
SIMON N. VANDEKAR

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Office Address:

Department of Biostatistics
Vanderbilt University Medical Center
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615-875-2325

Education:

University of Pennsylvania, Philadelphia, PA	2014-2018
Ph.D. in Biostatistics	
Dissertation advisor: Russell T. Shinohara	

Pennsylvania State University, State College, PA	2005-2009
B.S. in Psychology-Neuroscience	

Academic Appointments:

Associate Professor of Biostatistics	2024-present
Assistant Professor of Biostatistics	2018-2024
Director of Graduate Recruitment	2022-present
Department of Biostatistics	
Vanderbilt University, School of Medicine	

Professional Activities:

Intramural:

Chair, 20 th Anniversary Celebration Committee	2023
Member, Comprehensive Exam Committee	2021-present
Member, Department of Biostatistics Search Committee	2021-present
Member, Department of Biostatistics Graduate Admissions Committee	2022-present
Member, Summer Internship for Underrepresented Undergraduates	2022-present

Extramural:

Program Chair Elect - Section on Statistics in Imaging Section, American Statistical Association (ASA)	2020-2021
Program Chair - Section on Statistics in Imaging Section, ASA	2021-2022
Program Chair - Statistical Methods in Imaging Conference 2022	2021-2022
President - Middle TN Chapter, ASA	2022-2023

Committee Member - Statistical Methods in Imaging Conference 2023 2022-2023

Editorial Experience:

Reviewer:

Bioinformatics, Biometrics, Biostatistics, Human Brain Mapping, Journal of the American Medical Association Psychiatry, Journal of the American Medical Association Otolaryngology, Journal of the American Statistical Association, IEEE Journal of Biomedical Health Informatics, Journal of the Royal Statistical Society Series B, The Lancet Psychiatry, Neuroimage, Neuron, PLOS ONE, Psychoneuroendocrinology, IEEE Transactions on Medical Imaging, Statistical Methods in Medical Research, WIREs Computational Statistics

Associate Editor:

Biostatistics

2024-present

Teaching Experience:

Didactic:

Teaching Assistant, Categorical and Survival Analysis

Spring 2016

Teaching Assistant, Linear Models and GLMs

Spring 2017

Teaching Assistant, Categorical and Survival

Spring 2018

Instructor, Substantially revised BIOS6311

Fall 2020-Fall 2023

Instructor, Summer Internship for Underrepresented Undergrads *Summer 2022*

Research Supervision:

Nicholas Strayer (PhD Biostatistics 2019), Role: Committee Member

Kavya Sharman (PhD Chemical and Physical Biology 2022), Role: Committee Member

Cody Heiser (PhD Chemical and Physical Biology 2023), Role: Committee Member

Harsimran Kaur (PhD Chemical and Physical Biology), Role: Committee Member

Coleman Harris (PhD Biostatistics 2022), Role: Dissertation Advisor

Kenneth Liao (MS Biostatistics, 2024), Role: Dissertation Advisor

Kaidi Kang (PhD Biostatistics), Role: Dissertation Advisor

Jiangmei (Ruby) Xiong (PhD Biostatistics), Role: Dissertation Advisor

Megan Jones (PhD Biostatistics), Role: Dissertation Advisor

Julia Sheffield, PhD (assistant professor of psychiatry and behavioral sciences),

Role: K23 Biostatistics Mentor

Heather Ward, MD (assistant professor of psychiatry and behavioral sciences),

Role: K23 Biostatistics Mentor

Xinyu Zhang (PhD Biostatistics), Role: Research Assistantship Supervisor

Membership:

American Statistical Association

2014-present

Eastern North America Region (ENAR)

of the International Biometric Society

2015-present

Organization for Human Brain Mapping

2015-2016

Grant Support:

