722 W 168th Street, 6th floor New York, NY 10032 jeff.goldsmith@columbia.edu

Date of Preparation

July 2, 2018

Academic Appointments / Work Experience

06/2018-Present	Department of Biostatistics
	Mailman School of Public Health, Columbia University
	Associate Professor

06/2012 - 05/2018	Department of Biostatistics
	Mailman School of Public Health, Columbia University

Assistant Professor

01/2009-12/2010Department of Biostatistics

Bloomberg School of Public Health, Johns Hopkins University

Research Assistant (R01NS060910)

01/2008 - 12/2009Department of Biostatistics

Bloomberg School of Public Health, Johns Hopkins University

Research Assistant (U19 AI060614 and U19 AI082637)

Education

08/2007-05/2012 Johns Hopkins University

PhD in Biostatistics, May 2012

Thesis: Statistical Methods for Cross-sectional and Longitudinal Functional

Observations

Advisors: Ciprian Crainiceanu and Brian Caffo

08/2003 - 05/2007Dickinson College

BS in Mathematics, May 2007

Honors

06/2017	Tow Faculty Scholar
01/2016	Public Voices Fellow
10/2013	Calderone Junior Faculty Prize
05/2012	ASA Biometrics Section Travel Award
12/2011	Invited Paper in "Highlights of JCGS" Session at Interface
05/2011	Margaret Merrell Award for Outstanding Research by a Biostatistics Doc-
	toral Student
05/2011	School-wide Teaching Assistant Recognition Award
05/2011	Helen Abbey Award for Excellence in Teaching
03/2011	ENAR Distinguished Student Paper Award
05/2010	Jane and Steve Dykacz Award for Outstanding Paper in Medical Statistics
05/2009	Nominated for School-wide Teaching Assistant Recognition Award
08/2007 – 05/2012	Sommer Scholar
05/2007	James Fowler Rusling Prize
05/2007	Lance E. Kohlhaas Memorial Prize in Mathematics
05/2007	Phi Beta Kappa National Honor Society
05/2005	Pi Mu Epsilon Mathematics Honor Society
05/2004,05/2005	Caroline Hatton Clark Mathematics Scholarship
08/2003 – 05/2007	John Dickinson Scholar
05/2002	National Merit Scholar

Professional Organizations, Societies, and Service

GRANT REVIEW SERVICE

2016 NSF/NIH Initiative on Quantitative Approaches to Biomedical Big Data

(QuBBD)

Editorial Service

02/2017-Present Associate Editor, Biostatistics

12/2015-Present Associate Editor, Journal of the American Statistical Association (Applica-

tions and Case Studies)

08/2012–03/2015 Consulting Editor in Statistics, Journal of Cardiovascular Pharmacology

Referee Advances in Statistical Analysis, American Journal of Public Health, Annals

of Applied Statistics, Australian & New Zealand Journal of Statistics, Bioinformatics, Biometrics, Biometrika, Biostatistics, Chemometrics, Chemometrics and Intelligent Laboratory Systems, Computational Statistics and Data Analysis, CRC Press (Book review), Econometrics and Statistics, Electronic Journal of Statistics, IEEE/AMC Transactions on Computational Biology and Bioinformatics, International Journal of Biostatistics, Journal of the American Statistical Association, Journal of Computational and Graphical Statistics, Journal of Gerontology: Medical Sciences, Journal of Multivariate Analysis, Journal of the Royal Statistical Society (Series A, B & C), Journal of Statistical Computation and Simulation, Journal of Statistical Planning and Inference, Journal of Science and Medicine in Sport, Pediatric Obesity, PLOS One, R Journal, Scandinavian Journal of Statistics, Statistica Sinica, Statistical Modeling, Statistics in Medicine, WIREs Computational

Statistics.

