Wesley Kurt Thompson, Ph.D.

Office Address:

Laureate Institute for Brain Research 6655 South Yale Avenue Tulsa, OK 74136 USA

Telephone:626-774-1134Birth Date:OctobEmail:WThompson@laureateinstitute.orgBirth Place:USA

Home Address:

130 W. Le Roy Avenue Arcadia, CA 91007 USA

Birth Date: October 13, 1968 Birth Place: USA Citizenship: USA

APPOINTMENTS

Academic Positions

- May 2022-presentPrincipal Investigator
Laureate Institute for Brain Research
Tulsa, OK USAJuly 2019 May 2022Professor in Residence
University of California, San Diego
La Jolla, CA, USA
- August 2014 June 2019 Associate Professor in Residence University of California, San Diego La Jolla, CA, USA
- Oct 2008 July 2014 Assistant Professor in Residence University of California, San Diego La Jolla, CA, USA
- Jan 2004 Sept 2008 Assistant Professor Departments of Statistics and Psychiatry University of Pittsburgh Pittsburgh, PA, USA

Adjunct and Visiting Positions

- May 2022 current Adjunct Professor Radiology University of California San Diego La Jolla, CA, USA
- Aug 2013 Jan 2021 Visiting Professor Institute of Clinical Medicine, University of Oslo Oslo, Norway
- Oct 2011 current Adjunct Professor Program in Computational Statistics San Diego State University San Diego, CA, USA

June 2015 – July 2017	Lead Scientist Institute of Biological Psychiatry Sankt Hans Psychiatric Hospital Roskilde, Denmark
Oct 2008 – Jan 2015	Adjunct Assistant Professor Departments of Biostatistics and Psychiatry University of Pittsburgh Pittsburgh, PA, USA
Non-Academic Positions	

Jan 2014 - current	Wesley Thompson, Statistical Consulting, LLC Owner and Chief Statistician
Jan 1997 - Sept 1997	Property and Casualty Actuary Generali U.S. Branch New York, NY, USA
Sept 1996 - Jan 1997	Property and Casualty Actuary Zurich-American Specialties New York, NY, USA

RESEARCH INTERESTS

- Longitudinal Data Analysis
 Hierarchical Bayesian Models
 Psychiatry, Neurcognition, and Neurodevelopment
 Human Genetics

HONORS AND ACHIEVEMENTS

2021 2020-present 2020	UCSD Faculty Leadership Academy Scholar Co-Director, Population Neuroscience and Genetics Lab, UCSD Chair, Mental Health Statistics Section, American Statistical Association
2017-present	Founding Faculty, Halicioğlu Data Science Institute, University of California, San Diego
2017-present	Director of Statistics, National Consortium on Alcohol and Neurodeveopment in Adolescence
2015-present	Director of Biostatistics, Adolescent Brain and Cognitive Development Study
2015-2018	Council of Section Representative, Mental Health Statistics Section, American Statistical Association
2011-12	Fellow, Advanced Research Institute in Geriatric Psychiatry
2011-12	Scholar, National Council for Leadership in Academic Medicine
2006-11	NIMH Career Development Award
1998-99	Excellent Fellow in the Graduate School of Arts and Sciences, Rutgers, the State University of New Jersey
1987	National Merit Scholar

1997 - 2003	Ph.D. Statistics Rutgers, the State University of New Jersey Piscataway, NJ, USA
1994 – 1996	M.A. Mathematics State University of New York, Albany Albany, NY, USA
1987 - 1991	B.S. Mathematics University of Chicago Chicago, IL, USA

MEMBERSHIPS

2013 - current	Society of Biological Psychiatry
2012 - current	International Society of Psychiatric Genetics
1998 - current	American Statistical Association

BOOKS

Ombao H, Lindquist M, **Thompson WK**, Aston J, editors (2016). *Handbook of Neuroimaging Data Analysis*. CRC Press.

EDITORIALS

Paulus MP and **Thompson WK** (2019). The Challenges and Opportunities of Small Effects: The New Normal in Academic Psychiatry. *JAMA Psychiatry*

PEER-REVIEWED PUBLICATIONS

NCBI Bibliography:

https://www.ncbi.nlm.nih.gov/sites/myncbi/wesley.thompson.1/bibliography/41165362/pu blic/?sort=date&direction=descending

Google Scholar:

https://scholar.google.dk/citations?hl=da&user=jsBDssUAAAAJ

Human Brain Imaging and Neurodevelopment

(83) Hernandez LM, Kim M, Hernandez C, **Thompson WK**, Fan CC, Galvan A, Dapretto M, Bookheimer SY, Fuligni A, Gandal M (2022). Decoupling sleep and brain size in childhood: An investigation of genetic covariation in the ABCD study. Biological Psychiatry: Global Open Science.

(82) Palmer CE, Pecheva D, Iversen JR, Hagler DJ, Sugrue L, Nedelec P, Fan CC, **Thompson WK**, Jernigan TL, Dale AM (2021). Microstructural development from 9-14 years: evidence from the ABCD Study. *Developmental Cognitive Neuroscience*.

(81) Owens MM, Potter A, Hyatt C, AlbaughM, **Thompson WK**, Jernigan T, Yuan D, Hahn S, Allgaier N, Garavan H (2021). Recalibrating expectations about effect size: A multi-method survey of effect sizes in the ABCD study. *PLOS One*.

(80) Dick AS, Silva K, Gonzalez R, Sutherland MT, Laird AR, **Thompson WK**, Tapert SF, Squeglia LM, Gray KM, Nixon SJ, Cottler LB, La Greca AM, Gurwitch RH, Comer JS (2021). Neural vulnerability and hurricane-related media are associated with posttraumatic stress in youth. *Nature Human Behaviour.*

(79) Infante A, Zhang Y, Brumback T, Brown S, Colrain I, Baker F, Clark D, Goldston D, Nagel B, Nooner K, Zhao Q, Pohl K, Sullivan E, Pfefferbaum A, Tapert Susan, **Thompson WK** (2021). Adolescent Binge Drinking is Associated with Accelerated Decline of Gray Matter Volume. *Cerebral Cortex*.

(78) Brumback T, Cummins K, Tapert S, **Thompson WK**, Brown S (2021). Psychosocial Predictors of Substance Use in Adolescents and Young Adults: Longitudinal Risk and Protective Factors. *Addictive Behaviors*.

(77) Chaarani B,..., **Thompson WK**, ..., Garavan H (2021). Baseline Brain Function in the Pre-Adolescents of the ABCD Study. *Nature Neuroscience*.

(76) Li Y, **Thompson WK**, Reuter C, Nillo R, Jernigan T, Dale AM, Sugrue L (2021). Rates of Incidental Findings in Brain Magnetic Resonance Imaging in Children. *JAMA Neurology*.

(75) Palmer CE, Zhao W, Loughnan R, Zou J, Fan CC, **Thompson WK**, Dale AM, Jernigan TJ (2021). Distinct regionalization patterns of cortical morphology are associated with cognitive performance across different domains. *Cerebral Cortex*.

(74) Simmons C, Conly MI, Gee DG, Baskin-Sommers A, Barch DM, Hoffman EA, Huber RS, Iacono WG, Nagel BJ, Palmer CE, Sheth CS, Sowell ER, **Thompson WK**, Casey BJ (2021). Responsible use of open access developmental data: The Adolescent Brain Cognitive Development[™] (ABCD) Study. *Psychological Science*.

(73) Lopez DA, Mao Y, **Thompson WK**, Foxe JJ, Freedman EG (2021). Breastfeeding Duration is Associated With Domain-Specific Improvements in Cognitive Performance in 9-10-Year-Old Children. *Frontiers in Psychology,*

(72) Hahn S, Yuan D-K, **Thompson WK**, Allgaier N, Garavan H (2021). ABCD ML: a Python library for neuroimaging based machine learning. *Bioinformatics*.

(71) Zhao W, Palmer CE, **Thompson WK**, Chaarani B, Garavan HP, Casey BJ, Jernigan TL, Dale AM, Fan CCC (2021). Individual differences in cognitive performance are better predicted by global rather than localized BOLD activity patterns across the cortex. *Cerebral Cortex*.

(70) van der Meer D, Frei O, Kaufmann T, Shadrin AA, Devor A, Smeland OB, **Thompson WK**, Fan CC, Holland D, Westlye LT, Andreassen OA, Dale AM (2020). Understanding the genetic determinants of the brain with MOSTest. *Nature Communications*.

(69) van der Meer D, Frei O, Kaufmann T, Chen CH, **Thompson WK**, O'Connell KS, ..., Andreassen OA (2020). Quantifying the polygenic architecture of the human cerebral cortex: Extensive genetic overlap between cortical thickness and surface area. *Cerebral Cortex*, 30(10), 5597-5603. (68) Donohue MC, Sethuraman G, Langford O, Lin W, Insel P, **Thompson WK**, ... & Aisen PS. (2020). Alternatives to MMRM for preclinical Alzheimer's clinical trials: Clinical trial design and implementation. *Alzheimer's & Dementia*, 16, e044915.

(67) Nooner KB, De Bellis MD, Clark DB, **Thompson WK**, Brumback T (2020). Longitudinal Impact of Life Events on Adolescent Binge Drinking in the National Consortium on Alcohol and Neurodevelopment in Adolescence (NCANDA). *Substance Use & Misuse*, 55(11), 1846-1855.

(66) Zhao Q, Sullivan EV, Honnorat N, Adeli E, Podhajsky S, De Bellis MD, Voyvodic J, Nooner KB, Baker FC, Colrain IM, Tapert SF, Brown SA, **Thompson WK**, Nagel BJ, Clark DB, Pfefferbaum A, Pohl KM (2020). Association of Heavy Drinking With Deviant Fiber Tract Development in Frontal Brain Systems in Adolescents. *JAMA Psychiatry*.

(65) Gonzalez MR, Palmer CE, Uban KA, Jernigan TL, **Thompson WK**, Sowell ER (2020). Positive economic, social, and physiological ecologies predict brain structure and cognitive performance in 9- 10-year-old children. *Frontiers in Human Neuroscience*.

(64) Rapuano KM, Laurent JS, Hagler DJ, Hatton SN, **Thompson WK**, Jernigan TL, Dale AM, Casey BJ, Watts R (2020). Nucleus Accumbens Cytoarchitecture Predicts Weight Gain in Children. Proceedings of the National Academy of Science.

(63) Madsen KS, Johansen LB, **Thompson WK**, Siebner HR, Jernigan T, Baaré WFC (2020). Maturational trajectories of white matter microstructure underlying the right presupplementary motor area reflect individual improvements in motor response cancellation in children and adolescents. *NeuroImage*.

(62) Insel PS, Mormino EC, Aisen PS, **Thompson WK**, Donohue MC (2020). Neuroanatomical spread of amyloid β and tau in Alzheimer's disease: Implications for primary prevention. *Brain Communications*.

(61) Hagler D, et al. (2019). Image processing and analysis methods for the Adolescent Brain Cognitive Development Study. *NeuroImage*.

(60) Dick AS, Garcia NL, Pruden SM, **Thompson WK**, Hawes SW, Sutherland M, Riedel M, Laird A, Gonzalez R (2019). No bilingual advantage for executive function: Evidence from a large sample of children in the Adolescent Brain and Cognitive Development (ABCD) study. *Nature Human Behaviour*.

(59) **Thompson WK**, Barch D, Bjork J, Gonzalez R, Nagel B, Nixon SJ, Luciana M (2019). The Structure of Cognition in 9 and 10 year-old Children and Associations with Problem Behaviors: Findings from the ABCD Study's Baseline Neurocognitive Battery. *DCN*.

(58) Le TT, Kuplicki RT, McKinney BA, Yeh HW, **Thompson WK**, Paulus MP (2018). A nonlinear simulation framework supports adjusting for age when analyzing BrainAGE. *Frontiers in aging neuroscience*, 10, 317.

(57) Paulus MP, Squeglia LM, Bagot K, Jacobus J, Kuplicki R, Breslin FJ, Bodurka J, Morris AS, **Thompsond WK**, Bartsch H, Tapert SF (2018). Screen media activity and brain structure in youth: Evidence for diverse structural correlation networks from the ABCD study. *NeuroImage*.

(56) Sullivan EV, Zahr NM, Sassoon SA, **Thompson WK**, Kwon D, Pohl KM, Pfefferbaum A. (2018). The role of aging, drug dependence, and hepatitis C comorbidity in alcoholism cortical compromise. *JAMA psychiatry*.

(55) Garavan H, Bartsch H, Conway K, Decastro A, Goldstein RZ, Heeringa S, Jernigan T, Potter A, **Thompson WK**, Zahs D (2018). Recruiting the ABCD Sample: Design Considerations and Procedures. *Developmental Cognitive Neuroscience*.

(53) Uban KA, Horton MK, Jacobus J, Heyser C, Thompson WK, Tapert SF, ... & Sowell ER (2018). Biospecimens and the ABCD Study: Rationale, Methods of Collection, Measurement and Early Data. *Developmental Cognitive Neuroscience*.

(52) Sullivan EV, Zahr NM, Sassoon SA, **Thompson WK**, Kwon D, Pohl KM, Pfefferbaum A (2017). Enduring Cortical Compromise in Alcoholism: Accelerated by Aging and Compounded by Drug Dependence and Hepatitis C Comorbidity. *JAMA Psychiatry*.

(51) Pfefferbaum A, Kwon D, Brumback T, **Thompson WK**, Cummins K, Tapert S, Brown S, Colrain I, Baker F, Prouty D, De Bellis M, Clark D, Nagel B, Chu W, Park SH, Daegu G, Pohl K, Sullivan E (2017). Altered Brain Developmental Trajectories in Adolescents Who Initiate Moderate and Heavy Drinking. *American Journal of Psychiatry*.

(50) Curley LD, Newman E, Reuter C, **Thompson WK**, Brown TT, Akshoomoff N, Hagler DJ, Dale AM, Jernigan TL (2017). Cortical morphology of the pars opercularis and its relationship to motor inhibitory performance in a longitudinal, developing cohort. *Brain Structure and Function*.

(49) Sullivan E, Brumback T, Tapert S, Prouty D, Fama R, **Thompson WK**, Brown S, Cummins K, Colrain I, Baker F, Clark D, Chung T, DeBellis M, Hooper S, Nagel B, Nichols N, Chu W, Kwon D, Pohl K, Pfefferbaum A (2017). Effects of prior testing lasting a full year in NCANDA adolescents: Contributions from age, sex, socioeconomic status, ethnicity, site, family history of alcohol or drug abuse, and baseline performance. *Developmental Cognitive Neuroscience.*

(48) Pfefferbaum A, Rohlfing T, Pohl KM, Lane B, Chu W, Kwon D, Nichols BN, Brown SA, Tapert SF, Cummins K, **Thompson WK**, Brumback T, Meloy MJ, Jernigan TJ, Dale AM, Colrain IM, Baker FC, Prouty D, De Bellis MD, Voyvodic JT, Clark DB, Luna B, Chung T, Nagel BJ, Sullivan EV (2016). Adolescent Development of Cortical and White Matter Structure in the NCANDA Sample: Role of Sex, Ethnicity, Puberty, and Alcohol Drinking. *Cerebral Cortex*.

