N. (2019) Why Individual Difference Studies With Cognitive Tasks Are Doomed to Fail. Invited Colloquium, University of Amsterdam (Netherlands), Department of Psychology.
- Rouder, J. N. (2019) Qualitative vs. Quantitative Individual Differences: Implications for Cognitive Control. Keynote Speaker, European Mathematical Psychology Conference, Heidelberg, Germany.

TEACHING EXPERIENCE

2018	Undergraduate course on intelligence and high-stakes testing.
2017 -	Graduate-level course on practicing open science
2013 - 2017	Graduate-level course on academic writing.
2012 - present	Graduate-level course on Bayesian statistics for social scientists.
2011 - present	Undergraduate course on statistics. Basics of statistical inference with lab work.
2005	Graduate-level course on fMRI
2003-2017	Graduate-level course on nonlinear statistical models for cognitive and perceptual psychologists
2002	Graduate-level course on visual perception.
2000-2010	Undergraduate Research Design. Basics of statistical and scientific reasoning and causal inference. Writing Intensive.
2001	Participated in a year-long course designed to help improve teaching. The course consists of both junior and senior teachers who discuss issues and constructively evaluate teaching styles.

2000 Participated in two-day seminar on teaching writing intensive

classes.

1999 -2001 Statistics. A first-year graduate-level course that covered prob-

ability, hypothesis testing, basic ANOVA, and ANOVA for

complex designs.

1998 Adjunct Faculty, Northwestern University

Experimental Design. Emphasized that statistical and quanti-

tative arguments are critical thinking skills.

GRADUATE STUDENTS (major advisor)

Yi Jiang, Psychological Sciences & Statistics, Masters, 2002.

Rodica Ghinescu, Psychological Sciences, PhD, 2004.

Ju Lu, Statistics, PhD., 2004

Richard Morey, Psychological Sciences, PhD., 2008.

Michael Pratte, Psychological Sciences, PhD., 2010.

Jonathan Thiele, Psychological Sciences; PhD. 2015.

April Swagman, Psychological Sciences; PhD. 2016

Julia Haaf,, Psychological Sciences; PhD. 2018

Hope Snyder, Psychological Sciences; Masters, 2018

Pele Schramm, Cognitive Sciences, Ph.D. 2019.

Aakriti Kumar, Cognitive Sciences, current

Postdoctoral Fellow

Timothy J. Ricker, 2014-2015.

PROFESSIONAL AFFILIATION AND SERVICE

Associate Editor: Psychological Methods

Guest Editor Psychonomic Bulletin & Review, Journal of Mathematical Psychology.

Editorial Boards: Psychonomic Bulletin & Review, Experimental Psychology, Journal of Mathematical Psychology.

Ad-hoc Reviewer for Psychological Review, Mathematical Social Sciences, Journal of Experimental Psychology: Human Perception and Performance, Journal of Experimental Psychology: General, Journal of Experimental Psychology: Learning, Memory, and Cognition, Psychometrica, Cognitive Psychology, Journal of Mathematical Psychology The British Journal of Mathematical and Statistical Psychology, British Journal of Psychology, Memory & Cognition, Journal of Memory and Language, Perception and Psychophysics.

Ad-hoc Reviewer for National Science Foundation & National Institutes of Health.

Panel Reviewer for National Science Foundation.

Member: Psychonomic Society, Psychometrics Society.

UNIVERSITY AND COMMUNITY SERVICE (at MU)

1999-2002	Statistical Consultant.
2000-2004	Member of Applied Statistics Conference Steering Committee.
2000-2004	${\bf Midwestern\ Psychological\ Society\ Department\ Representative}.$
2001 - 2002	Member of Interdisciplinary Program in Neurosciences Admissions Committee
2001	Faculty Advisor - APS Student Group, MU Chapter.
2003-2006	Member of MU's Advisory Committe on Student Organizations, Governments, and Associations (SOGA).
2005-2009	Member of MU's Brain Imaging Center Steering Committee.
2005-	Chairperson of MU's Dept. of Psychological Sciences Website and Scholarly Communications committee.
2011-2012	Member of Dean's Award Committee.
2013-2015	Member of MU's Computer Cyberinfrastructure Committee
2013-2015	Member, Department Advisory Committee
2015-2017	Member, Campus Faculty Council
2015-2017	Chair, Ad-Hoc Committee of Inquiry in Faculty Misconduct
2015-2017	Representative of Arts & Science, Faculty Council
2016-2017	Member, Select Committee on Faculty Governance
2016	Member, College Diversity-Curriculum Committee