Memberships and Positions

06/2018–05/2020 ENAR Nominations Committee

03/2017-03/2018 Associate Program Chair, ENAR 2018 Meeting

01/2017-Present Regional Advisory Board (Member), ENAR

10/2010-Present ENAR (Member) 08/2009-Present ASA (Member)

Departmental and University Committees

09/2016-Present Member, Student Recruitment Committee, Department of Biostatistics

■ Chair 09/2016–09/2017

09/2016-Present Member, Health Analytics Center Committee, Data Science Institute

08/2015-Present Member, Curriculum Committee, Department of Biostatistics

10/2014-06/2015 Co-Director, Global Research Analytics for Population Health (GRAPH),

Mailman School of Public Health

08/2014-Present Member, Faculty Recruitment Advisory Committee, Department of Bio-

statistics

■ Chair 09/2017–09/2018

08/2014-09/2016 Member, Research Advisory Committee, Department of Biostatistics

08/2014-05/2015 Co-Organizer, Levin Lecture Series, Department of Biostatistics

12/2012–Present Member, Doctoral Admissions Committee, Department of Biostatistics

Fellowship and Grant Support

PRESENT SUPPORT

07/2016-07/2021 R01 NS097423-01, NIH / NINDS (Goldsmith)

Functional data analytics for kinematic assessments of motor control

Principal Investigator \$1,229,375 (DC)

09/2015-05/2019 R01 AG049970, NIH / NIA (Lovasi)

Communities Designed to Support Cardiovascular Health for Older Adults

Co-Investigator Year 1: \$397,707

06/2015-06/2017 R21 EB018917, NIH / NIBIB (Goldsmith)

Generalized, multilevel functional response models applied to accelerometer

data

Principal Investigator Total: \$248,500 (DC)

09/2014-07/2019 R01 HL123407, NIH / NHLBI (Crainiceanu)

Statistical methods for biosignals with varying domains

Subcontract Principal Investigator

Years 1 and 2: Prime \$555,800, Subcontract \$94,500

09/2010-04/2020 K24 AG036778, NIH / NIA (Maurer)

Midcareer Mentoring Award for Patient Oriented Research In Geriatric Car-

diology

Co-Investigator

Total Project: \$291,775

11/1998-07/2019 P50 ES009600, NIH / NIEHS (Perera)

The Columbia Center for Children's Environmental Health

Co-Investigator

Current Year: \$723,269

PAST SUPPORT

09/2014-05/2016 R21 AG046703, NIH / NIA (Maurer)

Can Ventricular Assist Devices Reverse the Frailty Phenotype

Co-Investigator

Years 1 and 2: \$345,818

07/2014–07/2016 McDonnel Foundation (Kitago)

Augmenting spontaneous recovery with robotic arm therapy and non-

invasive brain stimulation

Co-Investigator Total: \$231,618

04/2012-04/2016 R01 NS078419, NIH / NINDS (Ottman)

Psychosocial Impact of Genetics in Epilepsy

Co-Investigator

Total Project: \$723,956

Teaching Experience and Responsibilities

Specific Courses

Fall 2017	Data Science I (76 enrolled students)
Spring 2016	Linear Regression Models (43 enrolled students)
Spring 2015	Linear Regression Models (55 enrolled students)
Summer 2015	Applied Regression II (6 enrolled students)
Spring 2014	Categorical Data Analysis (15 enrolled students)
Spring 2014	Linear Regression Models (34 enrolled students)
Spring 2013	Categorical Data Analysis (16 enrolled students)
Spring 2013	Linear Regression Models (17 enrolled students)

GENERAL TEACHING ACTIVITIES

GENERAL TENERIN	
Spring 2017	International Conference on Ambulatory Monitoring of Physical Activity Short Course ("Functional Data Analysis for Wearables: Methods and Applications")
Spring 2017	International Workshop on Advances in Functional Data Analysis Short
1 0	Course ("Variable Selection in Functional Regression")
Summer 2016	Grant Mentor, Columbia Summer Research Institute
Summer 2014	Grant Mentor, Columbia Summer Research Institute
Summer 2014	Undergraduate Mentor, Columbia Summer Institute for Training in Bio-
	statistics
Summer 2014	Undergraduate Mentor, Biostatistics Enrichment Summer Training Diversity
	Program
Spring 2014	ENAR Short Course (Functional Data Analysis: Techniques and Applica-
	tions)
Summer 2013	Grant Mentor, Columbia Summer Research Institute
08/2013-Present	Biostatistics Faculty Liason, Columbia University Biostatistics and Epidemi-
	ology Digital Education (CUBED) Master?s program
01/2013–Present	Co-founder and Director, Functional Data Analysis Working Group (FDAWG)