R01MH133843 (Vandekar)	07/01/2023-6/30/2028
	1.20 calendar months
NIMH	\$181,525
Precision brain charts for imaging-genomics of schizophrenia and the psychosis spectrum	
Role: Site Principal Investigator	
 R01DK133415 (McKernan)	 05/05/2023-2/29/2028
	0.60 calendar months
NIDDK	\$686,309
Mechanistic-Based Treatment of Interstitial Cystitis/Bladder Pain Syndrome	
Role: Co-Investigator	
 P50MH132642-01 (Woodward)	 04/03/2023 - 03/31/2028
	0.3 calendar months
NIMH	\$2,162,500 (total)
Functional and behavioral dissection of higher order thalamocortical circuits in schizophrenia	
Role: Biostatistician	
 R01MH112847-06A1 (Vandekar)	 09/01/2022-06/30/2027
	1.2 calendar months
NIMH	\$26,855 (annual total)
Inter-modal Coupling Image Analytics	
Role: Site Principal Investigator	
 R01HD107695 (Corbett)	 09/01/2022 - 06/30/2027
	0.60 calendar months
NICHD	\$3,330,139
Pubertal, Psychological and Physiological Development in Females with Autism	
Role: Co-Investigator	
 K24MH126280 (Woodward)	 09/15/2021-08/31/2026
	0.3 calendar months
NIMH	\$149,320 (annual total)
Research and mentoring on cognitive neuroscience and high-field MRI of the thalamus in schizophrenia	
Role: Co-Investigator	
 R01MH123563 (Vandekar)	 08/01/2020-05/31/2025
	2.40 calendar months
NIMH	\$2,113,210
Semiparametric Inference for Psychiatric Neuroimaging	
Role: Principal Investigator	
 K23DK118118 (McKernan)	 05/13/2019-03/31/2023
	0.60 calendar months
NIDDK	\$686,309

Optimizing Psychosocial Treatment of Interstitial Cystitis/Bladder Pain Syndrome
Role: Biostatistician

R01MH118273 (Heckers) 08/01/2019-05/31/2024
0.60 calendar months
NIMH \$3,689,156
The General Factor of Psychopathology in Psychosis and Severe Mental Illness
Role: Co-Investigator

R01NS109114 (Smith) 09/15/2018-06/30/2023
0.96 calendar months
NINDS \$1,733,700
Structural and functional MRI of the cervical spinal cord in multiple sclerosis
Role: Co-Investigator

U2CCA233291-01 (Coffey) 09/20/2018-06/30/2023
3.00 calendar months
NCI \$10,993,061
Integrative single-cell atlas of host and microenvironment in colorectal neoplastic transformation: data analysis
Role: Co-Investigator

R01MH115000 (Woodward) 06/04/2018-03/31/2022
0.60 calendar months
NIMH \$1,587,494
Development of thalamocortical circuits and cognitive function in healthy individuals and youth at-risk for psychosis
Role: Co-Investigator

R01MH111599 (Corbett) 07/01/2017-05/31/2022
0.60 calendar months
NIMH \$2,348,293
Examining stress and arousal across pubertal development in ASD
Role: Co-Investigator

R01MH070560 (Heckers) 02/07/2005-03/31/2026
1.2 calendar months
NIMH \$818,430 (annual total)
Imaging Hippocampal Function in Psychosis
Role: Co-Investigator

Invited Presentations:

1. "Effect sizes and replicability in longitudinal studies of brain-phenotype associations," 2024. Joint Statistical Meetings (JSM). Portland, OR.
2. "Normalization and Cell Phenotyping for mIF Data," 2024. Pacific Symposium on Biocomputing. Kona, HI.
3. "Effect Sizes and Replicability in Brain-wide Association Studies (BWAS)," 2023. Computational and Methodological (CM) Statistics Conference. Berlin, Germany.