(47) Chang L, Douet V, Bloss C, Lee K, Pritchett A, Jernigan TL, Akshoomoff N, Murray SS, Frazier J, Kennedy DN, Amaral DG, Gruen J, Kaufmann WE, Casey BJ, Sowell E, Ernst T, McCabe C, Newman E, Dale AM, Van Zijl P, Kuperman J, Murray S, Appelbaum M, Gamst A, **Thompson W**, Keating B, Mostofsky S, Ruberry EJ, Powers A, Rosen B, Kenet T, Kennedy D (2016). Gray matter maturation and cognition in children with different APOE ε genotypes. *Neurology* 87 585-594.

(46) Walhovd KB, Krogsrud SK, Grydeland H, Panizzon MH, Rohani DA, Skranes J, **Thompson WK**, Reuter C, Tamnes CK, et al., and Fjell AM (2016). Neurodevelopmental origins of lifespan changes in brain and cognition. *PNAS* 113, 9357–9362.

(45) Falahpour M, **Thompson WK**, Abbott AE, Jahedi A, Mulvey ME, Datko M, Liu TT, Müller R-A. (2016) 'Underconnected', but not broken? Dynamic fcMRI shows underconnectivity in autism is linked to increased intra-individual variability across time. *Brain Connectivity*.

(44) Pohl KM, Sullivan EV, Rohlfing T, Chu W, Kwon D, Nichols BN, Zhang Y, Brown SA, Tapert SF, Cummins K, **Thompson WK**, Brumback T, Colrain IM, Baker FC, Prouty D, De Bellis MD, Voyvodic JT, Clark DB, Schirda C, Nagel BJ, Pfefferbaum A (2016).

Harmonizing DTI measurements across scanners to examine the development of white matter microstructure in 803 adolescents of the NCANDA study. *NeuroImage*.

(43) Vuoksimaa E, Panizzon M, Chen; C-H, Fiecas M, Eyler L, Fennema-Notestine C, Hagler D, Franz C, Jak A, Lyons M, Neale M, Rinker D, **Thompson WK**, Tsuang M, Dale A, Kremen W (2016). Is bigger always better? The importance of cortical configuration with respect to cognitive ability. *NeuroImage*.

(42) Pohl, KM, Sullivan EV, Rohlfing T, Chu W, Brown SA, Tapert SF, Cummins K, **Thompson WK**, Kwon D, Nichols N, Colrain IM, Baker FC, Prouty D, De Bellis MD, Voyvodic JT, Clark DB, Nagel BJ, Pfefferbaum A. (2016). Harmonizing DTI Measurements across Scanners to Examine the Development of White Matter Microstructure in 803 Adolescents of the NCANDA Study. *NeuroImage*.

(41) Sullivan EV, Brumback T, Tapert SF, Fama R, Prouty D, Brown SA, Cummins K, **Thompson WK**, Colrain IM, Baker FC, De Bellis MD, Hooper SR, Clark DB, Chung T, Nagel BJ, Nichols N, Rohlfing T, Chu W,4 Pohl KM, Pfefferbaum A. (2016). Cognitive, emotion control, and motor performance of adolescents in the NCANDA study: Contributions from alcohol consumption, age, sex, ethnicity, and family history of addiction. *Neuropsychology*.

(40) Brown TT, Hagler DJ, Akshoomoff N, Bartsch H, Newman E, **Thompson WK**, Bloss CS, Murray SS, Schork N, Kennedy DN, Kuperman JM, McCabe C, Chung Y, Libiger O, Maddox M, Casey BJ, Chang L, Ernst TM, Frazier JA, Gruen JR, Sowell ER, Kenet T, Kaufmann WE, Mostofsky S, Amaral DG, Dale AM, Jernigan TL (2016). The Pediatric Imaging, Neurocognition, and Genetics (PING) Data Repository. *NeuroImage*.

(39) Fjell AM, Grydeland H, Krogsrud SK, Amlien I, Rohani DA, Mork L, Storsve AB, Tamnes CK, Due-Tønnessen P, Bjørnerud A, Sølsnes AE, Håberg A, Skranes J,Bartsch H, Chen C-H, **Thompson WK**, Panizzon MS, Kremen WS, Dale AM, Walhovd KB (2015). Development and aging of cortical thickness correspond to genetic organization patterns. *PNAS*.

(38) Brown SA, Brumback T, Tomlinson K, Cummins K, **Thompson WK**, Nagel BJ, De Bellis MD, Hooper SR, Clark DB, Chung T, Hasler BP, Colrain IM, Baker FB, Prouty D, Pfefferbaum A, Sullivan EV, Pohl KM, Rohlfing T, Nichols BN, Chu W, Tapert SF (2015). The National Consortium on Alcohol and NeuroDevelopment in Adolescence (NCANDA): A multi-site study of adolescent development and substance use. *Journal of Studies on Alcohol and Drugs, 76*(6), 895-908. doi: 10.15288/jsad.2015.76.895

(37) Pfefferbaum A, Rohlfing T, Pohl KM, Lane B, Chu W, Brown SA, Tapert SF, Cummins K, **Thompson WK**, Brumback T, Meloy MJ, Jernigan TL, Dale A, Colrain IM, Baker FC, Prouty D, De Bellis MD, Voyvodic JT, Clark DB, Luna B, Chung T, Nagel B, Sullivan EV (2015). Adolescent age-related differences in cortical and white matter structure: Puberty, sex, ethnicity, socioeconomic status in the NCANDA and PING samples. *Cerebral Cortex*.

(36) Newman E, **Thompson WK**, Bartsch H, Libiger O, Hagler DJ, Chen CH, Akshoomoff N, McCabe C, Bloss CS, Chang L, Casey BJ, Ernst TM, Frazier JA, Gruen JR, Murray SS, Sowell ER, Schork N, Kenet T, Kennedy DN, Kaufmann WE, Mostofsky S, Amaral DG, Dale AM, Jernigan TL (2015). High childhood anxiety is linked to altered patterns of cortical maturation. *Brain Structure & Function*.

(35) E, Panizzon MS, Chen C-H, Fiecas M, Eyler LT, Fennema-Notestine C, Hagler D, Fischl B, Franz CE, Jak A, Lyons MJ, Neale MC, Rinker D, **Thompson WK**, Tsuang MT, Dale AM, Kremen WS (2015). Relationships between general cognitive ability and cortical grey matter: distinct patterns for cortical surface area and thickness. *Cortex*.

(34) Wilde EA, Bigler ED, Hanten G, Dennis M, Schachar RJ, Saunders AE, Ewing-Cobbs L, Chapman SB, **Thompson WK**, Yang TT, Levin HS, Max J (2015). Personality Change due to Traumatic Brain Injury in Children and Adolescents: Neurocognitive Correlates. *The Journal of Neuropsychiatry and Clinical Neurosciences*.

(33) Docherty AR, Panizzon MS, Neale MC, Chen C-H, Eyler LT, Fennema-Notestine C, Hagler DJ, Franz CE, Jak A, Lyons MJ, Rinker DA, **Thompson WK**, Tsuang MT, Dale AM, Kremen WS (2015). Does Degree of Gyrification Underlie the Phenotypic and Genetic Associations between Cortical Surface Area and Cognitive Ability? *NeuroImage*: 106, 154-160.

(32) Jak AJ, Panizzon MS, Spoon KM, Fennema-Notestine C, Franz CE, **Thompson WK**, Kremen WS (2014). Hippocampal Atrophy Varies by Neuropsychologically-Defined MCI among Men in Their 50s. *The American Journal of Geriatric Psychiatry*.

(31) Vuoksima E, Panizzon MS, Chen CH, Fiecas M, Eyler LT, Fennema-NotestineC, Hagler DJ, Fischl B, Franz CE, Jak A, Lyons MJ, Neale MJ, Rinker DA, **Thompson WK**, Tsuang MT, Dale AM, Kremen WS (2014). The Genetic Association Between Neocortical Volume and General Cognitive Ability Is Driven by Global Surface Area Rather Than Thickness. *Cerebral Cortex*. PMID: 24554725.

(30) Chen C-H, Fiecas M, Gutierrez ED, Matthew S. Panizzon, Eyler LT, Vuoksimaa E, **Thompson WK**, Fennema-Notestine C, Hagler D, Jernigan TL, Neale MC, Franz CE, Lyons MJ, Fischl B, Tsuang MT, Dale AM, Kremen WS (2013). Genetic topography of brain morphology – searching for principles of cortical patterning. *PNAS*: 110, 17089-17094.

(29) Eyler L, Vuoksimaa Eero, Panizzon M, Fennema-Notestine C, Neale M, Chen C-H, Jak A, Franz C, Lyons M, **Thompson WK**, Spoon K, Fischl B, Dale A, Kremen W (2014). Conceptual and Data-Based Investigation of Genetic Influences and Brain Asymmetry: A Twin Study of Multiple Structural Phenotypes. *Journal of Cognitive Neuroscience*: 26,1100-1117.

(28) Desikan RS, **Thompson WK**, Holland D, Hess CP, Brewer JB, Zetterberg H, Blennow K, Andreassen OA, McEvoy LK, Hyman BT, Dale AM (2014). The Role of Clusterin in Amyloid-β–Associated Neurodegeneration. *JAMA Neurology:* 71, 180-187.

(27) Max JE, Pardo D, Hanten G, Schachar RJ, Saunders AE, Ewing-Cobbs L, Chapman SB, Dennis M, Wilde AE, Bigler ED, **Thompson WK**, Yang TT, Levin HS. (2014). Psychiatric disorders in children and adolescents six-to-twelve months after mild traumatic brain injury. *J. of Neuropsychiatry & Clinical Neurosciences*: 25, 272-282.

(26) Desikan RS, **Thompson WK**, Holland D, Hess CP, Brewer JB, Zetterberg H, Blennow K, Andreassen OA, McEvoy LK, Hyman BT, Dale AM (2013). Heart fatty acid binding protein modulates A**β**-associated Alzheimer's neurodegeneration. *Molecular Neurodegeneration*: 8, 39.

(25) Kremen WS, Fennema-Notestine C, Eyler LT, Panizzon MS, Chen CH, Franz CE, Lyons MJ, **Thompson WK**, Dale AM (2013). Genetics of Brain Structure: Contributions from the Vietnam Era Twin Study of Aging. *Am J Med Genet B Neuropsychiatr Genet*.: 162B(7), 751-61.

(24) Vuoksimaa E, Panizzon MS, Chen C-H, Eyler LT, Fennema-Notestine C, Fiecas M, Fischl B, Franz CE, Grant MD, Jak A, Lyons MJ, Neale MC, **Thompson WK**, Tsuang MT, Xian H, Dale AM, Kremen WS (2013). Cognitive Reserve Modifies the Association

Between the Hippocampus and Episodic Memory in Middle-Age. *Neuropsychologia:* 51, 1124-1131.

(23) Thomas ML, Brown GG, **Thompson WK**, Voyvodic J, Greve DN, Turner JA, Mathalon DH, Ford J, Wible CG, Potkin SG, FBIRN (2013). An application of item response theory to fMRI data: prospects and pitfalls. *Psychiatry Research: Neuroimaging:* 30, 167-174.

(22) Desikan RS, McEvoy LK, Holland D, **Thompson WK**, Brewer JB, Aisen PS, Andreassen OA, Hyman BT, Sperling RA, Dale AM, ADNI (2013). Apolipoprotein E ϵ 4 does not modulate amyloid- β -associated neurodegeneration in preclinical Alzheimer's disease. *AJNR:* 34, 505-510.

(21) Max JE, Wilde EA, Bigler E, **Thompson WK**, MacLeod M, Vasquez AC, Merkley TL, Hunter JV, Chu ZD, Yallampalli R, Levin HS (2012). Neuroimaging correlates of novel psychiatric disorders after pediatric traumatic brain injury. *JAACAP* 51:1208-1217.

(20) Chen C-H, Gutierrez ED, **Thompson WK**, Panizzon MS, Jernigan TL, Eyler LT, Fennema-Notestine C, Jak AJ, Neale MC, Franz CE, Lyons MJ, Grant MD, Fischl B, Seidman LJ, Tsuang MT, Kremen W, Dale AM (2012). Hierarchical genetic organization of human cortical surface area. *Science:* 335 1634-1636.

(19) Desikan RS, McEvoy LK, **Thompson WK**, Holland D, Brewer JB, Aisen PS, Sperling RA, Dale AM (2012). Amyloid- β associated clinical decline occurs only in the presence of p-tau. *Archives of Neurology:* 69, 709-713.

(18) Wetherill R, Bava S, **Thompson WK**, Boucquey V, Pulido C, Tapert SF (2012). Frontoparietal Connectivity in Substance-naïve Youth with and without a Family History of Alcoholism. *Brain Research:* 13, 66-73.

(17) Siegle G, **Thompson WK**, Thase M, Collier A, Berman S, Friedman E (2012). Towards clinically employable neuroimaging in depression treatment: Is subgenual cingulate activity robustly prognostic for depression outcome in Cognitive Therapy across studies, scanners, and patient characteristics? *Arch Gen Psychiatry* 69: 913-923.

(16) Majid A, Aron AR, **Thompson WK**, Sheldon S, Hamza S, Stoffers D, Holland D, Goldstein J, Corey-Bloom J, Dale AM (2011). Basal ganglia atrophy in prodromal Huntington's disease is detectable over one year using automated segmentation. *Movement Disorders* 26, 2544-2551.

(15) Chen C-H, Panizzon MS, Fennema-Notestine C, Eyler LT, Jak AJ, Neale MC, **Thompson WK**, Franz CE, Hamza S, Jernigan TL, Lyons MJ, Grant MD, Fischl B, Seidman LJ, Tsuang MT, Kremen WS and Dale AM (2011). Genetic Influences on Cortical Regionalization in the Human Brain. *Neuron* 72: 537-544.

(14) Desikan RS, McEvoy LK, **Thompson WK**, Holland D, Roddey JC, Blennow K, Aisen PS, Brewer JB, Dale AM, the ADNI (2011). Hyperphosphorylated tau modulates amyloid- β associated synaptic degeneration and dysfunction in Alzheimer's disease. *Annals of Neurology* 70: 657-661.

(13) Fennema-Notestine C, Panizzon M, **Thompson WK**, Chen C-H, Eyler LT, Fischl B, Franz E, Grant D, Jak J, Jernigan TL, Lyons MJ, Neale MC, Seidman LJ, Tsuang MT, Xian H, Dale AM, Kremen WS (2011). Presence of Apolipoprotein E ε 4 allele associated with thinner frontal cortices in middle-age. *Journal of Alzheimer's Disease:* 26, 49-60.

(12) Eyler LT, Prom-Wormley E, Panizzon MS, Kaup AR, Fennema-Notestine C, Neale MC, Jernigan TL, Fischl B, Franz CE, Lyons MJ, Grant M, Stevens A, Pacheco J, Perry

ME, Schmitt JE, Seidman LJ, Thermenos HW, Tsuang MT, Chen C-H, **Thompson WK**, Dale AM, Kremen WS (2011). Genetic and Environmental Contributions to Regional Cortical Surface Area in Humans: A Magnetic Resonance Imaging Twin Study. *Cerebral Cortex* 21: 2313-2321.

(11) Majid DSA, Stoffers D, Sheldon S, Hamza S, **Thompson WK**, Goldstein J, Corey-Bloom J, and Aron AR (2011). Automated MRI analysis detects premanifest Huntington's disease neurodegeneration within one year. *Movement Disorders:* 26, 1481–1488.

(10) **Thompson WK** and Holland D (2011). Bias in Tensor Based Morphometry Stat-ROI Measures May Result in Unrealistic Power Estimates. *NeuroImage*: 57, 1-4.