PhD Advises

2020 (Expected)	Julia Wrobel
2018 (Expected)	Daniel Backenroth
2018	Jihui Lee (First employment: Post Doctoral Researcher at Weill Cornell
	Department of Biostatistics)
2016	Yakuan Chen (First employment: Senior Inventive Scientist at AT&T Labs)

Master's Advises

2016	Yuexia Mei (Theory and Methods)
2016	Hanwei Yue (Theory and Methods)
2015	Xinyue Liu (Theory and Methods)
2015	Xiaoqi Lu (Theory and Methods)
2015	Yao Ma (Theory and Methods)
2015	Tianyi Sun (Theory and Methods)
2015	Julia Wrobel (Theory and Methods)
2014	Xinyu Hu (Theory and Methods)
2014	Zhi Pan (Theory and Methods)
2014	Guangwei Qui (Theory and Methods)
2014	Wenxi Tang (Theory and Methods)
2014	Madeline Vossbrinck (Theory and Methods)

DOCTORAL EXAMINATION, ADVISORY, AND DEFENSE COMMITTEES

2018	Javier Álvarez Liébana (Dissertation Reader)
2018	Elizabeth Gibson (Oral Examination)
2017	Sharifa Barracks (Oral Examination and Dissertation Defense)
2014	Tianle Chen (Dissertation Defense)
2014	Xiaochen Cai (Oral Examination and Dissertation Defense)
2013	Adam Ciarleglio (Dissertation Defense)

Publications

ORIGINAL, PEER REVIEWED ARTICLES

- Y. Chen[‡], **J. Goldsmith**, and T. Ogden (2018+). Functional data analysis of dynamic PET data. *Journal of the American Statistical Association*, accepted.
- Y. Chen[‡], **J. Goldsmith**, and T. Ogden (2018+). Nonlinear mixed-effects models for PET data. *Transactions on Biomedical Engineering*, accepted.
- D. Backenroth[‡], **J. Goldsmith**, M. D. Harran, J. C. Cortes, J. W. Krakauer, and T. Kitago (2018+). Modeling motor learning using heteroskedastic functional principal components analysis. *Journal of the American Statistical Association*, accepted.
- H. Rosenblum, A. Castano, J. Alvarez, **J. Goldsmith**, S. Helmke, M.S. Maurer (2018). TTR (Transthyretin) Stabilizers Are Associated With Improved Survival in Patients With TTR Cardiac Amyloidosis. *Circulation: Heart Failure*, **11** e004769.
- K. M. Diaz, D. J. Krupka, M. J. Chang, I. M. Kronish, N. Moise, **J. Goldsmith**, and J. E. Schwartz (2018). Wrist-based cut-points for moderate- and vigorous-intensity physical activity for the Actical accelerometer in adults. *Journal of Sports Sciences*, **36** 206-212.
- K. Diaz, J. Goldsmith, H. Greenlee, G. Strizich, Q. Qi, Y. Mossavar-Rahmani, D. Vidot,
 C. Buelnas, C. Brintz, T. Elfassy, L. Gallo, M. Daviglus, D. Sotres- Alvarez, and R. Kaplan

 $^{^{\}dagger}\ indicates\ equal\ contribution$

[‡] indicates graduate student under my supervision

(2017). Prolonged, uninterrupted sedentary behavior and glycemic biomarkers among US Hispanic/Latino adults *Circulation*, **136** 1362-1373.