4. "Robust and reproducible group-level neuroimage analysis in R with the pbj package," 2022. CM Statistics Conference. London, UK.
5. "Cell Normalization and Phenotyping for Multiplexed Single-Cell Imaging," 2022. Jefferson University, Philadelphia, PA.
6. "Cell Normalization and Phenotyping for Multiplexed Single-Cell Imaging," 2022. JSM. Washington, DC.
7. "Cell Normalization and Phenotyping for Multiplexed Single-Cell Imaging," 2022. ENAR Conference. Houston, TX.
8. "A robust measure of effect size for neuroimage analysis," 2021. CM Statistics Conference. London, UK.
9. "A general measure of effect size for neuroimaging analysis," 2021. Department of Biostatistics, Emory University. Virtual.
10. "A general measure of effect size for neuroimaging analysis," 2021. Penn Statistical Imaging Endeavor, University of Pennsylvania. Virtual.
11. "Robust spatial extent inference in R using the pbj package," 2021. Department of Biostatistics, University of California, San Francisco. Virtual.
12. "Thresholding Statistical Maps by Effect Sizes for Spatial Extent Inference of Neuroimages," 2020. CM Statistics Conference. London, UK.
13. "Robust Spatial Extent Inference in R using the pbj Package," 2020. Department of Epidemiology and Biostatistics, University of San Francisco. San Francisco, CA.
14. "Robust Spatial Extent Inference in R using the pbj Package," 2019. Department of Biomedical Informatics, University of Arkansas for Medical Sciences. Little Rock, AR.
15. "Robust Spatial Extent Inference in R using the pbj Package," 2019. Department of Biostatistics, Boston University. Boston, MA.
16. "Robust Spatial Extent Inference in R using the pbj Package," 2019. Department of Statistics, Indiana University, Bloomington. Bloomington, IN.
17. "On Testing the Spatial Correspondence Between Maps of Human Brain Structure and Function," 2019. International Chinese Statistical Association. Raleigh, NC.
18. "Robust Spatial Extent Inference with a Semiparametric Bootstrap Joint Testing Procedure," 2019. Statistical Methods in Imaging. Irvine, CA.
19. "Robust Spatial Extent Inference with a Semiparametric Bootstrap Joint Testing Procedure," 2019. ENAR Conference. Philadelphia, PA.
20. "Association Tests for Neuroimaging Studies of Development and Disease," 2018. Columbia University. New York, NY.
21. "Association Tests for Neuroimaging Studies of Development and Disease," 2018. Johns Hopkins University. Baltimore, MD.
22. "Powerful, Fast, and Robust Family-Wise Error Control for Neuroimaging," 2017. JSM. Baltimore, MD.
23. "More Powerful Permutation Tests Using Voxel-wise Transformations," 2017. Statistical Methods in Imaging. Pittsburgh, PA. – Student paper award
24. "Analysis of Spatially Correlated Developmental Neuroimaging Data," 2015. North Carolina State University. Raleigh, NC.
25. "Multivariate Nonlinear Age Trajectories in Cortical Thickness," 2013. Johns Hopkins University. Baltimore, MD.

Peer Reviewed Publications:

1. Dennis, Nancy A., Caitlin R. Bowman, and Simon N. **Vandekar**. 2012. "True and Phantom Recollection: An fMRI Investigation of Similar and Distinct Neural Correlates and Connectivity." *Neuroimage* 59 (3): 2982–93.
2. Satterthwaite, Theodore D., Russell T. Shinohara, Daniel H. Wolf, Ryan D. Hopson, Mark A. Elliott, Simon N. **Vandekar**, Kosha Ruparel, Monica E. Calkins, David R. Roalf, and Efsthios D. Gennatas. 2014. "Impact of Puberty on the Evolution of Cerebral Perfusion during Adolescence." *Proceedings of the National Academy of Sciences*, 201400178.
3. Satterthwaite, Theodore D., Simon **Vandekar**, Daniel H. Wolf, Kosha Ruparel, David R. Roalf, Chad Jackson, Mark A. Elliott, et al. 2014. "Sex Differences in the Effect of Puberty on Hippocampal Morphology." *Journal of the American Academy of Child and Adolescent Psychiatry* 53 (3): 341–50.e1. <https://doi.org/10.1016/j.jaac.2013.12.002>.
4. Schmitt, J. E., J. J. Yi, D. R. Roalf, L. A. Loevner, K. Ruparel, D. Whinna, M. C. Souders, et al. 2014. "Incidental Radiologic Findings in the 22q11.2 Deletion Syndrome." *American Journal of Neuroradiology* 35 (11): 2186–91. <https://doi.org/10.3174/ajnr.A4003>.
5. Sun, Wenguang, Brian J. Reich, T. Tony Cai, Michele Guindani, and Armin Schwartzman. 2015. "Visual Exploration Differences During Relational Memory Encoding in Early Psychosis." *Journal of the Royal Statistical Society: Series B (Statistical Methodology)* 77 (1): 112910.
6. **Vandekar**, Simon N., Russell T. Shinohara, Armin Raznahan, David R. Roalf, Michelle Ross, Nicholas DeLeo, Kosha Ruparel, et al. 2015. "Topologically Dissociable Patterns of Development of the Human Cerebral Cortex." *Journal of Neuroscience* 35 (2): 599–609. <https://doi.org/10.1523/JNEUROSCI.3628-14.2015>.
7. Schmitt, J. Eric, Simon **Vandekar**, James Yi, Monica E. Calkins, Kosha Ruparel, David R. Roalf, Daneen Whinna, et al. 2015. "Aberrant Cortical Morphometry in the 22q11.2 Deletion Syndrome." *Biological Psychiatry, Autism and Brain Development*, 78 (2): 135–43. <https://doi.org/10.1016/j.biopsych.2014.10.025>.
8. Satterthwaite, Theodore D., Daniel H. Wolf, David R. Roalf, Kosha Ruparel, Guray Erus, Simon **Vandekar**, Efsthios D. Gennatas, et al. 2015. "Linked Sex Differences in Cognition and Functional Connectivity in Youth." *Cerebral Cortex* 25 (9): 2383–94. <https://doi.org/10.1093/cercor/bhu036>.
9. Satterthwaite, T. D., S. N. **Vandekar**, D. H. Wolf, D. S. Bassett, K. Ruparel, Z. Shehzad, R. C. Craddock, et al. 2015. "Connectome-Wide Network Analysis of Youth with Psychosis-Spectrum Symptoms." *Molecular Psychiatry* 20 (12): 1508–15. <https://doi.org/10.1038/mp.2015.66>.
10. Roalf, David R., Megan Quarmley, Mark A. Elliott, Theodore D. Satterthwaite, Simon N. **Vandekar**, Kosha Ruparel, Efsthios D. Gennatas, et al. 2016. "The Impact of Quality Assurance Assessment on Diffusion Tensor Imaging Outcomes in a Large-Scale Population-Based Cohort." *NeuroImage* 125 (January): 903–19. <https://doi.org/10.1016/j.neuroimage.2015.10.068>.
11. Satterthwaite, Theodore D., Daniel H. Wolf, Monica E. Calkins, Simon N. **Vandekar**, Guray Erus, Kosha Ruparel, David R. Roalf, et al. 2016. "Structural Brain Abnormalities in Youth With Psychosis Spectrum Symptoms." *JAMA Psychiatry* 73 (5): 515–24. <https://doi.org/10.1001/jamapsychiatry.2015.3463>.