(9) Ichikawa N, Siegle GJ, Jones NP, Kamishima K, **Thompson WK**, Gross JJ, Ohira H. (2011). Feeling bad about screwing up: Emotion regulation and action monitoring in the anterior cingulate cortex (ACC). *Cogn Aff Beh Neuroscience:* 11, 354-371.

(8) Brown GG, Mathelon D, Stern H, Ford J, Mueller B, Greve D, McCarthy G, Voyvodic J, Glover G, Diaz M, Yetter E, Ozyurt B, Jorgensen K, Wible C, Turner J, **Thompson WK**, Potkin S (2011). Multisite Reliability of Cognitive BOLD Data. *NeuroImage*: 54, 2163-2175.

(7) Siegle GJ, Steinhauer SR, Friedman ES, **Thompson WK**, Thase ME. (2011) Remission Prognosis for Cognitive Therapy for Recurrent Depression using the Pupil: Utility and Neural Correlates. *Biological Psychiatry*: 69:726-733.

(6) Fiecas M, Ombao H, Linkletter C, **Thompson WK** and Sanes J. (2010). Functional Connectivity: Shrinkage Estimation and Randomization Test. *NeuroImage*: 49, 3005-3014.

(5) Versace A, **Thompson WK**, Zhou D, Almeida J, Hassel S, Klein C, Kupfer DJ, Phillips ML. (2010). Right-left asymmetry in orbitomedial prefrontal cortical-amygdala functional connectivity to negative versus positive emotion in adult bipolar disorder. *Biol Psychiatry*: 67, 422-431.

(4) Versace A, Almeida JRC, Quevedo K, **Thompson WK**, Hassel S, Kupfer DJ, Phillips M. (2010) Right orbitofrontal cortico-limbic and left cortico-cortico white matter connectivity differentiates bipolar and unipolar depression. *Biological Psychiatry*: 68, 560-567.

(3) Zhou D, **Thompson WK**, Siegle GJ. (2009). MATLAB toolbox for functional connectivity. *NeuroImage*: 47, 1590-1607.

(2) **Thompson WK** and Siegle GJ (2009). A Stimulus-Locked Vector Autoregressive Model for Slow Event-Related fMRI Designs. *NeuroImage*: 46, 739-748.

(1) Siegle GJ, **Thompson WK**, Carter CS, Steinhauer SR, and Thase ME (2007). Increased amygdala and decreased prefrontal BOLD responses in depression: Related and independent features. *Biological Psychiatry*: 61, 198-209.

Genetics

(89) Athanasiadis G, Meijsen JJ, Helenius D, Schork A, Ingason A, **Thompson WK**, Geschwind DH, Werge T, Buil A (2022). A comprehensive map of genetic relationships among diagnostic categories based on 48.6 million relative pairs from the Danish genealogy. *PNAS*.

(88) Suppli NP, Andersen KK, Agerbo E, Rajagopal VM, Appadurai V, Coleman JRI, Breen G, Bybjerg-Grauholm J, Bækvad-Hansen M, Pedersen CB, Pedersen MG, **Thompson WK**, Munk-Olsen T, Benros ME, Als TD, Grove J, Werge T, Børglum AD, Hougaard DM, Mors O, Nordentoft M, Mortensen PB, Musliner KL (2021). Genome-wide by environment interaction study of stressful life events and hospital-treated depression in the iPSYCH2012 sample. *Biological Psychiatry: Global Open Sciences*.

(87) Helenius D, Byberg-Grauholm J, Pedersen C, Hougaard DM, Borglum AD, Nordentoft M, Mors O, Mortensen PB, Geschwind DH, Montalbano S, Raznahan A, **Thompson WK**, Ingason A, Werge T (2021). Comparing Copy Number Variations in a Danish Cohort of Individuals with Psychiatric Disorders. *JAMA Psychiatry*.

(86) Fan CC, Loughnan R, Makowski C, Pecheva D, Chen CC, Hagler D, **Thompson WK**, Parker N, van der Meer D, Frei O, Andreassen OA, Dale AM (2021). Multivariate genome-wide association study on tissue-sensitive diffusion metrics identifies key molecular pathways for axonal growth, synaptogenesis, and astrocyte-mediated neuroinflammation. *Nature Communications*.

(85) Calle X, Helenius D, Bybjerg-Grauholm J, Pedersen C, Hougaard DM, Børglum AD, Nordentoft M, Mors O, Mortensen PB, Geschwind DH, Raznahan A, **Thompson WK**, Ingason A, Werge T (2021). Prevalence, risk of disease, fertility and mortality of copy number variants in the Danish population: A case-cohort study. *JAMA Psychiatry*.

(84) Shadrin A, Kaufmann T, van der Meer D, Palmer CE, Makowski C, Loughnan R, Jernigan TL, Seibert TM, Hagler DJ, Smeland OB, Motazedi E, Chu Y, Lin A, Cheng W, Hindley G, **Thompson WK**, Fan CC, Holland D, Westlye LT, FreiO, Andreassen OA, Dale AM (2021). Vertex-wise multivariate genome-wide association study identifies 780 unique genetic loci associated with cortical morphology. *NeuroImage*.

(83) van der Meer D, Kaufmann T, Shadrin AA, Makowski C, Frei O, Roelfs D, Sánchez JM, Linden DEJ, Rokicki J, de Leeuw C, **Thompson WK**, Loughnan R, Fan CC, Thompson PM, Westlye LT, Andreassen OA, Dale AM (2021). The genetic architecture of sulcal depth. *Science Advances*.

(82) Maihofer AX, Choi KW, Coleman JRI, Daskalakis NP, Denckla CA, Ketema E, Morey RJ, Polimanti R, Ratanatharathorn A, Torres K, Wingo AP, Zai CC, Aiello AE, Almli LM, Amstadter AB, Andersen SB, Andreassen OA, Arbis PA, Nievergelt CM (2021). Enhancing discovery of genetic variants for PTSD through integration of quantitative phenotypes and trauma exposure information. *Biological Psychiatry*.

(81) Park H, Forthman KL, Kuplicki R, Victora TA, Yeh H-W, **Thompson WK**, Paul MP (2021). Polygenic Risk For Neuroticism Moderates Response To Gains and Losses In Amygdala And Caudate: Evidence From A Clinical Cohort. *Journal of Affective Disorders*.

(80) Shorter JR, Meijsen J, Krebs M, Gådin J, Nudel R, Benros ME, **Thompson WK**, Ingason A, Werge T (In Review). Polygenic factors account for a small proportion of the relationship between infections and mental disorders. *Biological Psychiatry*.

(79) Karcher NR, Paul SE, Johnson EC, Hatoum AS, Baranger DA, Agrawal A, **Thompson WK**, Barch DM, Bogdan R (2021). Psychotic-like experiences and polygenic liability in the ABCD Study[®]. *Biological Psychiatry: CNNI*.

(78) Calle X, Helenius D, Bybjerg-Grauholm J, Pedersen C, Hougaard DM, Børglum AD, Nordentoft. M, Mors O, Mortensen PB, Geschwind DH, Raznahan A, **Thompson WK**, Ingason A, Werge T (Submitted). Prevalence, risk of disease, fertility and mortality of copy number variants in the Danish population: A case-cohort study. *JAMA Psychiatry*.

(77) Loughnan RJ, Palmer CE, **Thompson WK**, Dale AM, Jernigan TL, Fan CC (Submitted). Gene-experience correlation during cognitive development: Evidence from the Adolescent Brain Cognitive Development (ABCD) Study. *Translational Psychiatry*.

(76) Karunamuni RA,..., **Thompson WK**,..., Seibert TM (2021). Performance of Africanancestry-specific polygenic hazard score varies according to local ancestry in 8q24. *Prostate cancer and prostatic diseases*.

(74) Karunamuni RA,..., **Thompson WK**,..., Seibert TM (2021). Additional SNPs improve risk stratification of a polygenic hazard score for prostate cancer. *Prostate cancer and prostatic diseases*.

(73) Liu X, Nudel R, **Thompson WK**, Appadurai V, Schork AJ, Buil A, Rasmussen S, Allesøe. RL, Werge T, Mors O, Børglum AD, Hougaard DM, Mortensen PB, Nordentoft M, Benros ME (2021). Genetic factors underlying the bidirectional relationship between autoimmune and mental disorders–findings from a Danish population-based study. *Brain, Behavior, and Immunity*.

(72) Huynh-Le M-P, Karunamuni R, Fan CC, **Thompson WK**, Muir K, Lophatananon A, Tye K, Wolk A, Håkansson N, Mills IG, Andreassen OA, Dale AM, Seibert TM (2021). Common genetic and clinical risk factors: Association with fatal prostate cancer in the Cohort of Swedish Men. *Prostate Cancer and Prostatic Diseases*.

(71) Aarøe L, Appadurai V, Hansen KM, Schork AJ, Werge T, Mors O, Børglum AD, Hougaard DM, Nordentoft M, Mortensen PB, **Thompson WK**, Buil A, Agerbo E, Petersen MB (2021). Genetic predictors of educational attainment and intelligence test performance predict voter turnout. *Nature Human Behavior*.

(70) Karunamuni, RA, Huynh-Le MP, Fan CC, **Thompson WK**, Eeles, R. A., Kote-Jarai Z., ... & PRACTICAL Consortium. (2021). African-specific improvement of a polygenic hazard score for age at diagnosis of prostate cancer. *International journal of cancer*, 148(1), 99-105.

(69) Huynh-Le, M-P, Fan C-C, Karunamuni R, **Thompson WK**, ..., Andreassen O, Dale A, and Seibert T (2021). Polygenic hazard score is associated with prostate cancer in multi-ethnic populations. *Nature Communications*.

(68) Fan CC, Banks SJ, **Thompson WK**, Chen CH, McEvoy LK, Tan CH, ..., Dale AM (2020). Sex-dependent autosomal effects on clinical progression of Alzheimer's disease. *Brain*, 143(7), 2272-2280.

(67) Wang Y, Nudel R, Benros ME, Skogstrand K, Fishilevich S, Lancet D, Sun J, Hougaard DM, Andreassen OA, Mortensen PB, Buil A, Hansen TF, **Thompson WK**, Werge T (2020). Genome-wide association study identifies 16 genomic regions associated with circulating cytokines at birth. *PLoS Genetics*.

(66) Karunamuni RA, Huynh-Le M-P, Fan CC, **Thompson WK**, EelesRA, Kote-Jarai Z, Muir K, ..., Seibert TM (2020). Additional SNPs improve the performance of a polygenic hazard score for prostate cancer. *Prostate Cancer and Prostatic Diseases*.

(65) Wang Y, Nudel R, Benros ME, Skogstrand K, Fishilevich S, iPSYCH-BROAD, Lancet D, Sun, Hougaard DM, Andreassen OA, Mortensen PB, Demur A, Hansen TF, **Thompson WK**, Werge T (2020). Genome-Wide Association Study Identifies 16 Genomic Regions Associated with Circulating Inflammatory Markers at Birth. *PLoS Genetics*. (64) Castro A, Pyke R, Zhang X, **Thompson WK**, Day CP, Alexandrov L, Zanetti M, Carter H (2020). Strength of Immune Selection in Tumors Varies with Sex and Age. *Nature Communications*.

(63) Aarøe L,, Appadurai V, Hansen KM, Schork AJ, Werge T, Mors O, Børglum AD, Hougaard DM, Nordentoft M, Mortensen PB, **Thompson WK**, Buil A, Agerbo E, Petersen MB (2020). The genetics of citizenship: Genetic disposition towards educational attainment and intelligence test performance predict voter turnout. *Nature Human Behavior*.

(62) Nudel R, Appadurai V, Schork AJ, Buil A, Bybjerg-Grauholm J, Børglum AD, Daly MJ, Mors O, Hougaard DM, Mortensen PB, Werge T, Nordentoft M, **Thompson WK**, Benros ME (2020). A large population-based investigation into the genetics of susceptibility to gastrointestinal infections and the link between gastrointestinal infections and mental illness. *Human Genetics*.

(61) Nudel R, Benros ME, Krebs MD, Allesøe RL, Lemvigh CK, Bybjerg-Grauholm J, Børglum AD, Daly MJ, Nordentoft M, Mors O, Hougaard DM, Mortensen PB, Buil A, Werge T, Rasmussen S, **Thompson WK** (2019). Immunity and mental illness: findings from a Danish population-based immunogenetic study of seven psychiatric and neurodevelopmental disorders. *European Journal of Human Genetics*.

(60) Nievergelt et al. (2019). International meta-analysis of PTSD genome-wide association studies identifies sex- and ancestry-specific genetic risk loci. *Nature Communications*.

(59) Nudel R, Wang Y, Appadurai V, Schork A, Buil A, Agerbo E, Bybjerg-Grauholm J, Børglum A, Daly M, Mors O, Hougaard D, Mortensen PB, Werge T, Nordentoft M, **Thompson WK**, and Benros ME (2019). A large-scale genomic investigation of susceptibility to infection and its association with mental disorders in the Danish population. *Translational Psychiatry.*

(58) Smeland OB, Shadrin A, Frei O, O'Connell K, Fan CC, Bahrami S, **Thompson WK**, Holland D, Djurovic S, Dale AM, Andreassen OA (2019). Improved discovery of genetic overlap using conditional false discovery rate and mixture modeling methods. *Human Genetics*.

(57) Wang Y, Karstoft K-I, Nievergelt C, Maiholfer A, Stein M, Grauholm JB, Bækvad-Hansen M, Hougaard DM, Andreaasen OA, Werge T, **Thompson WK**, Andersen SB (2019). Post-traumatic stress following military deployment: Genetic associations and cross-disorder genetic correlations. *Journal of Affective Disorders*.

(56) Frei O, Holland D, Smeland OB, Shadrin AA, Fan CC, Maeland S, O'Connell KS, Wang Y, Djurovic S, **Thompson WK**, Andreassen OA, Dale AM (2019). Bivariate causal mixture model quantifies polygenic overlap between complex traits beyond genetic correlation. *Nature Communications*.

(55) Liu X, Helenius D, ..., **Thompson WK**, ..., Buil A, Feenstra B (2019). Variants in the fetal genome near pro-inflammatory cytokine genes on 2q13 are associated with gestational duration. *Nature Communications*.

(54) Nudel R, Benros ME, Krebs MD, Allesøe RL, Lemvigh CK, Bybjerg-Grauholm J, Børglum A, Daly M, Nordentoft M, Mors O, Hougaard D, Mortensen PB, Buil A, Werge T, Rasmussen S, **Thompson WK** (2019) Immunity and mental illness: findings from a large Danish population-based immunogenetic study of seven psychiatric and neurodevelopmental disorders.*European Journal of Human Genetics.* (53) Barbu MC et al. (2019). Association of Whole-Genome and NETRIN1 Signaling Pathway–Derived Polygenic Risk Scores for Major Depressive Disorder and White Matter Microstructure in the UK Biobank. *Biological Psychiatry* 4 (1), 91-100.

(52) Bettella F, Brown AA, SmelandOB, Wang Y, Witoelar A, Buil Demur AA, **Thompson WK**, Zuber V, Dale AM, Djurovic S, Andreassen OA (2018). Cross-tissue eQTL enrichment of associations in schizophrenia. *PLOS ONE*.

(51) Srinivasan S, Bettella F, Frei O, Hill WD, Wang Y, Witoelar A, Schork AJ, **Thompson WK**, Davies G, Desikan RS, Deary IJ, Melle I, Ueland T, Dale AM, Djurovic S, Smeland OB, Andreassen OA (2018). Genetic markers of recent human evolution are enriched in GWAS of educational attainment and cognitive traits. *Scientific Reports*.