- M. S. Maurer, E. Horn, A. Reyentovich, V. V. Dickson, S. Pinney, D. Goldwater, N. E. Goldstein, O. Jimenez, S. Teruya, J. Goldsmith, S. Helmke, M. Yuzefpolskaya, and G. R. Reeves (2017). Can a Left Ventricular Assist Devices in Advanced Systolic Heart Failure Improve or Reverse the Frailty Phenotype? *Journal of the American Geriatrics Society*, 65 2383-2390.
- J. C. Cortes[†], **J. Goldsmith**[†], M. Harran, J. Xu, N. Kim, A. R. Luft, P. Celnik, J. W. Krakauer, and T. Kitago (2017). A short and distinct time window for recovery of arm motor control after stroke revealed with a global measure of trajectory kinematics. *Neurorehabilitation and Neural Repair*, **31** 552-560.
- I. M. Kronish, K. M. Diaz, J. Goldsmith, N. Moise, and J. E. Schwartz (2017). Objectively measured adherence to physical activity guidelines after acute coronary syndrome. *Journal of the American College of Cardiology*, 9 1205-1207.
- J. Goldsmith and J. E. Schwartz (2017). Variable Selection in the Functional Linear Concurrent Model. *Statistics in Medicine*, **36** 2237-2250.
- A. L. Wong, **J. Goldsmith**, A. D. Forrence, A. M. Haith, and J. W. Krakauer (2017). Reaction times can reflect habits rather than computations. *eLife*, **6** e28075.
- P. Reiss, **J. Goldsmith**, H. Shang, and T. Ogden (2017). Methods for scalar-on-function regression. *International Statistical Review*, **85** 228-249.
- J. Gertheiss, **J. Goldsmith**, and A.-M. Staicu (2017). A note on modeling sparse exponential-family functional response curves. *Computational Statistics and Data Analysis*, **105** 46-52.
- A. Castano, M. Haq, D. Narotsky, J. Goldsmith, R. L. Weinberg, R. Morgenstern, T. Pozniakoff, F. L. Ruberg, E. J. Miller, J. L. Berk, A. Dispenzieri, M. Grogan, G. Johnson, S. Bokhari, and M. S. Maurer (2016). Multicenter Study of Planar Technetium Pyrophosphate Cardiac Imaging: Predicting Survival for Patients With ATTR Cardiac Amyloidosis JAMA Cardiology, 1 880-889.
- J. Goldsmith (2016). vbvs.concurrent: Fitting Methods for the Functional Linear Concurrent Model. The Journal of Open Source Software, 1.
- S. T. Sorge, D. C. Hesdorffer, J. C. Phelan, M. R. Winawer, S. Shostak, J. Goldsmith, W. K. Chung, and R. Ottman (2016). Genetic causal attribution and depression in multiplex epilepsy families. *Epilepsia*, 57 1643-1650.
- A. Wong, **J. Goldsmith**, and J. Krakauer (2016). A motor planning stage represents the shape of upcoming movement trajectories. *Journal of Neurophysiology*, **116** 296-305.
- J. Goldsmith, X. Liu[‡], J. S. Jacobson and A. Rundle (2016). New insights into activity patterns in children, found using functional data analyses. *Medicine & Science in Sports & Exercise*, 48 1723-1729.
- J. Wrobel[‡], S.-Y. Park, A.-M. Staicu, and **J. Goldsmith** (2016). Interactive Graphics for Functional Data Analyses. *Stat*, **5** 108-118. [Article selected as "Exemplar paper"]
- Y. Chen[‡], **J. Goldsmith**, and T. Ogden (2016). Variable Selection in Function-on-Scalar Regression. *Stat*, **5** 88-101.
- J. Goldsmith, T. Kitago (2016). Assessing Systematic Effects of Stroke on Motor Control using Hierarchical Function-on-Scalar Regression. *Journal of the Royal Statistical Society:* Series C, 65 215-236.

C. B. Caminiti, D. C. Hesdorffer, S. Shostak, J. Goldsmith, S. T. Sorge, M. R. Winawer, J. C. Phelan, W. K. Chung, and R. Ottman (2016). Parents? interest in genetic testing of their offspring in multiplex epilepsy families. *Epilepsia*, 57 279-287.