12. Shanmugan, Sheila, Daniel H. Wolf, Monica E. Calkins, Tyler M. Moore, Kosha Ruparel, Ryan D. Hopson, Simon N. **Vandekar**, et al. 2016. "Common and Dissociable Mechanisms of Executive System Dysfunction Across Psychiatric Disorders in Youth." *American Journal of Psychiatry* 173 (5): 517–26. <https://doi.org/10.1176/appi.ajp.2015.15060725>.
13. **Vandekar**, Simon N., Russell T. Shinohara, Armin Raznahan, Ryan D. Hopson, David R. Roalf, Kosha Ruparel, Ruben C. Gur, Raquel E. Gur, and Theodore D. Satterthwaite. 2016. "Subject-Level Measurement of Local Cortical Coupling." *NeuroImage* 133 (June): 88–97. <https://doi.org/10.1016/j.neuroimage.2016.03.002>.
14. Satterthwaite, T. D., P. A. Cook, S. E. Bruce, C. Conway, E. Mikkelsen, E. Satchell, S. N. **Vandekar**, T. Durbin, R. T. Shinohara, and Y. I. Sheline. 2016. "Dimensional Depression Severity in Women with Major Depression and Post-Traumatic Stress Disorder Correlates with Fronto-Amygdalar Hypoconnectivity." *Molecular Psychiatry* 21 (7): 894–902. <https://doi.org/10.1038/mp.2015.149>.
15. Kaczurkin, Antonia N., Tyler M. Moore, Kosha Ruparel, Rastko Ciric, Monica E. Calkins, Russell T. Shinohara, Mark A. Elliott, et al. 2016. "Elevated Amygdala Perfusion Mediates Developmental Sex Differences in Trait Anxiety." *Biological Psychiatry, Stress, Fear, and Anxiety*, 80 (10): 775–85. <https://doi.org/10.1016/j.biopsych.2016.04.021>.
16. Baum, Graham L., Rastko Ciric, David R. Roalf, Richard F. Betzel, Tyler M. Moore, Russell T. Shinohara, Ari E. Kahn, Simon N. **Vandekar**, Petra E. Rupert, and Megan Quarmley. 2017. "Modular Segregation of Structural Brain Networks Supports the Development of Executive Function in Youth." *Current Biology* 27 (11): 1561–72.
17. Roalf, David R., J. Eric Schmitt, Simon N. **Vandekar**, Theodore D. Satterthwaite, Russell T. Shinohara, Kosha Ruparel, Mark A. Elliott, Karthik Prabhakaran, Donna M. McDonald-McGinn, and Elaine H. Zackai. 2017. "White Matter Microstructural Deficits in 22q11.2 Deletion Syndrome." *Psychiatry Research: Neuroimaging* 268: 35–44.
18. Sharma, Anup, Daniel H. Wolf, Rastko Ciric, Joseph W. Kable, Tyler M. Moore, Simon N. **Vandekar**, Natalie Katchmar, Aylin Dalal, Kosha Ruparel, and Christos Davatzikos. 2017. "Common Dimensional Reward Deficits across Mood and Psychotic Disorders: A Connectome-Wide Association Study." *American Journal of Psychiatry* 174 (7): 657–66.
19. **Vandekar**, Simon N., Haochang Shou, Theodore D. Satterthwaite, Russell T. Shinohara, Alison K. Merikangas, David R. Roalf, Kosha Ruparel, Adon Rosen, Efsthios D. Gennatas, and Mark A. Elliott. 2017. "Sex Differences in Estimated Brain Metabolism in Relation to Body Growth through Adolescence." *Journal of Cerebral Blood Flow & Metabolism*, 39(3): 524–35. <https://doi.org/10.1177/0271678X17737692>.
20. Reich, Brian J., Joseph Guinness, Simon N. **Vandekar**, Russell T. Shinohara, and Ana-Maria Staicu. 2018. "Fast Function-on-Scalar Regression with Penalized Basis Expansions." *International Journal of Biostatistics* 74 (2): Article 28.
21. Valcarcel, Alessandra M., Kristin A. Linn, Fariha Khalid, Simon N. **Vandekar**, Shahamat Tauhid, Theodore D. Satterthwaite, John Muschelli, Melissa Lynne Martin, Rohit Bakshi, and Russell T. Shinohara. 2018. "A Dual Modeling