(50) Peyrot WJ,..., **Thompson WK**,..., Yang J (2018). Does childhood trauma moderate polygenic risk for depression? A meta-analysis of 5765 subjects from the Psychiatric Genomics Consortium. *Biological Psychiatry*.

(49) Fan CC, McGrath JJ, Appadurai V, Buil A, Gandal MJ, Schork AJ, Mortensen PB, Agerbo E, Geschwind SA, Geschwind D, Werge T, **Thompson WK***, Pedersen CB (2018). Spatial fine-mapping for gene-by-environment effects identifies risk hot spots for schizophrenia. *Nature Communications*. *co-senior authors.

(48) Marty R, **Thompson WK**, Salem RM, Maurizio Zanetti M, Carter H (2018). Evolutionary pressure against MHC class II binding cancer mutations. *Cell*.

(47) LeBlanc M, Zuber V, **Thompson WK**, Andreassen OA, Frigessi A and Andreassen BK (2018). A Correction for Sample Overlap in Genome-Wide Association Studies in a Polygenic Pleiotropy-Informed Framework. *BMC Genomics*.

(46) Erlangsen A, Appadurai V, Wang Y, Turecki G, Mors O, Werge T, Mortensen PB, Starnawska A, Børglum AD, Schork A, Nudel R, Bækvad-Hansen M, Bybjerg-Grauholm J, Hougaard DM, **Thompson WK**, Nordentoft M, Agerbo E (2018). Genetics of Suicide Attempts in Individuals with and without Mental Disorders: a population-based genomewide association study. *Molecular Psychiatry*.

(45) Ganna A, Satterstrom K, Zekavat S, Das I, Kurki M, Churchhouse C, Alfoldi J, Martin A, Havulinna A, Byrnes A, **Thompson WK**, Nielsen P, Karczewski K, Saarentaus E, Rivas M, Gupta N, Pietilainen O, Emdin C, Lescai F, Bybjerg-Grauholm J, Flannick J, Mercader J, Udler M, Laakso M, Salomaa V, Hultman C, Ripatti S, Hamalainen E, Moilanen J, Korkko J, Kuismin O, Nordentoft M, Hougaard D, Mors O, Werge T, Mortensen P, MacArthur D, Daly M, Sullivan P, Locke A, Palotie A, Borglum A, Kathiresan S, Neale B (2018). Quantifying the impact of rare and ultra-rare coding variation across the phenotypic spectrum. *American Journal of Human Genetics*.

(44) Schwartzman A, Schork AJ, Zablocki R, **Thompson WK** (2018). A simple, consistent estimator of heritability for genome-wide association studies. *Annals of Applied Statistics*.

(43) Schork AJ, Won H, Appadurai V, Nudel R, Gandal M, Delaneau O, Hougaard D, Baekved-Hansen M, Bybjerg-Grauholm J, Pedersen MG, Pedersen CB, Neale BM, Daly MJ, Nordentoft M, Mors O, Boerglum AD, Mortensen PB, Buil A, **Thompson WK**, Geschwind D, Werge T (2019). A genome-wide association study of shared risk across psychiatric disorders implicates gene regulation during fetal neurodevelopment. *Nature Neuroscience*.

(42) Wray N,, **Thompson WK**,....Sullivan P (2018). Genome-wide association analyses identify 44 risk variants and refine the genetic architecture of major depression. *Nature Genetics*.

(41) Schork, AJ, Brown TT, Hagler DJ, **Thompson WK**, Chen C-H, Dale AM, Jernigan TL, Akshoomoff N, and PING (2018). Polygenic risk for psychiatric disorders correlates with executive function in typical development. *Genes, Brain and Behavior*.

(40) Li W, Fan CC, Mäki-Marttunen T, Thompson WK, Schork AJ, Bettella F; Schizophrenia Working Group of the Psychiatric Genomics Consortium, Djurovic S, Dale AM, Andreassen OA, Wang Y (2018). A molecule-based genetic association approach implicates a range of voltage-gated calcium channels associated with schizophrenia. *Neuropsychiatric Genetics*.

(39) Shadrin A, Smeland OB, Zayats T, Schork AJ, Frei O, Bettella F, Witoelar A, Li W, Eriksen JA, Krull F, Djurovic S, Faraone SV, Reichborn-Kjennerud T, **Thompson WK**, Johansson S, Haavik J, Dale AM, Wang Y, Andreassen OA (2018). Novel Loci Associated With Attention-Deficit/Hyperactivity Disorder Are Revealed by Leveraging Polygenic Overlap With Educational Attainment. *Journal of the American Academy of Child & Adolescent Psychiatry.*

(38) Olsen L, Sparsø T, Weinsheimer SM, Bertalan M, Mazin W, Rosengren A, Sanchez X, Hoeffding LK, Schmock H, Baekvad-Hansen M, Bybjerg-Grauholm J, Daly MJ, Neale BM, Pedersen MG, Agerbo E, Mors O, Børglum A, Nordentoft M, Hougaard DM, Mortensen PB, Geschwind DH, Pedersen CH, **Thompson WK***, Werge T* (2018). Prevalence of rearrangements in the 22q11. 2 region and population-based risk of neuropsychiatric and developmental disorders in a Danish population: a case-cohort study. *Lancet Psychiatry*. ***co-senior authors**.

(37) Chen C-H, Wang Y, Lo M-T, Schork A, Fan C-C, Holland D, Kauppi K, Smeland O, Djurovic S, Sanyal N, Hibar D, Thompson P, **Thompson WK**, Andreassen O, Dale A (2017). Leveraging genome characteristics to improve gene discovery for putamen subcortical brain structure. *Scientific Reports*.

(36) Picart-Armada S, **Thompson WK**, Buil A, Perera-Lluna A (2018). diffuStats: An R package to compute diffusion-based scores on biological networks. *Bioinformatics*.

(35) Zuber V, Jönsson E, Witoelar A, **Thompson WK**, Schork A, Bettella F, Wang Y, Djurovic S, Smeland O, Dieset I, Desikan R, Küry S, Bézieau S, Dale A, Mills I, Andreassen OA (2017). Identification of shared genetic variants between schizophrenia and lung cancer. *Scientific Reports*.

(34) Zablocki R, Levine R, Schork A, Wang Y, **Thompson WK** (2017). Semi-parametric covariate-modulated local false discovery rate for genome-wide association studies. *Annals of Applied Statistics*.

(33) Smeland OB, Frei O, Kauppi K, Hill WD, Li W, Wang Y, Krull F, Bettella F, Eriksen JA, Witoelar A, Davies G, Fan CC, **Thompson WK**, Lam, Lencz T, Chen CH, Ueland T, Jönsson EG, Djurovic S, Deary IJ, Dale AM, Andreassen OA (2017). Identification of genetic loci jointly influencing schizophrenia risk and the cognitive traits of verbal-numerical reasoning, reaction time and general cognitive function. *JAMA Psychiatry*.

(32) Smeland OB, Frei O, Shadrin A, O'Connell K, Fan CC, Bahrami S, Holland D, Djurovic S, **Thompson WK**, Dale AM, Andreassen OA (2019). Discovery of shared genomic loci using the conditional false discovery rate approach. *Human Genetics*.

(31) Devor A, Andreassen OA, Wang Y, Mäki-Marttunen T, Smeland IB, Fan CC, Schork AJ, Holland D, **Thompson WK**, Witoelar A, Chen CH, Desikan DS, McEvoy L, Djurovic S, Greengard P, Svenningsson P, Einevoll GT, Dale AM (2017). Genetic evidence for role of integration of fast and slow neurotransmission in schizophrenia. *Molecular Psychiatry*.

(30) Witoelar A, Jansen IE, Wang Y, Desikan RS, Gibbs RJ, Blauwendraat C, **Thompson WK**, Hernandez DG, Djurovic S, Schork AJ, Bettella F, Ellinghaus D, Franke A, Lie BA, McEvoy LK, Karlsen TH, Lesage S, Morris H, Brice A, Wood N, Heutink P, Hardy J, Singleton A, Dale AM, Gasser T, Andreassen OA, Sharma M (2017). Genome-wide pleiotropy between Parkinson's disease and autoimmune diseases. *JAMA Neurology*.

(29) Desikan RS, Fan CC, Wang Y, Schork A, Cabral H, Cupples LA, **Thompson WK**, Besser L, Kukull W, Holland D, Chen C-H, Brewer J, Karow D, Kauppi K, Witeolar A, Karch C, Bonham L, Yokoyama J, Rosen H, Miller B, Dillon W (2017). Genetic assessment of age-associated Alzheimer's disease risk: development and validation of a polygenic hazard score. *PloS Medicine*.

(28) Srinivasan S, Bettella F, Hassani S, Wang Y, Witoelar A, Schork AJ, **Thompson WK**, Collier DA, Desikan RS, Melle I, Dale AM, Djurovic S, Andreassen OA (2017). Probing the association between early evolutionary markers and schizophrenia. *PLOS ONE*.

(27) Le Hellard S, Wang W, Witoelar A, Zuber V, Bettella F, Hugdahl K, Espeseth T, Steen VM, Melle I, Desikan R, Schork AJ, **Thompson WK**, Dale AM, Djurovic S, Andreassen OA (2016). Identification of Gene Loci That Overlap Between Schizophrenia and Educational Attainment. *Schizophrenia Bulletin*.

(26) Zuber V, Marconett CN, ShiJ Hua X, Wheeler W, Yang C, Laplana M, Risch A, Witolaer A, **Thompson WK**, Schork AJ, Bettella F, Wang Y, Djurovic S, Zhou B, Borok Z, Houlston R, McKay J, Hung R, Bikeböller H, Christiani D, Wei Y, Gapstur SM, Albanes D, Caporaso N, Amos CI, Han Y, Chatterjee N, Rafnar T, Dale AM, Laird-Offringa IA, Andreassen OA, Mills IG, Landi MT (2016). Pleiotropic analysis of lung cancer and blood triglycerides. *JNCI: Journal of the National Cancer Institute*.

(25) Holland D, Wang Y, **Thompson WK**, Schork A, Cheng C-H, Lo M-Z, Witeolar A, Werge T, O'Donovan M, Andreassen OA, Dale AM (2016). Estimating Effect Sizes and Expected Replication Probabilities from GWAS Summary Statistics. *Frontiers in Genetics*.

(24) Wang Y, Bos, SD, Harbo HF, **Thompson WK**, Schork AJ, Bettella F, Lie BA, Li W, McEvoy L, Djurovic S, Desikan RS, Dale AM, Andreassen OA (2016). Genetic overlap between multiple sclerosis and several cardiovascular disease risk factors. *Neurobiology of Aging*.

(23) Wang Y, **Thompson WK**, Schork AJ, Holland D, Chen C-H, Bettella F, Desikan R, Li W, Witoelar A, Zuber V, Devor A, Bipolar Disorder and Schizophrenia Working Group of the Psychiatric Genomics Consortium, Nöthen MM, Rietschel M, Chen Q, Werge T, Cichon S, Weinberger DR, Djurovic S, O'Donovan M, Wray N, Visscher P, Andreassen OA, Dale AM (2016). Leveraging genomic annotations and pleiotropic enrichment for improved replication rates in schizophrenia GWAS. *PLOS Genetics*.

(22) Schork A, Wang Y, **Thompson WK**, Dale AM, Andreassen OA (2016). New statistical approaches exploit the polygenic architecture of schizophrenia - implications for understanding the underlying neurobiology. *Neurobiology of Disease*.

(21) LeBlanc M, Zuber V, Wang Y, McEvoy LK, **Thompson WK**, Schork AJ, Reppe S, Barrett-Conner E, Ligthart S, Dehghan A, Gautvik KM, et al., and Desikan R, Dale AM

(2016). Identifying novel gene variants in coronary artery disease and shared genes with several cardiovascular risk factors. *Circulation Research*.

(20) Yokoyama JS, Wang Y, Schork AJ, **Thompson WK**, Karch CM, Cruchaga C, McEvoy LK, Witoelar A, Chen C-H, Holland D, Brewer JB, Wilson DM, Mukherjee P, Hess CP, Miller Z, Bonham LW, Rabinovici GD, Rosen HJ, Miller BL, Hyman BT, Schellenberg GD, Andreassen OA, Dale AM, Desikan RS (2016). Association Between Genetic Traits for Immune-Mediated Diseases and Alzheimer Disease. *JAMA Neurology*.

(19) Srinivasan S, Bettella F, Mattingsdal M Wang Y, Witoelar A, Schork AJ, **Thompson WK**, Zuber V, Winsvold BS, Zwart JA, Collier DA, Desikan RS, Melle I, Werge T, Dale AM, Djurovic S, Andreassen OA (2015). Genetic markers of human evolution are enriched in schizophrenia. *Biological Psychiatry*.

(18) Andreassen OA, Reppe S, Wang Y, **Thompson WK**, McEvoy L, Schork AJ, Zuber V, Bettella F, GEFOS Consortium, Estrada R, Mills I, Desikan R, Djurovic S, Gautvik K, Dale AM (2015). Genetic Sharing With Cardiovascular Disease Risk Factors Reveals Novel Bone Mineral Density Loci. *PLoS ONE*.

(17) Desikan RS, Schork AJ, Wang, Y, **Thompson WK**, Dehghan A, Ridker PM, ... & Karow, DS (2015). Polygenic Overlap Between C-Reactive Protein, Plasma Lipids, and Alzheimer Disease CLINICAL PERSPECTIVE. Circulation, 131(23), 2061-2069.

(16) **Thompson WK**, Wang Y, Schork AJ, Witoelar A, Zuber V, Holland D, Andreassen AO, Dale AM (2015). An Empirical Bayes method for estimating the distribution of effects in genome-wide association studies. *PLoS Genetics*. <u>http://journals.plos.org/</u>plosgenetics/article?id=10.1371/journal.pgen.1005717.

(15) Goulart LF, Bettella F, Sønderby IE, Schork AJ, **Thompson WK**, Mattingsdal M, Steen VM, Zuber V, Wang Y, Dale AM, Andreassen OA, Djurovic S (2015). MicroRNAs Enrichment in GWAS of Complex Human Phenotypes. *BMC Genomics:* 16, 304.

(14) Desikan RS, Schork AJ, Wang W, **Thompson WK**, Dehghan A, Ridker PM, Chasman DL, McEvoy LK, Holland D, Chen C-H, Karow DS, Brewer JB, Hess CP, Williams J, Sims R, O'Donovan MC, Choi SH, Bis JC, Ikram MA, Gudnason V, DeStefano A, van der Lee SJ, Psaty BS, van Duijn CM, Launer L, Seshadri S, Pericak-Vance MA, Mayeux R, Haines JL, Farrer LA, Hardy J, Ulstein ID, Aarsland D, Fladby T, White LR, Sando SB, Rongve A, Witoelar A, Djurovic S, Hyman BT, Snaedal J, Steinberg S, Stefansson H, Stefansson K, Schellenberg GD, Andreassen OA, Dale AM (2015). Polygenic overlap between C-reactive protein, plasma lipids and Alzheimer's disease. *Circulation*.

(13) Andreassen OA, Desikan R, Wang Y, **Thompson WK**, Schork AJ, Zuber V, Doncheva NT, Ellinghaus E, Albrecht M, Mattingsdal M, Franke A, Lie BA, Mills I (2015). Abundant genetic overlap between blood lipids and immune-mediated diseases indicates shared molecular genetic mechanisms. *PLoS ONE*.