- K. M. Diaz, D. J Krupka, M. J. Chang, J. A. Schaffer, Y. Ma[‡], J. Goldsmith, J. E. Schwartz, K. W. Davidson (2016). Validation of the Fitbit One for physical activity measurement at an upper torso attachment site. *BMC Research Notes*, 9 213.
- T. Kitago[†], J. Goldsmith[†], M. Harran, L. Kane, J. Berard, S. Huang, S. Ryan, P. Mazzoni, J. Krakauer, and V. Huang (2015). Robotic therapy for chronic stroke: general recovery of impairment or improved task-specific skill? *Journal of Neurophysiology*, 114 1885-1894.
- J. Goldsmith, V. Zipunnikov, J. A. Schrack (2015). Generalized Multilevel Functional-on-Scalar Regression and Principal Component Analysis. *Biometrics*, **71** 344-353.
- M. Abdalla, J. Goldsmith, P. Muntner, K. M. Diaz, K. Reynolds, J. E. Schwartz, D. Shimbo, (2015). Is Isolated Nocturnal Hypertension a Reproducible Phenotype? *American Journal of Hypertension*, 29 33-38.
- U. B. Schambra, J. Goldsmith, H. M. Schambra, K. Nunleya, S. Harirforoosh, Y. Liu, S. S. Moy (2015). Low and moderate prenatal ethanol exposure of mice during gastrulation or neurulation delays neurobehavioral development. Neurotoxicology & Teratology, 51 1-11
- K. M. Diaz, D. J Krupka, M. J. Chang, J. Peacock, Y. Ma[‡], J. Goldsmith, J. E. Schwartz, K. W. Davidson (2015). Fitbit: An accurate and reliable device for wireless physical activity tracking. *International Journal of Cardiology*, **185** 138-140.
- C. Wang, S. Vine, A. Hsiao, A. Rundle, and J. Goldsmith (2015). Weight-Related Behaviors
 When Children are in School Versus on Summer Breaks: Does Income Matter? Journal of
 School Health, 85 458-466.
- M. Sabatello, J. Phelan, D. Hesdorffer, S. Shostak, J. Goldsmith, S. Sorge, M. Winawer, W. Chung, R. Ottman (2015). Genetic Causal Attribution of Epilepsy and its Implications for Felt Stigma. *Epilepsia*, 56 1542-1550.
- J. Goldsmith, L. Huang, C. M. Crainiceanu (2014). Smooth Scalar-on-Image Regression via Spatial Bayesian Variable Selection. *Journal of Computational and Graphical Statistics*, 23 46-64.
- J. Goldsmith, F. Scheipl (2014). Estimator Selection and Combination in Scalar-on-Function Regression. *Computational Statistics and Data Analysis*, **70** 362–372.
- J. A. Schrack, V. Zipunnikov, J. Goldsmith, J. Bai, E. M. Simonsick, C. M. Crainiceanu, L. Ferrucci (2014). Assessing the "Physical Cliff": Detailed Quantification of Aging and Physical Activity. Journal of Gerontology: Medical Sciences, 69 973-979. [Article selected as "Editor's Choice"]
- J. A. Schrack, V. Zipunnikov, J. Goldsmith, K. Bandeen-Roche, C. M. Crainiceanu, L. Ferrucci (2014). Estimating Energy Expenditure from Heart Rate in Older Adults: a Case for Calibration. *PLoS One*, 9 1-9.
- S. Vullaganti, J. Goldsmith, S. Teruya, J. Alvarez, S. Helmke, M. Maurer (2014). Cardiovascular effects of hemoglobin response in patients receiving epoetin alfa and oral iron in heart failure with a preserved ejection fraction. *Journal of Geriatric Cardiology*, 11 100-105.
- B. Swihart, J. Goldsmith, C. M. Crainiceanu (2014). Restricted Likelihood Ratio Tests for Functional Effects in the Functional Linear Model. *Technometrics*, 56 483-493.

J. O. Okeke, V. E. Tangel, S. T. Sorge, D. C. Hesdorffer, M. R. Winawer, J. Goldsmith, J. Phelan, W. Chung, S. Shostak, R. Ottman (2014). Genetic Testing Preferences in Families Containing Multiple Individuals with Epilepsy. *Epilepsia*, 55 1705-1713.