- Approach to Automatic Segmentation of Cerebral T2 Hyperintensities and T1 Black Holes in Multiple Sclerosis.” *NeuroImage: Clinical* 20: 1211–21.
22. Valcarcel, Alessandra M., Kristin A. Linn, Simon N. **Vandekar**, Theodore D. Satterthwaite, John Muschelli, Peter A. Calabresi, Dzung L. Pham, Melissa Lynne Martin, and Russell T. Shinohara. 2018. “MIMoSA: An Automated Method for Intermodal Segmentation Analysis of Multiple Sclerosis Brain Lesions.” *Journal of Neuroimaging* 28 (4): 389–98.
<https://doi.org/10.1111/jon.12506>.
 23. Reardon, P. K., Jakob Seidlitz, Simon **Vandekar**, Siyuan Liu, Raihaan Patel, Min Tae M. Park, Aaron Alexander-Bloch, Liv S. Clasen, Jonathan D. Blumenthal, and Francois M. Lalonde. 2018. “Normative Brain Size Variation and Brain Shape Diversity in Humans.” *Science* 360 (6394): 1222–27.
<https://doi.org/10.1126/science.aar2578>.
 24. Xia, Cedric Huchuan, Zongming Ma, Rastko Ciric, Shi Gu, Richard F. Betzel, Antonia N. Kaczkurkin, Monica E. Calkins, et al. 2018. “Linked Dimensions of Psychopathology and Connectivity in Functional Brain Networks.” *Nature Communications* 9 (1): 3003. <https://doi.org/10.1038/s41467-018-05317-y>.
 25. Alexander-Bloch, Aaron F., Haochang Shou, Siyuan Liu, Theodore D. Satterthwaite, David C. Glahn, Russell T. Shinohara, Simon N. **Vandekar**, and Armin Raznahan. 2018. “On Testing for Spatial Correspondence between Maps of Human Brain Structure and Function.” *NeuroImage* 178 (September): 540–51.
<https://doi.org/10.1016/j.neuroimage.2018.05.070>.
 26. **Vandekar**, Simon N., Theodore D. Satterthwaite, Adon Rosen, Rastko Ciric, David R. Roalf, Kosha Ruparel, Ruben C. Gur, Raquel E. Gur, and Russell T. Shinohara. 2018. “Faster Family-Wise Error Control for Neuroimaging with a Parametric Bootstrap.” *Biostatistics* 19 (4): 497–513.
<https://doi.org/10.1093/biostatistics/kxx051>.
 27. **Vandekar**, Simon N., Theodore D. Satterthwaite, Cedric H. Xia, Azeez Adebimpe, Kosha Ruparel, Ruben C. Gur, Raquel E. Gur, and Russell T. Shinohara. 2019. “Robust Spatial Extent Inference with a Semiparametric Bootstrap Joint Inference Procedure.” *Biometrics* 75 (4): 1145–55.
<https://doi.org/10.1111/biom.13114>.
 28. Corbett, Blythe A., Sara Ioannou, Alexandra P. Key, Catherine Coke, Rachael Muscatello, Simon **Vandekar**, and Ian Muse. 2019. “Treatment Effects in Social Cognition and Behavior Following a Theater-Based Intervention for Youth with Autism.” *Developmental Neuropsychology* 44 (7): 481–94.
<https://doi.org/10.1080/87565641.2019.1676244>.
 29. McHugo, Maureen, Pratik Talati, Kristan Armstrong, Simon N. **Vandekar**, Jennifer Urbano Blackford, Neil D. Woodward, and Stephan Heckers. 2019. “Hyperactivity and Reduced Activation of Anterior Hippocampus in Early Psychosis.” *American Journal of Psychiatry*, October.
<https://doi.org/10.1176/appi.ajp.2019.19020151>.
 30. Corbett, Blythe A., Simon **Vandekar**, Rachael A. Muscatello, and Yasas Tanguturi. 2020. “Pubertal Timing during Early Adolescence: Advanced Pubertal Onset in Females with Autism Spectrum Disorder.” *Autism Research* 13 (12): 2202–2215.
<https://doi.org/10.1002/aur.2406>.
 31. Parikh, Meghana P., Simon **Vandekar**, Christina Moore, Linda Thomas, Nathan Britt, Bhinnata Piya, Laura S. Stewart, Einas Batarseh, Lubna Hamdan, and