(12) Desikan RS, Schork AJ, Wang Y, Witoelar A, Sharma M, McEvoy LK, Holland D, Brewer JB, Chen CH, **Thompson WK**, Harold D, Williams J, Owen MJ, O'Donovan MC, Pericak-Vance MA, Mayeux R, Haines JL, Farrer LA, Schellenberg GD, Heutink P, Singleton AB, Brice A, Wood NW, Hardy J, Martinez M, Choi SH, DeStefano A, Ikram MA, Bis JC, Smith A, Fitzpatrick AL, Launer L, van Duijn C, Seshadri S, Ulstein ID, Aarsland D, Fladby T, Djurovic S, Hyman BT, Snaedal J, Stefansson H, Stefansson K, Gasser T, Andreassen OA, Dale AM (2015) "Genetic overlap between Alzheimer's disease and Parkinson's disease at the MAPT locus." *Molecular psychiatry*. (11) Rosen O and **Thompson WK** (2015). Bayesian Semiparametric Copula Estimation with Application to Psychiatric Genetics. *Biometrical Journal*.

(10) Zablocki RW, Levine R, Schork AJ, Andreassen OA, Dale AM, and **Thompson WK** (2014). Covariate-Modulated Local False Discovery Rate for Genome-Wide Association Studies. *Bioinformatics.* doi: 10.1093/bioinformatics/btu145.

(9) Andreassen OA, Zuber V, **Thompson WK**, Schork AJ, PRACTICAL Consortium, Djurovic S; Desikan RS, Mills IG, Dale AM. (2014). Shared common variants in prostate cancer and blood lipids. *Int J of Epidemiology: 43, 1205-1214.*

(8) Andreassen OA, Harbo HF, Wang Y, **Thompson WK**, Schork AJ, Mattingsdal M, Zuber V, Bettella F, Kelsoe JR, Kendler K, O'Donovan MC, Sklar P, The Psychiatric Genomics Consortium (PGC) Bipolar Disorder and Schizophrenia Work Groups, The International Multiple Sclerosis Genetics Consortium (IMSGC), McEvoy LK, Desikan RS, Lie BA, Djurovic S, Dale AM (2014). Genetic pleiotropy between multiple sclerosis and schizophrenia but not bipolar disorder: implications for immune related disease mechanisms. *Molecular Psychiatry.* doi:10.1038/mp.2013.195.

(7) Andreassen OA, **Thompson WK**, Dale AM (2014). Boosting the power of schizophrenia genetics by leveraging new statistical tools. *Schizophrenia Bulletin*. 40, 13-17.

(6) Andreassen OA, McEvoy LK, **Thompson WK**, Schork AJ, Reppe S, Wang Y, The International Consortium for Blood Pressure GWAS (ICBP), The Bone Mineral Density Consortium, Barrett-Connor E, Gautvik K, Aukrust P, Karlsen TH, Djurovic S, Desikan RS, Dale AM (2014). Identifying common genetic variants in blood pressure due to polygenic pleiotropy with associated phenotypes. *Hypertension*. 63, 819-826.

(5) Andreassen OA, **Thompson WK**, Ripke S, Schork AJ, Mattingsdal M, Kelsoe J, Kendler KS, O'Donovan MC, Rujescu D, Werge T, Sklar P, The Psychiatric Genomics Consortium (PGC) Bipolar Disorder and Schizophrenia Working Groups, Roddey JC, Chen C-H, Desikan RS, Djurovic S, Dale AM (2013). Improved detection of common variants associated with schizophrenia and bipolar disorder using pleiotropy-informed conditional False Discovery Rate method. *PLoS Genetics 9: e1003455. doi:10.1371/journal.pgen.1003455.*

(4) Schork AJ, **Thompson WK**, Pham P, Torkamani A, Roddey JC, Sullivan PF, Kelsoe JR, Purcell SR, O'Donovan MC, the Tobacco Consortium, The Bipolar Disorder Psychiatric Genome-Wide Association Study (GWAS) Consortium, The Schizophrenia Psychiatric Genome-Wide Association Study (GWAS) Consortium, Schork NJ, Andreassen OA, Dale AM (2013). All SNPs Are Not Created Equal: Genome-Wide Association Studies Reveal a Consistent Pattern of Enrichment among Functionally Annotated SNPs. *PLoS Genetics* 9, e1003449. doi:10.1371/journal.pgen.1003449.

(3) Liu JZ, Hov JR, Folseraas T, Ellinghaus E, Rushbrook SM, Doncheva NT, Andreassen OA, Weersma RK, Weismüller TJ, Eksteen B, Invernizzi P, Hirschfield G, Gotthardt DN, Pares A, Ellinghaus D, Shah T, Juran BD, Milkiewicz P, Rust C, Schramm C, Müller T, Srivastava B, Mells M, Dalekos G, Nöthen MM, Winkelmann J, Mitrovic M, Braun F, Ponsioen CY, Croucher PJP, Sterneck M, Teufel A, Mason AL, Saarela J, Leppa V, Pelkonen V, Dorfman R, Alvaro D, Floreani A, Onengut-Gumuscu S, Rich SS, **Thompson WK**, Schork AJ, Næss S, Thomsen I, Mayr G, König I, Cleynen I, Gutierrez J, Ricaño-Ponce I, van Heel D, Björnsson E, Sandford RN, Durie PR, Melum E⁴, Vatn M, Silverberg M, Duerr RH, Padyukov L, Brand S, Sans M, Annese V, Achkar P, Boberg KM, Marschall H-U, Chazouillères O, Bowlus CL, Wijmenga C, Schrumpf E, Vermeire S, Albrecht M, The UK-PSC Consortium, The International IBD Genetics Consortium, Barrett J, Rioux JD, Alexander G, Bergquist A, Cho J, Schreiber S, Manns M, Färkkilä M, Dale AM, Chapman R, Lazaridis KN, The International PSC Study Group, Franke A, Anderson CA, Karlsen TH (2013). Dense genotyping of known autoimmune disease regions identifies nine new risk loci for primary sclerosing cholangitis. *Nature Genetics* 45, 670–675.

(2) Andreassen OA, Djurovic S, **Thompson WK**, Schork AJ, Kendler KS, O'Donovan MC, Rujescu D, Werge T, van de Bunt M, Morris AP, McCarthy MI, Roddey JC, McEvoy LK, Desikan RS, Dale AM (2013). Improved detection of common variants associated with schizophrenia by leveraging pleiotropy with cardiovascular disease risk factors. *American Journal of Human Genetics* 92, 197–209.

(1) Franz CE, Panizzon MS, Eaves LJ, **Thompson WK**, Lyons MJ, Glatt SJ, Tsuang MT, Jacobson KC, Kremen WS (2012). Genetic and environmental multidimensionality of the cognitive component of subjective well- and ill-being in middle aged twin men. *Behavior Genetics* 42:579–591.

Psychiatry and Neurocognition

(68) Pedersen CB, Antonsen S, Timmermann A, Pedersen NG, Ejlskov L, Horsdal HT, Agerbo E, Webb RT, Raaschou-Nielsen O, Sigsgaard T, Sabel CE, Fan CC, **Thompson WK** (2021). Urban-rural differences in schizophrenia risk: Neighborhood-level indicators, urbanicity and population density using multilevel survival analyses in Danish residents. *Schizophrenia Bulletin Open*.

(67) Alzueta E, Podhajsky S, Zhao Q, Tapert SF, **Thompson WK**, de Zambotti M, Yuksel D, Kiss O, Wang R, Volpe L, Prouty D, Colrain IM, Clark DB, Goldston DB, Nooner KB, De Bellis MD, Brown SA, Nagel BJ, Pfefferbaum A, Sullivan EV, Baker FC, Pohl KM (2021). Risk for depression tripled during the COVID-19 pandemic in emerging adults followed for the last 8 years. *Psychological Medicine*.

(66) Palmer CE, Sheth C, Marshall AT, Adise S, Baker FC, Chang L, Clark DB, Coronado C, Dagher RK, Diaz V, Dowling GJ, Gonzalez MR, Haist F, Herting MM, Huber RS, Jernigan TL, LeBlanc K, Lee K, Lisdahl KM, Neigh G, Patterson MW, Renshaw2 P, Rhee KE, Tapert S, **Thompson WK**, Uban K, Sowell ER, Yurgelun-Todd D (2021). A Comprehensive Overview of the Physical Health of the Adolescent Brain Cognitive Development Study Cohort at Baseline. *Frontiers in Pediatrics*.

(65) Dick AS, Silva K, Gonzalez R, Sutherland MT, Laird AR, **Thompson WK**, Tapert SF, Squeglia LM, Gray KM, Nixon SJ, Cottler LB, La Greca AM, Gurwitch RH, Comer JS (2021). Neural vulnerability and hurricane-related media are associated with post-traumatic stress in youth.*Nature Human Behaviour*.

(64) Marshall AT, McConnell R, LanphearBP, **Thompson WK**, Herting MM, Sowell ER (2021). Risk of lead exposure, subcortical brain structure, and cognition in a large cohort of 9- to 10-year-old children. *PLOS ONE*.

(63) Alzueta E, Podhajsky S, Zhao Q, Tapert SF, **Thompson WK**, de Zambotti M, D Yuksel, Kiss O, Wang R, Volpe L, Prouty D, Colrain IM, Clark DB, Goldston DB, Nooner KB, De Bellis MD, Brown SA, Nagel BB, Pfefferbaum A, Sullivan EV, Baker FC, Pohl KM (2021). Risk for Depression Tripled during COVID-19 Pandemic in Emerging Adults Followed for the Last 8 Years. *Psychological Medicine*.

(62) Lannoy S, Pfefferbaum A, Le Berre A-P, **Thompson WK**, Brumback T, Schulte T, Pohl K, De Bellis MD, Nooner KB, Baker FC, Prouty D, Colrain IM, Nagel BJ, Brown SA, Clark DB, Tapert SF, Sullivan EV, Müller-Oehring E (2021). Growth trajectories of

cognitive and motor control in adolescence: How much is development and how much is practice? *Neuropsychology*.

(61) Kaufmann C, Bondi M, **Thompson WK**, Spira A, Ancoli-Israel S, Malhotra A (2021). Cognitive Performance Trajectories Before and After Sleep Treatment Initiation in Middle-Aged and Older Adults: Results from the Health and Retirement Study. *Journal of Gerontology: Medical Sciences*.

(60) Fan CC, Marshall A, Smolker H, Gonzalez MR, Tapert SF, Barch D, Sowell E, Dowling G, Cardenas-Iniguez C, Ross J, **Thompson WK**, Herting MM (2021). Adolescent Brain Cognitive Development (ABCD) study Linked External Data (LED): Protocol and Practices for Geocoding and Assignment of Environment Data.

(59) Barch DM, Albaugh MA, Baskin-Sommers A, Bryant BE, Clark DB, Dick AS, Feczko E, Foxe JJ, Gee DJ, Giedd J, Glantz MD, Hudziak JJ, Karcher NR, Kelley B, LeBlanc K, Maddox M, McGlade EC, Mulford C, Nagel BJ, Neigh G, Palmer CE, Potter AS, Sher KJ, Tapert SF, **Thompson WK**, Xie L (2021). Demographic and Mental Health Assessments in the Adolescent Brain Cognitive Development Study: Updates and Longitudinal Trajectories. *Developmental Cognitive Neuroscience*.

(58) Wigdor E, Weiner D, Grove J, Fu J, **Thompson WK**, Carey C, Baya N, van der Merwe C, Walters R, Satterstrom S, Palmer D, Rosengren A, Bybjerg-Grauholm J, Hougaard D, Mortensen PB, Daly MJ, Talkowski M, Sanders S, Bishop S, Børglum A, Robinson E (Submitted). The female protective effect against autism spectrum disorder. *Nature Neuroscience*.

(57) De Nadai A, Hu J, **Thompson WK** (2021). Data Pollution in Neuropsychiatric Research: Underreported Contamination of Study Results. *JAMA Psychiatry*.

(56) Dick AS, Lopez DA, Watts AL, Heeringa S, Reuter C, Bartsch H, Fan CC, Kennedy DN, Palmer C, Marshall A, Haist F, Hawes S, Nichols TE, Barch DM, Jernigan TL, Garavan H, Grant S, Pariyadath V, Hoffman E, Neale M, Stuart EA, Paulus MP, Sher KJ, **Thompson WK** (2021). Meaningful Associations in the Adolescent Brain Cognitive Development Study. *NeuroImage*.

(55) Krebs MD, Themudo GE, Benros ME, Mors O, Børglum AD, HougaardD, Mortensen PB, Nordentoft M, Gandal MJ, Fan CC, Geschwind DH, Schork AJ, Werge T, **Thompson WK** (2021). Patterns in Comorbid Diagnostic Trajectories of Individuals with Schizophrenia Associate with Etiological Factors. *Nature Communications*.

(54) Lopez. DA, Mao Y, **Thompson WK**, Foxe JJ, Freedman EG (2021) Effects of breastfeeding duration on domain-specific neurocognitive performance that persist into later childhood. *JAMA Pediatrics*.

(53) Herting MM, Uban KA, Gonzalez, MR, Baker, FC, Kan, EC, **Thompson WK**, ... & Sowell ER (2021). Correspondence between perceived pubertal development and hormone levels in 9-10 year-olds from the Adolescent Brain Cognitive Development study. *Frontiers in Endocrinology*, *11*, 1012.

(52) Lees B, Squeglia LM, Breslin FB, **Thompson WK**, Tapert S, Paulus MP (2020). Screen media activity does not displace other recreational activities among 9-10 year-old youth: A cross-sectional ABCD Study®. BMC Public Health. *BMC Public Health*.

(51) Santiago J, Akeman E, Kirlic N, Clausen AN, Cosgrove KT, McDermott TJ, Mathis B, Paulus M, Craske MG, Abelson J, Martell C, Wolitzky-Taylor K, Bodurka J, **Thompson WK**, Aupperle RL (2020). Protocol for a randomized controlled trial

examining multilevel prediction of response to behavioral activation and exposure-based therapy for generalized anxiety disorder. *Trials*.

(50) Iddi S, Li D, Aisen PS, Rafii MS, **Thompson WK**, Donohue MC (2019). Predicting the course of Alzheimer's progression. *Brain informatics*.

(49) Howlett J, Thompson WK, Paulus MP (2019). Computational Evidence for Underweighting of Current Error and Overestimation of Future Error in Anxious Individuals. *Biological Psychiatry: Cognitive Neuroscience and Neuroimaging*.

(48) Paulus MP and **Thompson WK** (2019) "Computational approaches and machine learning for individual-level treatment predictions." *Psychopharmacology*: 1-9.

(47) Paulus MP and **Thompson WK** (2019). The Challenges and Opportunities of Small Effects: The New Normal in Academic Psychiatry. Editorial, *JAMA Psychiatry*.

(46) Hawes S, Waller R, **Thompson WK**, Hyde L, Byrd A, Gonzalez Raul (2019). Development of a brief, reliable measure in a large and diverse sample of preadolescent youth. *Psychological medicine*, 50(3), 456-464.

(45) Li D, Iddi S, **Thompson WK**, Donohue M (2018). Bayesian latent time joint mixedeffects model of progression in the Alzheimer's Disease Neuroimaging Initiative. *Alzheimer's & Dementia: Diagnosis, Assessment & Disease Monitoring*

(44) Iddi S, Li D, Aisen P, Rafii M, **Thompson WK**, Litvan I, Donohue MC (2018). Estimating the evolution of disease in the Parkinson's Progression Markers Initiative. *Neurodegenerative Diseases*.