- N. Cyrille, J. Goldsmith, J. Alvarez, M. S. Maurer (2014). Prevalence and Prognostic Significance of Low QRS Voltage Among the Three Main Types of Cardiac Amyloid. American Journal of Cardiology, 114 1089-1093
- R. T. Shinohara, E. M. Sweeny, J. Goldsmith, N. Shiee, F. J. Mateen, P. A. Calabresi,
 S. Jarso, D. L. Pham, D. S. Reich, C. M. Crainiceanu (2014). Statistical Normalization
 Techniques for Magnetic Resonance Imaging. NeuroImage: Clinical, 6 9-19.
- J. Goldsmith, S. Greven, C. M. Crainiceanu (2013). Corrected Confidence Bands for Functional Data Using Principal Components. *Biometrics*, **69** 41–51.
- J. Gertheiss, J. Goldsmith, C. M. Crainiceanu, S. Greven (2013). Longitudinal Scalar-on-Functions Regression with Application to Tractography Data. *Biostatistics*, 14 447–461.
- H. Sørensen, J. Goldsmith, L. Sangalli (2013). An Introduction with Medical Applications to Functional Data Analysis. Statistics in Medicine, 32 5222-5240
- L. Huang, J. Goldsmith, P. T. Reiss, D. S. Reich, C. M. Crainiceanu (2013). Bayesian Scalar-on-Image Regression with Application to Association Between Intracranial DTI and Cognitive Outcomes. *NeuroImage*, 83 210–223.
- F. J. Leyva, R. P. Bakshi, E. J. Fuchs, L. Li, B. S. Caffo, **J. Goldsmith**, Y. Du, J. P. Leal, L. A. Lee, M. S. Torbenson, C. W. Hendrix (2013). Iso-osmolar enemas demonstrate preferential gastrointestinal distribution, safety, and acceptability compared with hyper- and hypo-osmolar enemas as a potential delivery vehicle for rectal microbicides. *AIDS Research and Human Retroviruses*, **29** 1487–1495.
- T. Shinohara, J. Goldsmith, F. Mateen, D. S. Reich, C. M. Crainiceanu (2012). Predicting Breakdown of the Blood-Brain Barrier in Multiple Sclerosis without Contrast Agents. *American Journal of Neuroradiology*, **33** 1586–1590.
- J. Goldsmith, C. M. Crainiceanu, B. S. Caffo, D. S. Reich (2012). Longitudinal Penalized Functional Regression for Cognitive Outcomes on Neuronal Tract Measurements. *Journal of the Royal Statistical Society: Series C*, 61 453–469.
- J. Bai, **J. Goldsmith**, B. S. Caffo, T. Glass, C. M. Crainiceanu (2012). Movelets: A Dictionary of Movement. *Electronic Journal of Statistics*, **6** 559–578.
- N. Louissaint, S. Nimmagadda, E. Fuchs, R. Bakshi, Y. Cao, L. Lee, J. Goldsmith, B. S. Caffo, Y. Du, K. King, F. Menendez, M. Torbenson, R. Wahl, C. W. Hendrix (2012). Distribution of Cell-free and Cell-associated HIV Surrogates in the Colon Following Simulated Receptive Anal Intercourse in Men Who Have Sex With Men. Journal of Acquired Immune Deficiency Syndromes, Basic and Translational Science, 59(1) 10–17.
- N. Louissaint, S. Nimmagadda, R. Bakshi, Y. Du, K. Macura, K. King, R. Wahl, J. Goldsmith, B. S. Caffo, Y.-J. Cao, J. Anderson, E. Fuchs, C. W. Hendrix. Distribution of Cell-free and Cell-associated HIV Surrogates in the Female Genital Tract following Simulated Vaginal Intercourse (2012). Journal of Infectious Diseases, 205(5) 725–732.
- J. Goldsmith, B. S. Caffo, C. M. Crainiceanu, Y. Du, D. S. Reich, C. W. Hendrix (2011). Non-linear Tube Fitting for the Analysis of Anatomical and Functional Structures. *Annals of Applied Statistics*, 5 337–363.

• J. Goldsmith, J. Bobb, C. M. Crainiceanu, B. S. Caffo, D. S. Reich (2011). Penalized Functional Regression. *Journal of Computational and Graphical Statistics*, **20** 830–851.

- J. Goldsmith, C. M. Crainiceanu, B. S. Caffo, D. S. Reich (2011). Penalized Functional Regression Analysis of White-Matter Tract Profiles in Multiple Sclerosis. *NeuroImage*, 57 431–439.
- J. Goldsmith, M. P. Wand, C. M. Crainiceanu (2011). Functional Regression via Variational Bayes. *Electronic Journal of Statistics*, **5** 572–602.
- C. M. Crainiceanu, **J. Goldsmith** (2010). Bayesian Functional Data Analysis Using Win-BUGS. *Journal of Statistical Software*, **32** 1–33.
- J. Goldsmith, L. Koss (2009). Dynamical properties of the derivative of the Weierstrass elliptic function. *Involve*, 2 267-288.

REVIEWS AND EDITORIALS

- P. T. Reiss and J. Goldsmith, (2017). Discussion of "Fast Approximate Inference for Arbitrarily Large Semiparametric Regression Models via Message Passing" by M. P. Wand. Journal of the American Statistical Association, 112 161-164.
- G. Lovasi, J. Goldsmith, (2014). Invited commentary: Taking advantage of time-varying neighborhood environments. American Journal of Epidemiology, 180 462-466
- J. Goldsmith, (2014). Review of "Analysis of Variance for Functional Data" by J-T Zhang. Journal of the American Statistical Association, 109 449.