- Steffany J. Cavallo. 2020. "Temporal and Genotypic Associations of Sporadic Norovirus Gastroenteritis and Reported Norovirus Outbreaks in Middle Tennessee, 2012–2016." *Clinical Infectious Diseases* 71 (9): 2398–2404.
32. Larsen, Bart, Josiane Bourque, Tyler M. Moore, Azeez Adebimpe, Monica E. Calkins, Mark A. Elliott, Ruben C. Gur, et al. 2020. "Longitudinal Development of Brain Iron Is Linked to Cognition in Youth." *Journal of Neuroscience* 40 (9): 1810–18. <https://doi.org/10.1523/JNEUROSCI.2434-19.2020>.
 33. **Vandekar**, Simon, Ran Tao, and Jeffrey Blume. 2020. "A Robust Effect Size Index." *Psychometrika* 85 (1): 232–46. <https://doi.org/10.1007/s11336-020-09698-2>.
 34. Alexander-Bloch, Aaron F., Armin Raznahan, Simon N. **Vandekar**, Jakob Seidlitz, Zhixin Lu, Samuel R. Matthias, Emma Knowles, et al. 2020. "Imaging Local Genetic Influences on Cortical Folding." *Proceedings of the National Academy of Sciences* 117 (13): 7430–36. <https://doi.org/10.1073/pnas.1912064117>.
 35. Avery, Suzanne N., Maureen McHugo, Kristan Armstrong, Jennifer U. Blackford, Simon **Vandekar**, Neil D. Woodward, and Stephan Heckers. 2020. "Habituation during Encoding: A New Approach to the Evaluation of Memory Deficits in Schizophrenia." *Schizophrenia Research*, July. <https://doi.org/10.1016/j.schres.2020.07.007>.
 36. Hamdan, Lubna, Simon **Vandekar**, Andrew J. Spieker, Herdi Rahman, Danielle Ndi, Emily S. Shekarabi, Jyotsna Thota, et al. 2020. "Epidemiological Trends of Racial Differences in Early- and Late-Onset Group B Streptococcus Disease in Tennessee." *Clinical Infectious Diseases*, October. <https://doi.org/10.1093/cid/ciaa1511>.
 37. Kim, Ahra, Sarah L. Rader, Thomas V. Fernandez, Simon N. **Vandekar**, and Alan S. Lewis. 2020. "Leveraging Aggression Risk Gene Expression in the Developing and Adult Human Brain to Guide Future Precision Interventions." *Molecular Psychiatry*, October, 1–3. <https://doi.org/10.1038/s41380-020-00903-3>.
 38. Avery, Suzanne N., Kristan Armstrong, Maureen McHugo, Simon **Vandekar**, Jennifer Urbano Blackford, Neil D. Woodward, and Stephan Heckers. 2021. "Relational Memory in the Early Stage of Psychosis: A 2-Year Follow-up Study." *Schizophrenia Bulletin* 47 (1): 75–86.
 39. Connell, Jennifer, Ahra Kim, Nathan E. Brummel, Mayur B. Patel, Simon N. **Vandekar**, Pratik Pandharipande, Robert S. Dittus, Stephan Heckers, E. Wes Ely, and Jo Ellen Wilson. 2021. "Advanced Age Is Associated With Catatonia in Critical Illness: Results From the Delirium and Catatonia Prospective Cohort Investigation." *Frontiers in Psychiatry* 12: 1999. <https://doi.org/10.3389/fpsy.2021.673166>.
 40. McHugo, Maureen, Suzanne Avery, Kristan Armstrong, Baxter P. Rogers, Simon N. **Vandekar**, Neil D. Woodward, Jennifer Urbano Blackford, and Stephan Heckers. 2021. "Anterior Hippocampal Dysfunction in Early Psychosis: A 2-Year Follow-up Study." *Psychological Medicine*, 1–10.
 41. McKernan, Lindsey C., Leslie J. Crofford, Ahra Kim, Simon N. **Vandekar**, William S. Reynolds, Kathryn A. Hansen, Daniel J. Clauw, and David A. Williams. 2021. "Electronic Delivery of Pain Education for Chronic Overlapping Pain Conditions: A Prospective Cohort Study." *Pain Medicine* 22 (10): 2252–62. <https://doi.org/10.1093/pm/pnab018>.
 42. Weinstein, Sarah M., Simon N. **Vandekar**, Azeez Adebimpe, Tinashe M. Tapera, Timothy Robert-Fitzgerald, Ruben C. Gur, Raquel E. Gur, et al. 2021. "A