(43) Xu S, **Thompson WK**, Kerr J, Godbole S, Sears DD, Patterson R, Natarajan L (2018). Modeling interrelationships between health behaviors in overweight breast cancer survivors: applying Bayesian networks. *PLoS One.*

(42) Xu S, **Thompson WK**, Ancoli-Israel S, Liu L, Palmer B, Natarajan L (2018). Cognition, quality-of-life and symptom clusters in breast cancer: using Bayesian networks to elucidate complex relationships. *Psycho-Oncology*.

(41) Huang He, **Thompson WK**, Paulus MP (2017). Computational Dysfunctions In Anxiety: Failure To Differentiate Signal From Noise. Biological Psychiatry.

(40) Thomas ML, Kaufmann CN, Palmer BW, Depp CA, Martin AS, Glorioso DK, **Thompson WK**, Jeste DV (2016). Paradoxical Trend for Improvement in Mental Health with Aging: A Community-Based Study of 1,546 Adults Aged 21-99 Years. *Journal of Clinical Psychiatry*.

(39) Depp CA, Ceglowski J, Wang VC, Yaghouti F, Mausbach BT, **Thompson WK**, Granholm EL (2015). Augmenting psychoeducation with a mobile intervention for bipolar disorder: A randomized controlled trial. *Journal of affective disorders*. 174, 23-30.

(38) Moore RC, Martin AS, Kaup AR, **Thompson WK**, Peters ME, Jeste DV, Golshan S, Eyler LT (2015). From suffering to caring: A model of differences among older adults in levels of compassion. *J. of Geriatric Psychiatry*: 30, 185-191.

(37) Akshoomoff N, Newman E, **Thompson WK**, Libiger O, McCabe C, Bloss CS, Chang L, Amaral DG, Casey BJ, Ernst TM, Frazier JA, Gruen JR, Kaufmann WE, Kenet T, Kennedy DN, Murray SS, Sowell ER, Schork N, Dale AM, Jernigan TL for the Pediatric Imaging, Neurocognition, and Genetics Study (2014). The NIH Toolbox Cognition Battery: Results from a Large Normative Developmental Sample (PING). *Neuropsychology.* 28,1-10.

(36) Moore RC, Eyler LT, Mausbach BT, Zlatar ZZ, **Thompson WK**, Peavy G, Fazeli PL, Jeste DV (2014) "Complex interplay between health and successful aging: Role of perceived stress, resilience, and social support." *The American Journal of Geriatric Psychiatry*.

(35) Wang V, Depp CA, Ceglowski J, **Thompson WK**, Rock D, Jeste DV (2014). Sexual Health and Function in Later Life: A Population-Based Study of 606 Older Adults with a Partner. *The American Journal of Geriatric Psychiatry*: 23, 227–233.

(34) Johnson D, Thom N, Stanley E, Haase L, Simmons AN, Shi P, Minor T, **Thompson WK**, Potterat E (2014). Modifying Resilience Mechanisms in At-Risk Individuals: A Controlled Study of Mindfulness Training in Marines Preparing for Deployment. *American Journal of Psychiatry*: 171, 844-853.

(33) Franz CE, Lyons MJ, Spoon K, Hauger RL, Lohr J, Panizzon MS, **Thompson WK**, Tsuang M, Vuoksimaa E, Kremen WS (2014). Post-Traumatic Stress Symptoms and Adult Attachment: A 24 Year Longitudinal Study. *American Journal of Geriatric Psychiatry*: 22, 1603-1612. PMID: 24636844.

(32) Zlatar ZZ, Moore RC, Palmer BW, **Thompson WK**, Jeste DV (2014). Cognitive Complaints Correlate With Depression Rather Than Concurrent Objective Cognitive Impairment in the Successful Aging Evaluation Baseline Sample. *Journal of Geriatric Psychiatry and Neurology*. PMID: 24614203.

(31) Kremen WS, Jak AJ, Panizzon MS, Spoon KM, Franz CE, **Thompson WK**, Jacobson KC, Vasilopoulos T, Vuoksimaa E, Xian H, Toomey R, Lyons MJ, Kremen W. (2013). Early identification and heritability of mild cognitive impairment. *International Journal of Epidemiology* doi: 10.1093/ije/dyt242.

(30) Franz CE, Spoon K, **Thompson WK**, Hauger RL, Hellhammer DH, Jacobson KC, Lupien S, Lyons MJ, McCaffery J, McKenzie R, Mendoza SP, Panizzon MS, Ramundo A, Shahroudi A, Kremen WS (2013). Adult cognitive ability and socioeconomic status as mediators of the effects of childhood disadvantage on salivary cortisol in aging adults. *Psychoneuroendocrinology*. 38, 2127–2139.

(29) Moore RC, Moore DJ, **Thompson WK**, Vahia IV, Jeste DV (2013). A case-controlled study of successful aging in older HIV-infected adults. *J. Clin Psychiatry* 74, 417-423.

(28) Vahia IV, Camacho A, Depp CA, Herrera A, **Thompson WK**, Munoz R, Jeste DV, Ng B (2013). To What do Rural-dwelling Hispanics Attribute Depressive Symptoms? *Depression Research and Treatment* Article ID 781986.

(27) Chou H-H, Talledo JA, Lamb SN, **Thompson WK**, Swerdlow NR (2013). Amphetamine effects on MATRICS Consensus Cognitive Battery performance in healthy adults. *Psychopharmacology* 227, 165-176.

(26) Jeste DV, Savla GN, **Thompson WK**, Vahia IV, Glorioso, DK, Palmer BW, Golshan S, Kraemer HC, Depp CA (2013). Paradox of Aging: Study of Self-Rated Successful Aging in 1,006 Community-Dwelling Adults over Age 50. *Am J Psychiatry* 170, 188–196.

(25) O'Hara R, Marcus P, **Thompson WK**, Flournoy J, Vahia I, Lin X, Hallmayer J, Depp C, Jeste DV (2012) 5-HTTLPR Short allele is Associated with Poorer Self-Perceptions of Successful Aging in Older Adults. *Am J Ger Psychiatry* 20, 452-456.

(24) Vahia IV, **Thompson WK**, Depp CA, Allison M, Jeste DV (2012). Developing a Dimensional Model of Successful Aging. *International Psychogeriatrics* 24, *515-523*.

(23) **Thompson WK**, Charo L, Vahia I, Depp C, Allison M, Jeste D. (2011). Sexual Activity, Satisfaction, and Dysfunction in Older Post-Menopausal Women. *J Am Ger Soc*. 59, 1503-1508.

(22) Kavirajan H, Vahia IV, **Thompson WK**, Depp C, Allison M, Jeste DV (2011). Attitude toward own aging and mental health in post-menopausal women. *Asian journal of psychiatry* 4, 26-30.

(21) Savla GN, Twamley ET, **Thompson WK**, Delis, DC, Jeste DV, Palmer, BW (2011). Evaluation of specific executive functioning skills and the processes underlying executive control in schizophrenia. *Journal of the International Neuropsychological Society*, 17, 14-23.

(20) Vahia IV, Depp CA, Palmer BW, Fellows I, Golshan S, **Thompson WK**, Allison M, Jeste D. (2011). Correlates of Spirituality in Older Women. *Aging and Mental Health*, 15, 97-102.

(19) Horvitz-Lennon M, Zhou D, Normand S-L, **Thompson WK** (2011). Racial and Ethnic Service Use Disparities among Homeless Adults with Severe Mental Illnesses Receiving Intensive Case Management Services. *Psychiatric Services*; 62, 598-604.

(18) Thorp SR, Sones HM, Glorioso D, **Thompson WK**, Golshan S, Jeste DV. (2012) Older Patients with Schizophrenia: Does Military Veteran Status Matter? *American J Ger Psychiatry* **20**, 3, 248-256.

(17) Frank E, Cassano GB, Rucci P, **Thompson WK**, Kraemer HC , Fagiolini A, Maggi L, Kupfer DJ, Shear MK. Houck PR, Grochocinski VJ, Scocco P, Buttenfield J, Forgione RN (2011). Predictors and Moderators of Time to Remission of Major Depression with Interpersonal Psychotherapy and SSRI Pharmacotherapy. *Psychological Medicine*; 41, 151–162.

(16) Depp CA, Schkade D, **Thompson WK**, Jeste D (2010). Age, Affective Experience, and Television Use. *American Journal of Preventive Medicine*; 39(2)173–178.

(15) Vahia IV, Meeks TW, **Thompson WK**, Depp CA, Zisook S, Allison M, Judd LL, and Jeste DV. (2010) Subthreshold depression and successful aging in older women. *American Journal of Geriatric Psychiatry*, 18, 212-220.

(14) Fagiolini A, Frank E, Axelson DA, Birmaher B, Cheng Y, Curet DE, Friedman ES, Gildengers AG, Goldstein T, Grochocinski VG, Houck PR, Stofko MG, Thase ME, **Thompson WK**, Turkin SR, and Kupfer DJ. (2009). Enhancing outcomes in patients with bipolar disorder: results from the Bipolar Disorder Center for Pennsylvanians Study. *Bipolar Disorders*, 11, 4, 382-390.

(13) Horvitz-Lenon M, Frank RG, **Thompson WK** Baik SH, Alegria M, Rosenhack RA, Normand S-L. (2009). Investigation of racial and ethnic disparities in service utilization among homeless adults with severe mental illness. *Psychiatric Services*, **60**, 1032-1038.

(12) Franzen P, Buysse DJ, Dahl RE, **Thompson WK**, and Siegle GJ (2009). Sleep deprivation alters pupillary reactivity to emotional stimuli in healthy young adults. *Biological Psychology*, **80**, 3, 300-305.

(11) Frank E, Cassano GB, Rucci P, Fagiolini A, Maggi A, Kraemer HC, Kupfer DJ, Pollock B, Bies R, Nimgaonkar V, Pilkonis P, Shear MK, **Thompson WK**, Grochocinski

VJ, Scocco P, Buttenfield J, Forgione RN (2008). Addressing the challenges of a crossnational investigation: lessons from the Pittsburgh-Pisa study of treatment-relevant phenotypes of unipolar depression. *Clinical Trials*. 5, 253-261.

(10) Lenze SN, Cyranowski JM, **Thompson WK**, Anderson BA, and Frank E. (2008). Cumulative effects of nonsevere life events predict recurrence during maintenance treatment with IPT. *Journal of Consulting and Clinical Psychology* **76**, 6, 979-987.

(9) Buysse DJ, Germain A, Hall ML, Moul DE, Nofzinger EA, Begley A, Ehlers CL, **Thompson, WK**, Kupfer DJ. (2008). EEG Spectral Analysis in Primary Insomnia: NREM Period Effects and Sex Differences. *Sleep*, 31, 1673-1682.

(8) Monk TH, Begley AE, Billy BD, Mazumdar SA, Shear MK, **Thompson WK**, and Zarotney JR (2008). Sleep and circadian rhythms in spousally bereaved seniors. *Chronobiology International* 25, 1, 83-98.

(7) Soreca I, Fagiolini A, Frank E, Houck PR, **Thompson WK**, and Kupfer DJ (2008). Relationship of general medical burden, duration of illness, and age in patients with bipolar I disorder. *Journal of Psychiatric Research* 42, 11, 956-961.

(6) Frank E, Cassano GB, Rucci P, Fagiolini A, Maggi L, Kraemer HC, Kupfer DJ, Pollock B, Bies R, Nimgaonkar V, Pilkonis P, Shear MK, **Thompson WK**, Grochocinski VJ, Scocco P, Buttenfield J, and Forgione RN (2008). Addressing the challenges of a cross-national investigation: Lessons from the Pittsburgh-Pisa study of treatmentrelevant phenotypes of unipolar Depression. *Clinical Trials*, 5, 3, 253-261.

(5) Monk T, **Thompson WK**, Buysse DJ, Hall M, Nofzinger E, and Reynolds CF (2006). Sleep in healthy seniors: A diary study of the relationship between bedtime and the amount of sleep obtained. *Journal of Sleep Research*. 15, 3, 256-260.

(4) Hall M, Buysse DJ, Nofzinger EA, Reynolds CF, **Thompson WK**, Mazumdar S, and Monk TH. 2008. Financial strain is a significant correlate of sleep continuity disturbances in late-life. *Biol. Psychol.* 77, 217-222.

(3) Monk TH, Buysse DJ, Hall M, Mazumdar S, Nofzinger EA, Reynolds CF, and **Thompson WK**. 2006. Age-related differences in the lifestyle regularity of seniors experiencing bereavement, care-giving, insomnia and advancement into old-age. *Chronobiology International*, **23**, 4, 831-841.

(2) **Thompson WK**, Kupfer DJ, Fagiolini A, Scott JA, and Frank E (2006). Medical comorbidities in patients with bipolar I disorder: Prevalence and clinical correlates. *J Clin Psychiatry* 67, 5, 783-788.

(1) Frank E, Kupfer DJ, Thase ME, Mallinger AG, Swartz H, Fagiolini AM, Grochocinski V, Houck P, Scott J, **Thompson WK**, and Monk T (2005). Two year outcomes for the interpersonal and social rhythm therapy in individuals with bipolar I disorder. *Arch Gen Psychiatry* 62, 9, 996-1004.

Longitudinal and Functional Data Analysis

(18) Lin W, Donohue MC, Insel P, Schwartzman A, Thompson WK (In Preparation). Bayesian Multivariate Growth Mixture Modeling of Longitudinal Data: An Application to Alzheimer's Disease Study. *NeuroImage*.

(17) Ren J, Fan CC, **Thompson WK** (In Revision). Semi-parametric Bayesian model for semi-continuous longitudinal data. *Statistics in Medicine.*

(16) Jiang L, Elrod C, Kim JJ, Swafford AD, Knight R, **Thompson WK** (2021). Bayesian Multivariare Sparse Functional Principal Components Analysis with Application to Longitudinal Microbiome Multi-Omics Data. *Annals of Applied Statistics*.

(15) Li D, Iddi S, **Thompson WK**, Donohue M (2017). Bayesian latent time joint mixed effect models for multicohort longitudinal data.*SMMR*.

(14) Depp CA, **Thompson WK**, Frank E, Swartz H (2017). Prediction of Near-Term Increases in Suicidal Ideation in Recently Depressed Patients with Bipolar II Disorder Using Intensive Longitudinal Data. *Journal of Affective Disorders*.

(13) Depp CA, Torous J, **Thompson WK** (2016). A Conceptual Framework for Technology-Based Early Warning Systems for Bipolar Disorder. *JMIR Mental Health Frontiers in Psychiatry*.

(12) Choi J, Anderson SJ, Richards TJ and **Thompson WK** (2014). Prediction of transplant-free survival in idiopathic pulmonary fibrosis patients using joint models for event times and mixed multivariate longitudinal data. *J. of Applied Statistics*: 41, 2192-2205.

(11) **Thompson WK**, Gershon A, O'Hara R, Depp C (2014). The Prediction of Study-Emergent Suicidal Ideation in Bipolar Disorder: A Pilot Study Using Ecological Momentary Assessment Data. *Bipolar Disorders*: 16, 669-677.

(10) **Thompson WK**, Savla G, Vahia I, Depp C, O'Hara R, Jeste DV, Palmer B. (2013). Trajectories of Cognitive Functioning in Older Adults with Schizophrenia: Does Method Matter? *Schizophrenia Research*, 143: 90-96.