Software

- J. Goldsmith, F. Scheipl, L. Huang, J. Wrobel, J. Gellar, J. Harezlak, M. W. McLean, B. Swihart, L. Xiao, C. Crainiceanu and P. T. Reiss (2016). refund: Regression with Functional Data. R package version 0.1-16, available on CRAN.
- J. Wrobel and J. Goldsmith, (2015). refund.shiny: Interactive plotting for functional data analyses. R package version 0.1, available on CRAN.

Presentations

- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." Conference on Statistical Learning and Data Science, New York, *invited.* (06/2018)
- "Functional Data Analysis for High Dimensional Data." Rockefeller University. (05/2018)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." Department of Biotatistics, Emory. (04/2018)
- "Matrix Factorization Approaches to Analysis of Functional Count Data." ENAR 2018, Atlanta, invited. (3/2018)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." CMStatistics 2017, London, invited. (12/2017)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." Department of Statistics, Pennsylvania State University. (09/2017)

• "New insights into activity patterns in children, found using functional data analyses." JSM 2017, Baltimore, topic contributed. (08/2017)

- \blacksquare Discussion on "Recent developments for functional data exploration." ISI WSC 2017, Marrakech. (07/2017)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." ISI WSC 2017, Marrakech, invited. (07/2017)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." SIS 2017, Florence, *invited*. (06/2017)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." International Workshop on Functional and Operatorial Statistics, Coruna, Spain, invited. (06/2017)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." Division of Biostatistics & Epidemiology, Weill Cornell Medicine. (04/2017)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." International Workshop on Advances in Functional Data Analysis, Madrid, Spain, plenary presentation. (03/2017)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." ENAR 2017, Washington DC, topic contributed. (03/2017)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." Department of Statistics, Columbia University. (02/2017)
- "New insights into activity patterns in children, found using functional data analyses."
 Department of Epidemiology and Population Health, Albert Einstein College of Medicine. (02/2017)
- "Modeling Motor Learning Using Heteroskedastic Functional Principal Components Analysis." ERCIM, Sevilla, invited. (12/2016)
- "Variable Selection for the Concurrent Functional Linear Model." CRoNoS Workshop on FDA, Oviedo, Spain, *invited*. (08/2016)
- "Variable Selection for the Concurrent Functional Linear Model." JSM, Chicago, topic contributed. (08/2016)
- Discussion on "Statistical Analysis of Wearable Sensor Data To Understand Human Movement and Activity.", IBC, Victoria, British Columbia, invited. (06/2016)
- "Variable Selection for the Concurrent Functional Linear Model." ICSA, Atlanta, *invited*. (06/2016)
- "Kinematic data in motor control experiments." ENAR 2016, Austin, invited. (03/2016)
- "Kinematic data in motor control experiments." Department of Biostatistics, University of Texas Health Science Center at Houston. (02/2016)
- "Variable Selection for the Concurrent Functional Linear Model." ERCIM, London, invited. (12/2015)
- "Generalized Multilevel Functional-on-Scalar Regression and PCA." Department of Bioinformatics, Columbia University. (12/2015)
- "Kinematic data in motor control experiments." Department of Biostatistics, University of Washington. (10/2015)

 "Generalized Multilevel Functional-on-Scalar Regression and PCA + Visualization." JSM 2015, Seattle. (07/2015)