- Simple Permutation-Based Test of Intermodal Correspondence.” *Human Brain Mapping* 42 (16): 5175–87. <https://doi.org/10.1002/hbm.25577>.
43. Muscatello, Rachael A., Simon N. **Vandekar**, and Blythe A. Corbett. 2021. “Evidence for Decreased Parasympathetic Response to a Novel Peer Interaction in Older Children with Autism Spectrum Disorder: A Case-Control Study.” *Journal of Neurodevelopmental Disorders* 13 (1): 6. <https://doi.org/10.1186/s11689-020-09354-x>.
 44. Roeske, Maxwell J., Maureen McHugo, Simon **Vandekar**, Jennifer Urbano Blackford, Neil D. Woodward, and Stephan Heckers. 2021. “Incomplete Hippocampal Inversion in Schizophrenia: Prevalence, Severity, and Impact on Hippocampal Structure.” *Molecular Psychiatry*, January, 1–10. <https://doi.org/10.1038/s41380-020-01010-z>.
 45. **Vandekar**, Simon N., and Jeremy Stephens. 2021. “Improving the Replicability of Neuroimaging Findings by Thresholding Effect Sizes Instead of P-Values.” *Human Brain Mapping* 42 (8): 2393–98. <https://doi.org/10.1002/hbm.25374>.
 46. Muscatello, Rachael A., Ahra Kim, Simon **Vandekar**, and Blythe A. Corbett. 2021. “Diagnostic and Physical Effects in Parasympathetic Response to Social Evaluation in Youth With and Without Autism Spectrum Disorder.” *Journal of Autism and Developmental Disorders* 52 (8): 3427–42. <https://doi.org/10.1007/s10803-021-05224-0>.
 47. Avery, Suzanne N., Anna S. Huang, Julia M. Sheffield, Baxter P. Rogers, Simon **Vandekar**, Alan Anticevic, and Neil D. Woodward. 2021. “Development of Thalamocortical Structural Connectivity in Typically Developing and Psychosis Spectrum Youth.” *Biological Psychiatry: Cognitive Neuroscience and Neuroimaging*, October. <https://doi.org/10.1016/j.bpsc.2021.09.009>.
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