(9) Gershon A, **Thompson WK**, Eidelman P, McGlinchey E, Kaplan K, Harvey AG (2012). Restless Pillow, Ruffled Mind: Sleep and Affect Coupling in Inter-Episode Bipolar Disorder. *J. Abnormal Psychology* 21, 863-873.

(8) **Thompson WK**, Hallmayer J., O'Hara R (2011). Design Considerations for Characterizing Psychiatric Trajectories across the Lifespan. *Am J Psychiatry;* 9, 894-903.

(7) Silk J, Fobes EE, Whalen DJ, Jakubcak JL, **Thompson WK**, Ryan ND, Axelson DA, Birmaher B, Fahl RE (2011). Daily emotional and social dynamics in depressed youth: A cell-phone ecological momentary assessment study. *Journal of Experimental Child Psychology*; 110, 241-257.

(6) Rosen O and **Thompson WK** (2009). A Bayesian model for multivariate functional data. *Computational Statistics and Data Analysis*, **53**, 11, 3773-3786.

(5) Buysse DJ, **Thompson WK**, Scott J, Franzen PL, Germain A, Hall ML, Moul DE, and Kupfer DJ. 2007. Daytime symptoms in primary insomnia: A prospective analysis using ecological momentary assessment. *Sleep Medicine*. **8**, 3, 198-208.

(4) **Thompson WK** and Rosen O (2008). A Bayesian model for sparse functional data. *Biometrics*. 64, 54-63.

(3) **Thompson WK**, Wang H, Xie M, Kolassa J, Rajan M, Tseng CL, Crystal S, Zhang Q, Vardi Y, Pogach L, and Safford M (2005). Assessing quality of diabetes care by measuring longitudinal changes in hemoglobin A1c in the Veterans Health Administration. *Journal of Health Services Research.* **40**, 6, 1818-1835.

(2) **Thompson WK**, Xie M, White H (2003). Box-Tidwell and fractional polynomial transformations for longitudinal data. *Biostatistics*. **4**, 3, 353-364.

(1) White H, Xie M, **Thompson WK**, Stouthamer-Loeber R, Stouthamer-Loeber M (2001). Psychopathology as a predictor of adolescent drug use trajectories. *Psychology of Addictive Behaviors*. 15, 210-218.

Miscellaneous

(12) Song SJ, Wang J, Martino C, Jiang L, **Thompson WK**, Shenhav L, McDonald D, Marotz C, Harris PR, Hernandez CD, Henderson N, Ackley E, Nardella D, Gillihan C, Montacuti V, Schweizer W, Jay M, Combellick J, Sun H, Garcia-Mantrana I, Gil Raga F, Collado MC, Rivera-Viñas J, Campos-Rivera M, Ruiz-Calderon JF, Knight R, Dominguez-Bello M (2021). Naturalization of the microbiota developmental trajectory of Cesarean-born neonates after vaginal seeding. *Cell*.

(11) Ajmera V, **Thompson WK**, Smith DM, Malhotra A, Mehta RL, Tolia V, Yin J, Sriram K, Insel PA, Collier S, Richards L, Loomba R (2021). RAMIC: Design of a randomized, double-blind, placebo-controlled trial to evaluate the efficacy of ramipril in patients with COVID-19. *Contemporary Clinical Trials*.

(10) Bartsch H, **Thompson WK**, Jernigan T, Dale AM (2014). A web-portal for interactive data exploration, visualization and hypothesis testing. *Frontiers in Neuroinformatics*. doi: 10.3389/fninf.2014.00025.

(9) Herrera AP, Smith ML, Ory MG, Rodriguez HP, Warre R, **Thompson WK**, Azcue A, Romero JA (2011). The provision of diabetes-monitoring exams to older Latinos. *J Aging Health*;1075-100.

(8) Herrera AP, Meeks TW, Dawes S, Hernandez DM, **Thompson WK**, Sommerfeld DH, Allison M, Jeste DV (2011). Emotional and cognitive health correlates of leisure activities in older Latino and Caucasian women. *Psychology, Health, and Medicine* 16, 661-674.

(7) Safford M, Brimacombe M, Zhang QW, Rajan M, Xie M, **Thompson WK**, Kolassa J, Maney M, and Pogach L (2009). Patient complexity in quality comparisons for glycemic control: An observational study. *Implementation Science*, 4, 2.

(6) Stein BD, Kogan JN, Sorbero MJ, **Thompson WK**, and Hutchison SL (2007). Predictors of timely follow-up care among medicaid-enrolled adults after psychiatric hospitalization. *Psychiatric Services*, 58, 12, 1563-1569.

(5) Ogunyemi D and **Thompson WK** (2002). A case controlled study of serial transabdominal amnioinfusions in the management of second trimester oligohydramnios due to premature rupture of membranes. European Journal of Obstetrics, Gynecology, and Reproductive Biology 102,2,167-172.

(4) Thapar P, Zacny JP, **Thompson W**, Apfelbaum JL. (1995). Using alcohol as a standard to assess the degree of impairment induced by sedative and analgesic drugs used in ambulatory surgery. *Anesthesiology* 82, 1, 53-59.

(3) Zacny JP, Lichtor JL, Thapar P, Coalson DW, Flemming D, **Thompson W.** 1994. Comparing the subjective, psychomotor, and physiological effects of intravenous butorphanol and morphine in healthy volunteers. *J of Pharmacol and Exp Therap* 270, 2, 579-588. (2) Zacny JP, Lichtor JL, Flemming D, Coalson DW, **Thompson W**. 1994. A doseresponse analysis of the subjective psychomotor and physiological effects of intravenous morphine in healthy volunteers. *J of Pharmacol and Exp Therap* 268, 1, 1-9.

(1) Zacny JP, Lichtor JL, **Thompson W**, Appfelbaum JL. 1993. Propofol at a subanesthetic dose may have abuse potential in healthy volunteers. *Anesthesia and Analgesia* 77, 3, 544-552.

BOOK CHAPTERS

(5) **Thompson WK**, Bartsch H, Lindquist MA (2016). Structural Magnetic Resonance Imaging. In Ombao et al. (Eds.) Handbook of Neuroimaging Data Analysis. CRC Press.

(4) **Thompson WK**, Choi J, Anderson S (2013). Prediction Models. In Lavretsky et al. (Eds.) Late Life Mood Disorders. Oxford University Press: New York.

(3) Fennema-Notestine C, Panizzon MS, **Thompson WK**, Chen C-H, Eyler LT, Fischl B, Franz CE, Grant MD, Jak AJ, Jernigan TL, Lyons MJ, Neale MC, Seidman LJ, Tsuang MT, Xian H, Dale AM, & Kremen WS. (In Press). Presence of ApoE e4 allele associated with thinner frontal cortices in middle-age. In M Smith, G Perry, JW Ashford (Series Editors), and, JW Ashford, A Rosen, M Adamson, O Sabri, S Black, G Frisoni, C Jack & M Weiner (Eds.), Handbooks of Alzheimer's Disease - Volume 2 Imaging and the Alzheimer Brain: IOS Press.

(2) Hallmayer J, Hardan A, **Thompson WK**, O'Hara R (2010). Do the characteristics of ASC change across lifetime? In Autism Spectrum Conditions: Sven Bölte, PhD, & Joachim Hallmayer, MD, (Editors).

(1) Brown GG and **Thompson WK** (2010) Functional Brain Imaging in Schizophrenia: Selected Results and Methods, in Behavioral neurobiology of schizophrenia and its treatment. Neal R. Swerdlow, M.D., Ph.D. (Editor).

MISC

- Thompson WK and Stuart E, American Statistical Association Guidance on NIMH Grant Application Power Calculations (https://www.amstat.org/asa/files/pdfs/POL-NIMH_PowerCalculations.pdf)
- Quoted in Atlantic Monthly article: https://www.theatlantic.com/science/archive/2017/10/how-a-focus-on-richeducated-people-skews-brain-studies/544499/

GRANTS

Current Grant Support

• **R01 MH120025-01** (PIs: Fan and Thompson). "Data Exploration and Analysis Portal for Brain Research through Advanced Imaging Neuroscience"

- 1U24DA041123 (PI: Anders Dale). "ABCD-USA CONSORTIUM: DATA ANALY-SIS CENTER. Role on Project: Co-I, Associate Director in Charge of Biostatistics.
- **2U24AA021697** (PI: Pfefferbaum). NCANDA: DATA ANALYSIS COMPONENT. Role on Project: Subcontract PI in charge of consortium biostatistics.
- **1U24DA055330-01** (PI: Smyser). Healthy Brain and Child Development National Consortium Data Coordinating Center. Role on Project: Associate Director in Charge of consortium biostatistics.
- The Lundbeck Foundation PRECISION PSYCHIATRY INITIATIVE (PI: Benros). Denmark. Role: Subcontract PI.

Prior Grant Support

- The Lundbeck Initiative for Integrative Psychiatric Research (iPSYCH) (Pls: Preben Bo Mortensen, Thomas Werge, Ole Mors, Anders Børglum, Merete Nordentoft). Role on Project: Lead Scientist.
- **1R01GM104400** "Polygenicity, Pleiotropy, and Power: Novel Statistical Methods for Gene Discovery." Role on Project: Pl.
- 5R01MH100900 (PI: Hallmayer) Integrative Molecular and Phenotype Anaysis of 22q.11.2 Deletion Syndrome. Role on Project: Subcontract PI in charge of biostatistics.
- **1P30MH090333-02** (PI: Reynolds) 7/1/11-4/30/16 "ACISIR for Late-Life Depression Prevention." Role on Project: Site PI.
- **1R01 MH094151-01** (PI: Jeste) 5/1/12 4/29/17 "Accelerated Biological Aging in Schizophrenia." Role on Project: Co-Investigator.
- R01HD061414-03 (PI: Jernigan) 9/28/10-7/31/12 "Mapping Individual Cognitive Differences to Neural Variance and School Readiness." Role on Project: Co-Investigator.
- R01 MH099987-01 (PIs: Jeste and Moore) 01/09/13 12/31/17 "Multi-Dimensional Successful Aging Among HIV-Infected Adults" Role on Project: Co-Investigator.
- **R01 MH100417-01** (PI: Depp) 7/10/13-5/31/17 " Real-Time Mobile Cognitive Behavioral Intervention for Serious Mental Illness." Role on Project: Co-Investigator.
- R34MH093453-02 (PI: Swerdlow) 7/1/11-3/31/14 "Biomarker Strategies for Medication-Enhanced Cognitive Training in Schizophrenia." Role on Project: Co-Investigator.
- **R01MH092793-02** (PI: Kaye) 5/1/11-2/29/16 "Monoamine Contributions to Neurocircuitry in Eating." Role on Project: Co-Investigator.
- **5R01AG022381-09** (PI: Kremen) 9/15/03-8/31/1 "The VETSA Longitudinal MRI Twin Study of Aging." Role on Project: Co-Investigator.

- P30 MH080002-05 (PI: Jeste) 3/1/10 8/31/12 "Advanced Center for Innovation in Services and Interventions Research (in Older People with Psychoses)." Role on Project: PI R34 Project, Co-Investigator Research Methods Core.
- UL1RR031980-03 (PI: Firestein) 7/1/10 3/31/15 "Improved Inferences in Dynamic Causal Modeling of Observational Data: Application to Breast Cancer Chemotherapy, Cognition and Sleep" San Diego Clinical and Translational Research Institute, Pilot Grant. Role on Project: Pilot PI.
- **K25MH076981** (PI: Thompson). Primary Investigator. "Modeling Dynamic Variation of Brain Function, Health and Symptoms in Depression," NIMH Career Award. April 1, 2006-March 31, 2011.
- **NSFDMS-0806106** (PI: Thompson). Co-Primary Investigator. "Collaborative Research: Spectral and Connectivity Analysis of Non-Stationary Spatio-Temporal Data" August 15, 2008-August 15, 2010.
- **R01MH076981** (PI: GJ Siegle). Co-Investigator. "Functional Neuroanatomy of Recovery from Depression." April 1, 2006-March 21, 2011.
- **R21DA024144** (PI: J Silk). Co-Investigator. "Emotion Regulation in Adolescence: A Social Affective Neuroscience Approach." September 26, 2007-July 31, 2011.
- **R01AG13396** (PI: T Monk). Co-Investigator. "Phase Shift Tolerance in Older People." December 1, 2006-November 30, 2011.
- **P30MH030915** (PI: DJ Kupfer). Co-Investigator. "MHIRC for Mood and Anxiety Disorders: Treatment Development and Applications Core." May 15, 2001-No-vember 30, 2006.
- **P01AG020677** (PI: T Monk). Co-Investigator. "Aging Well, Sleeping Efficiently: Intervention Studies, Core C." June 1, 2003-May, 31, 2008.
- **R01AG031224-05** (PI: Dale). Co-Investigator "Structural & Metabolic Neuroimaging Biomakers in Early Alzheimer's Disease."

PROFESSIONAL ACTIVITIES

July 24 - 26, 2012	Co-PI and Co-Organizer Workshop on "Developing Novel Statistical Methods for NeuroImaging," San Diego, CA. Funded by the National Sciences Foundation, Division of Mathematical Sciences
2011 - 2012	Director of Biostatistics Training Advanced Fellowship Program in Mental Health Researc & Treatment (for all 23 sites nationwide), Veteran's Administration Mental Illness, Research, Education and Clinical Care (MIRECC) Training Program.
2008 - 2015	Director of Statistics Stein Institute for Research on Aging. University of California, San Diego

2008 - 2011 Affiliated Faculty

	Bipolar Career Development Institute Activities: Seminars and consultations.
2006	Statistical Mentor <i>Advanced Research Institute in Geriatric Mental Health</i> Activities: Provided statistical consultation and mentorship.
2004 - 2008	Undergraduate Advisor University of Pittsburgh, Department of Statistics Activities: Advise undergraduate statistics majors.

EDITORSHIPS

- 2014 current Consulting Editor *Neuropsychology*
- 2014 2018 Associate Editor Brain and Behavior

UNIVERSITY SERVICE

2010 - 2011	Psychiatry Department Faculty Representative Academic Senate University of California, San Diego
2011 - 2015	Member and Chair Transportation Policy Committee University of California, San Diego
2011 - 2015	Member Campus and Community Environment Committee University of California, San Diego
May 2012	Faculty Representative Hiring Committee for Director of Auxiliary Business Services. University of California, San Diego
2014 - 2015	Psychiatry Department Faculty Representative Academic Senate University of California, San Diego
2011 - present	Executive Committee Member Center for Human Development University of California, San Diego
2017-present	Founding Faculty, Halicioğlu Data Science Institute
2017-present	Executive Committee, Division of Biostatistics
2017-present	Faculty Search Committee, Division of Biostatistics
2018-present	Advisory Committee to the Chair, Family Medicine and Public Health

TEACHING AND MENTORSHIP

Courses

Spring 2017	FMPH 240 Biostatistics Rotations	
Spring 2017	FMPH 290 Biostatistics Journal Club & Seminar	
Fall 2017	FMPH 290 Biostatistics Journal Club & Seminar	
Jan 2008 - Apr 2008	Stat 3141 (Graduate Seminar) <i>Bayesian Modeling for Biomedical Data</i> University of Pittsburgh Department of Statistics	
Jan 2007 - Apr 2007	Stat 3141 (Graduate Seminar) <i>Generalized Additive Models</i> University of Pittsburgh Department of Statistics	
Jan 2006 - Apr 2006	Stat 1632 (Graduate Course) <i>Intermediate Mathematical Statistics</i> University of Pittsburgh Department of Statistics	
Sept 2005 - Dec 2005	5Stat 1631 (Graduate Course) <i>Intermediate Probability</i> University of Pittsburgh Department of Statistics	
Sept 2004 - Dec 2004	4Stat 1000 (Undergraduate Course) <i>Introduction to Statistics</i> University of Pittsburgh Department of Statistics	
Jan 2004 - Apr 2004	Stat 1632 (Graduate Course) <i>Intermediate Mathematical Statistics</i> University of Pittsburgh Department of Statistics	
Ph.D. Students (Primary Advisor)		
Nov 2020	Lingjing Jiang, PhD Ph.D. in Biostatistics University of California, San Diego	
Oct 2016	Rong Zablocki, Ph.D. Ph.D. in Computational Statistics San Diego State University	
Jul 2010	Dongli Zhou, Ph.D. Ph.D. in Statistics University of Pittsburgh	

Jun 2010 Seo-Hyon Baik, Ph.D.