- "Kinematic data in motor control experiments + Visualization." ISI WSC 2015, Rio de Janiero. (07/2015)
- "Generalized Multilevel Functional-on-Scalar Regression and PCA + Visualization." ISI WSC 2015, Rio de Janiero. (07/2015)
- "Generalized Multilevel Functional-on-Scalar Regression and PCA + Visualization." BIRS Workshop, Banff. (07/2015)
- "Generalized Multilevel Functional-on-Scalar Regression and PCA." ENAR 2015, Miami, invited. (03/2015)
- "Generalized Multilevel Functional-on-Scalar Regression and PCA." ERCIM, Pisa, *invited*. (12/2014)
- "Using Functional Data Methods to Assess Covariate Effects on Daily Activity Patterns."
 Gerontological Society of America Annual Meeting, Washington DC. invited symposium. (11/2014)
- "Generalized Multilevel Functional-on-Scalar Regression and PCA." Department of Biostatistics, University of Minnesota. (09/2014)
- "Smooth Scalar-on-Image Regression via Spatial Bayesian Variable Selection.". JSM 2014, Boston, topic contributed. (08/2014)
- "Generalized Multilevel Functional-on-Scalar Regression and Principal Component Analysis."
 Department of Statistics, University of Pennsylvania. (04/2014)
- "Assessing Systematic Effects of Stroke on Motor Control using Hierarchical Function-on-Scalar Regression." Department of Statistics, Columbia University. (03/2014)
- "Assessing Systematic Effects of Stroke on Motor Control using Hierarchical Function-on-Scalar Regression." ENAR 2014, Baltimore, invited. (03/2014)
- "Corrected Confidence Intervals for Functional Data Using Principal Components." ERCIM, London, invited. (12/2013)
- "Assessing Systematic Effects of Stroke on Motor Control using Hierarchical Function-on-Scalar Regression." ERCIM, London, invited. (12/2013)
- "Bayesian Penalized Function-on-Scalar Regression for Longitudinal Accelerometry Data."
 Division of Biostatistics in the Department of Psychiatry, Columbia University. (09/2013)
- "Assessing Systematic Effects of Stroke on Motor Control using Hierarchical Function-on-Scalar Regression." Department of Biostatistics, Johns Hopkins University. (09/2013)
- "Assessing Systematic Effects of Stroke on Motor Control using Hierarchical Function-on-Scalar Regression." Department of Statistics, Seoul National University. (08/2013)
- "Estimating Energy Expenditure from Heart Rate and Activity Counts: a Bayesian Approach." IASC Seoul, South Korea, *invited*. (08/2013)
- "Assessing Systematic Effects of Stroke on Motor Control using Hierarchical Function-on-Scalar Regression." JSM, Montreal, *Topic Contributed*. (08/2013)
- "Estimating Energy Expenditure from Heart Rate and Activity Counts: a Bayesian Approach." ICAMPAM, Amherst, MA, *invited*. (06/2013)

 "Bayesian Penalized Function-on-Scalar Regression for Longitudinal Accelerometry Data." SRCOS, Nashville, TN, invited. (06/2013)

- "Smooth Scalar-on-Image Regression." University of Miami Spatial Statistics Conference, Miami, FL, invited. (12/2012)
- "Longitudinal Penalized Functional Regression." Annual Conference of the German and Austrian Statistical Associations, Vienna, Austria, invited. (09/2012)
- "A Modular Approach to Functional Regression". Annual Conference of the International Society for Clinical Biostatistics, Bergen, Norway, *invited*. (08/2012)
- "Fast Joint Functional Regression Modeling via Variational Bayes". JSM 2012, San Diego, invited. (07/2012)
- "Corrected Confidence Intervals for Functional Data Using Principal Components". JSM 2012, San Diego, topic contributed. (07/2012)
- "Movelets: A Dictionary of Movement". Interface 2012, invited. (05/2012)
- "Corrected Confidence Intervals for Functional Data Using Principal Components". ENAR 2012, Washington DC, contributed. (04/2012)
- "Longitudinal Penalized Functional Regression". JSM 2011, Miami, contributed. (08/2011)
- "Cross-Sectional and Longitudinal Penalized Functional Regression". Ludwig-Maximillians-University, *invited*. (06/2011)
- "Cross-Sectional and Longitudinal Penalized Functional Regression". Interface 2011, invited by Editor of JCGS. (06/2011)
- "Longitudinal Penalized Functional Regression". ENAR 2011, Miami, invited. (03/2011)
- "Non-linear Tube-fitting and Penalized Functional Regression in Diffusion Tensor Imaging". National Institutes of Health, Translational Neuroradiology Unit, *invited*. (03/2011)
- "Penalized Functional Regression". Joint Statistical Meetings 2010, Vancouver, topic contributed. (08/2010)
- "Penalized Functional Regression". University of Wollongong, Australia, invited. (06/2010)
- "Medical Imaging and Biostatistics". Dickinson College, Department of Mathematics and Computer Science, invited. (04/2010)