Ph.D. in Statistics University of Pittsburgh

Ph.D. Students (Committee Member)

2017-present	Morten Dyddahl Krebs Copenhagen University
2018-present	Yiran Zhang Biostatistics University of California, San Diego
2018-present	Wenyi Lin Biostatistics University of California, San Diego
2018-present	Weiqi Zhao Cognitive Science University of California, San Diego
2018-2019	Lauren Curley Cognitive Science University of California, San Diego
2014-2015	Khalima Bolden Joint Doctoral Program in Clinical Psychology. SDSU and UCSD
Sept 2016	Andrew Schork, Ph.D. Cognitive Science University of California, San Diego
Oct 2014	Tim Mullen, Ph.D. Cognitive Science University of California, San Diego
Aug 2014	Thomas Quinlan, Ph.D. Joint Doctoral Program in Clinical Psychology SDSU and UCSD
Aug 2012	Jiin Choi, Ph.D. Biostatistics University of Pittsburgh
May 2008	Ghideon Ghebregiorgis, Ph.D. Statistics University of Pittsburgh
May 2008	Sangdae Han, Ph.D. Statistics University of Pittsburgh
Nov 2007	Kang Sun, Ph.D. Biostatistics University of Pittsburgh
Jun 2007	Ana-Maria Iosif, Ph.D.

	Statistics University of Pittsburgh
Jul 2006	Mark Gemalo, Ph.D. Statistics University of Pittsburgh
Apr 2006	Lulu Ren, Ph.D. Statistics University of Pittsburgh
Oct 2006	Shannon Lenz, Ph.D. Psychology University of Pittsburgh
Apr 2005	Jeongeun Kim, Ph.D. Statistics University of Pittsburgh

Invited Presentations and Seminars

July 30, 2018	"Issues and Advances in Power Calculations for Mental Health Studies". Joint Meeting of the American Statistical Association, Vancouver, CA. Organized session.
June 12, 2018	"Spatial gene-by-environment mapping for schizophrenia reveals locale of upbringing effects beyond urban-rural differences" Nordic Conference of Psychiatry, Reykjavik, Iceland.
May 28, 2018	"Population Lifetime Trajectories of Psychiatric Comorbidities" Pathway to Drugs Meeting, Copenhagen, Denmark.
May 12, 2018	"Multi-Block Models for Multivariate Neuropsychiatric Data" Society of Biological Psychiatry 73 rd Annual Meeting, New York, NY, USA. (Co-organizor of symposium)
May 8, 2018:	"Study Design and Neurodevelopmental Inferences". Flux Satellite Conference. Chapel Hill, North Carolina, USA.
Feb 26, 2018	Instructor. Winter School in Genetics, Reyjavik, Iceland.
January 24, 2018	"A Novel Bayesian Model for the Local False Discovery Rate". University of Minnesota Department of Biostatistics.
October 27, 2017	Instructor, NORBIS Short Course, Oslo, Norway.
July 29, 2017:	"Multi-Block Bayesian Models for Psychiatric and Brain Imaging Data". Joint Meeting of the American Statistical Association, Baltimore, MD, USA. (Invited Session Co-organizer)
August 3, 2016	"Recent Advances in Bayesian Modeling of Dependent Biomedical

പ്പyust 3, 2016 Data"

	Joint Statistical Meetings of the American Statistical Association, Chicago, IL, USA
August 3, 2016	"New Statistical Methods for the Analysis of High-Dimensional Biomarkers" Joint Statistical Meetings of the American Statistical Association, Chicago, IL, USA
November 29, 2016	"iPSYCH Study: Inflammation, Infections, and Psychiatric Diagnosis. Stanley Foundation, Johns Hopkins School of Public Health, Baltimore, MD, USA.
December 9, 2016	"Recent advances in statistical genetics" Session Organizer and Speaker, CMStatistics ERCIM, Sevilla, Spain.
October 13, 2017	"Novel Imaging Genetics Methods for the Adolescent Brain and Cognitive Development Study." World Congress of Psychiatric Genetics, Orlando, FL, USA.
August 3, 2016	"New Statistical Methods for the Analysis of High-Dimensional Biomarkers" Joint Statistical Meetings of the American Statistical Association Chicago, IL, USA
August 3, 2016	"Recent Advances in Bayesian Modeling of Dependent Biomedical Data" Joint Statistical Meetings of the American Statistical Association Chicago, IL, USA
June 20, 2015	"Novel Methods and Recent Results for Enrichment and Pleiotropy in GWAS" Symposium Chair and Speaker Annual Meeting of the Behavior Genetics Association San Diego, CA, USA
June 12, 2015	Statistical Genetics Workshop NORMENT University of Oslo, Oslo, Norway
October 15, 2014	"Beyond Bonferroni: Large Scale Inference for Complex Disorders" Symposium Organizer and Moderator World Congress of Psychiatric Genetics Copenhagen, Denmark
August 5, 2014	"Novel Methods for Improving Power in Psychiatric Genetics" Invited Talk, Mental Health Research Section Joint Statistical Meetings, American Statistical Association Boston, MA USA
May 26, 2014	Statistical Genetics Workshop NORMENT University of Oslo Oslo, Norway

May 5, 2014	"Estimating Trajectories with Multi-Cohort Longitudinal Data" Department of Biostatistics Columbia University New York, NY, USA
April 23, 2014:	"Beyond Bonferroni: Estimation of Effect Sizes for Polygenic Traits" Virginia Institute for Psychiatric and Behavioral Genetics Virginia Commonwealth University Richmond, VA, USA
March 18, 2014	"A Bayesian Model of Activation and Functional Connectivity for Event-Related fMRI" Meeting of the Eastern North American Region The International Biometrics Society Baltimore, MD, USA
October 28, 2013	"Two Novel Bayesian Models with Applications to Psychiatric Imaging and Genetics" Department of Biostatistics University of Florida Gainesville, FL, USA
August 20, 2013	"Covariate Modulated Local False Discovery Rate." Institute of Clinical Medicine University of Oslo Oslo, Norway
August 5, 2013	"A Bayesian Model for Activation and Functional Connectivity" Joint Statistical Meetings American Statistical Association Montreal, Canada
July 1, 2013	"Heritability, Genetic Annotations, and Local FDR: Methods for Imaging Genetics." Institute of Mathematical Statistics Chengdu, China
October 16, 2012	"Genetic Pleiotropy between Schizophrenia and Multiple Cardiovascular Disease Risk Factors." World Congress of Psychiatric Genetics Hamburg, Germany
October 15, 2012	"Pleiotropy and Power: Methods for Improving Gene Discovery in Psychiatric GWAS." World Congress of Psychiatric Genetics Hamburg, Germany
October 8, 2012	"Methods for Improving Gene Discovery in GWS", Department of Statistics University of California, Irvine Irvine, CA, USA
June 13, 2012	"Statistical Issues in Longitudinal MRI and Recommendations for Best Practice" Organization of Human Brain Mapping Beijing, China

June 8, 2012	"Enrichment and False Discovery Rate" University of Oslo, Oslo, Norway
April 4-5, 2012	"Causal Inference in Observational Data" Stanford University Stanford, CA, USA
July 30, 2011	"A Mixture Model for Multi-Subject Inference in Source-Localized EEG" Joint Statistical Meetings American Statistical Association Miami Beach, FL, USA
March 22, 2011	"A Bayesian Model for Functional Connectivity." Meeting of the Eastern North American Region International Biometrics Society Miami, Florida, USA
October 30, 2010	"Functional Connectivity Analysis of fMRI Data." Brown University Department of Biostatistics Providence, RI, USA
October 15-17, 2010	Faculty Mentor and Speaker. MIRECC Fellows' Conference. MIRECC Fellowship Program in Advanced Psychiatry and Psychology, Department of Veterans Affairs Office of Academic Affiliations Palo Alto, CA, USA
October 15, 2010	"Design and Analysis of Experiments" MIRECC Fellowship Program in Advanced Psychiatry and Psychology, Department of Veterans Affairs Palo Alto, CA
March 21, 2010	"Smoothing Spline ANOVA: The East Coast Traveling Subjects Study" Meeting of the Eastern North American Region International Biometrics Society New Orleans, LA, USA
November 7, 2009	"Accelerated Longitudinal Designs in Psychiatry" International College of Geriatric Psychoneuropharmacology Baltimore, MD, USA
September 24, 2010	"A Mixture Model for Source-Localized EEG." Department of Mathematics and Statistics University of Texas, El Paso El Paso, TX, USA
May 28, 2010:	"Smoothing-Spline ANOVA: East-Coast Traveling Subjects Study" fBIRN All-Hands Meeting Irvine, CA, USA
May 20, 2010	"Connectivity Analysis in Major Depressive Disorder Using

	Vector Autoregressive Models of Event-Related fMRI Data" Society for Biological Psychiatry New Orleans, LA, USA
May 5, 2010	"Propensity Scores" MIRECC Fellowship Program in Advanced Psychiatry and Psychology, Department of Veterans Affairs Palo Alto, CA, USA
June 2, 2009	"Adjusting for Multiple Comparisons" MIRECC Fellowship Program in Advanced Psychiatry and Psychology, Department of Veterans Affairs Palo Alto, CA, USA
Jun 2009	"Dynamic Analysis of Sleep-Wake EMA Data" J.Christian Gillin Invited Presentation Department of Psychiatry, University of California, San Diego La Jolla, CA, USA
Jun 2009	"Using fMRI Connectivity to Classify Treatment Responders" Classification Society Invited Talk St. Louis, MO, USA
Jun 2009	"SEM and Causal Inference: A Brief Introduction" MIRECC Fellowship Program in Advanced Psychiatry and Psychology, Department of Veterans Affairs Palo Alto, CA, USA
Apr 2009	"Discovering Structure with Network Analysis" Stein Institute for Aging Grand Rounds Department of Psychiatry University of California, San Diego La Jolla, CA, USA
Mar 2009	"Design and Analysis of Experiments" Bipolar Career Development Institute University of Pittsburgh Pittsburgh, PA, USA
Dec 2008	"Dynamic Analysis of Sleep-Wake EMA Data" Department of Psychology Columbia University New York, NY, USA
Aug 2008	"Effective Connectivity for fMRI." Joint Statistical Meetings American Statistical Association Denver, CO, USA
Feb 2007	"A Stimulus-Locked VAR Model for Effective Connectivity" RAND Corporation Pittsburgh, PA, USA
Sep 2007	"A VAR Model for Effective Connectivity in Slow Event-Related fMRI Designs" Department of Statistical Sciences

	Brown University Providence, RI, USA
Mar 2007	"How to Consult with a Statistician" Career Development Institute for Bipolar Disorder Pittsburgh, PA, USA
Mar 2007	"A Bayesian Model for Sparse Functional Data with Continuous or Discrete Covariates" Meeting of the Eastern North American Region International Biometrics Society Atlanta, GA, USA
Nov 2006	"Statistics in Brain Science" StatFest, University of Texas, El Paso El Paso, TX, USA
Jul 2006	"Ecological Momentary Assessment: Analysis of Multidimensional Longitudinal Data" Pittsburgh Mind Body Center Pittsburgh, PA, USA
Jun 2006	"Ecological Momentary Assessment: Analysis of Multidimensional Longitudinal Data" Mental Health Intervention Research Center Western Psychiatric Institute and Clinic Pittsburgh, PA, USA
Jan 2005	"A Bayesian Model for Sparse Functional Data." Department of Mathematics University of Texas El Paso El Paso, TX, USA

PROFESSIONAL SERVICE

Grant Reviews

Jun 2018	NIH Review Addiction Risks and Mechanisms Study Section
Feb 2018	NIH Review Addiction Risks and Mechanisms Study Section
May 2017	NIH Review Panel Interventions and Biomarkers Special Emphasis Panel
Feb 2017	NIH Review Panel Addiction Risks and Mechanisms Study Section
Sep 2016	NIH Review Panel Adult Maturational Changes and Dysfunctions in Emotion Regulation
July 2016	NIH Review Panel Environmental Influences on Child Health Outcomes

Feb 2016	NIH Review Panel Brain Research through Advancing Innovative Neurotechnologies Shortcourses in Computational Neuroscience
Jul 2015	NIH Review Panel Environmental Influence on Child Health Outcomes Program
June 2015	NIH Brain Panel Research through Advancing Innovative Neurotechnologies R25
Apr 2014	Peer Reviewer British Medical Research Council
May 2009	NIH Review Panel National Heart, Lung, and Blood Institute

Data Safety and Monitoring Boards

2017-present	DSMB Member R01AG055389: Evaluaton of Brain and Cognitive Changes in Older Adults with MCI Taking Lithium to Prevent Alzheimer Type Dementia (PI: A. Gildengers).
2017-present	DSMB Member R01MH100095: Reward Learning in Late-Life Suicidal Behavior (PI: A. Dombrovski).
2015-2017	DSMB Member R34MH097567: Remediation of HAND: Initial Efficacy, Real-World Relevance, and Mechanisms. (PI: T. Marcotte)
2013 - 2017	DSMB Member Treatment of Overweight Induced by Antipsychotic Medication in Young People with ASD (PI: E. Anagnostou)
2011 - 2016	DSMB Chair 5R34DA031058 : Personalized Text Message to Improve ART Adherence in HIV+ Methamphetamine Users (PI: D. Moore)
2012 - 2013	DSMB Member 5R01MH078924: Improving Depression Outcome by Adding CBT for Insomnia to Antidepressents (PI: R. Manber)
2008 - 2013	DSMB Member 5R01MH077676 : Stimulant and risperidone for youth with severe physical aggression (PI: O. Bukstein)
2008 - 2013	DSMB Member 5R01MH077907: Atomoxetine, placebo, and parent training in autism (PI: M. Aman).
2006 - 2010	DSMB Chair R34MH080696-01A1 : Treatment of Comorbid Insomnia in Military Veterans (PI: A. Germain)

Journal Referee

- American Journal of Geriatric Psychiatry
- Annals of Applied Statistics
- Annals of Neurology
- Bioinformatics
- Biological Psychiatry
- Biometrics
- Cognitive Therapy and Research
- Dementia and Geriatric Cognitive Disorders
- Journal of the American Statistical Association
- Journal of Clinical Psychiatry
- Journal of Clinical Sleep Medicine
- Journal of the International Neuropsychological Society
- Journal of Neurology
- Journal of Neuroscience Methods
- Journal of Statistical Computation and Simulation
- Neural Computation
- NeuroImage
- PLoS Computational Biology
- PLoS One
- PNAS
- Schizophrenia Bulletin
- Statistical Methods and Applications
- Statistics in Medicine
- Statistics and Probability Letters
- Proceedings of the National Academy of Sciences