

CONTACT INFORMATION	Stanford University School of Medicine Department of Epidemiology 1701 Page Mill Road, Palo Alto, CA 94304	Email: dayoonk@stanford.edu Phone: 310-795-2217
EDUCATION	Ph.D. Epidemiology, University of California, Los Angeles M.P.H. Epidemiology, New York University B.S. Biology <i>with Honors</i> , Purdue University	06/2025 05/2018 05/2016
PUBLICATIONS	<ol style="list-style-type: none"> 1. Kwon D, Bozack AK, Ferreccio C, McCormick N, Steinmaus CM, de la Rosa R, Cardenas A. Arsenic exposure at birth, socioeconomic status, and epigenetic aging among adults in northern Chile. <i>Environmental Research</i>. 2026;299:124377. 2. Zhang K, Paul KC, Jacobs JP, Lin Y, Kwon D, Nianogo R, Bronstein JM, Keener AM, Yu Y, Folle AD, Jones DP, Ritz B. Integration of the serum metabolome and gut microbiome underscores the importance of altered lipid metabolism and potential immune modulation in Parkinson's Disease. <i>Brain Disorders</i>. 2026;21:100310. 3. Fox MM, Bramen JE, Kwon D, Espeland MA, Sun Y, Zhang L, Shadyab AH, Casanova R, Manson JE, Chang MY, Porter VR, Farland LV, Xiao Q, Wild RA, Siddarth P, Crandall CJ. Pregnancy and breastfeeding are associated with less later-life cognitive decline in a longitudinal, prospective cohort. <i>Alzheimers & Dementia</i>. 2026;22(1):e71072. 4. Kwon D, Fessler DMT, Knorr DA, Wiley KS, Sartori J, Coall DA, Fox MM. Of scents and cytokines: How olfactory and food aversions relate to nausea and immunomodulation in early pregnancy. <i>Evolution, Medicine, and Public Health</i>. 2025;13(1):269-280. 5. Kwon D, Paul KC, Kusters C, Wu J, Bronstein JM, Lill CM, Ketzler M, Raaschou-Nielsen O, Hansen J, Ritz B. Interaction Between Traffic-Related Air Pollution and Parkinson Disease Polygenic Risk Score. <i>JAMA Network Open</i>. 2025;8(3):e250854. 6. Kwon D, Paul KC, O'Sharkey K, Paik SA, Yu Y, Bronstein JM, Ritz B. Challenges in studying air pollution to neurodegenerative diseases. <i>Environmental Research</i>. 2025;278:121597. 7. Ying K, Paulson S, Eames A, Tyshkovskiy A, Li S, Eynon N, Jacques M, Grolaux R, Seale K, Jacques E, Goeminne LJE, Cipriano A, Perez-Guevara M, Emamifar M, Casas Martínez M, Kwon D, Kosheleva A, Snyder M, Gobel D, Herzog C, McCartney DL, Marioni RE, Lasky-Su J, Poganik JR, Moqri M, Gladyshev VN. A unified framework for systematic curation and evaluation of aging biomarkers. <i>Nature Aging</i>. 2025;5(11):2323-2339. 8. Wiley KS, Martínez LE, Kwon D, Knorr DA, Epeldegui M, Fox MM. Knorr DA, Fox MM. Regulatory B-Cells Are Associated Negatively With Regulatory T-Cells and Positively With Cytokines in Peripheral Blood of Pregnant Women. <i>American Journal of Reproductive Immunology</i>. 2025;93(2):e70027. 9. Fox MM, Hassan A, Wiley KS, Kwon D, Knorr DA. Regulatory T-Cells During Pregnancy Relate to Women's Own Childhood History of Microbial Exposure. <i>American Journal of Human Biology</i>. 2025;37(3):e70013. 10. Cardoso BR, Liu J, Machado P, Kwon D, Belsky DW, Martinez Steele E. Association between ultra-processed food intake and biological ageing in US adults: findings from National Health and Nutrition Examination Survey (NHANES) 2003-2010. <i>Age and Ageing</i>. 2024;53(12). 11. Kwon D, Zhang K, Paul KC, Folle AD, Del Rosario I, Jacobs JP, Keener AM, Bronstein JM, Ritz B. Diet and the gut microbiome in patients with Parkinson's disease. <i>npj Parkinson's Disease</i>. 2024;10(1):89. 12. Wiley KS, Kwon D, Knorr DA, Fox MM. Knorr DA, Fox MM. Regulatory T-cell phenotypes in prenatal psychological distress. <i>Brain, Behavior, and Immunity</i>. 2024;116:62-69. 	

13. **Kwon D**, Paul KC, Yu Y, Zhang K, Folle AD, Wu J, Bronstein JM, Ritz B. Traffic-related air pollution and Parkinson’s disease in central California. *Environmental Research*. 2024;240(Pt 1):117434.
14. **Kwon D**, Knorr DA, Wiley KS, Young SL, Fox MM. Association of pica with cortisol and inflammation among Latina pregnant women. *American Journal of Human Biology*. 2024;36(5):e24025.
15. Boen CE, Yang YC, Aiello AE, Dennis AC, Mullan Harris K, **Kwon D**, Belsky DW. Patterns and Life Course Determinants of Black-White Disparities in Biological Age Acceleration: A Decomposition Analysis. *Demography*. 2023;60(6):1815-1841.
16. Fox MM, Knorr DA, **Kwon D**, Wiley KS, Parrish MH. How prenatal cortisol levels relate to grandmother-mother relationships among a cohort of Latina women. *American Journal of Human Biology*. 2023;35(7):e23883.
17. **Kwon D**, Folle AD, Del Rosario I, Zhang K, Paul KC, Keener AM, Bronstein JM, Ritz B. Diet quality and Parkinson’s disease: Potential strategies for non-motor symptom management. *Parkinsonism & Related Disorders*. 2023;115:105816.
18. Belsky DW, Caspi A, Corcoran DL, Sugden K, Poulton R, Arseneault L, Baccarelli A, Chamarti K, Gao X, Hannon E, Harrington HL, Houts R, Kothari M, **Kwon D**, Mill J, Schwartz J, Vokonas P, Wang C, Williams BS, Moffitt TE. DunedinPACE, a DNA methylation biomarker of the pace of aging. *Elife*. 2022;11:e73420.
19. Erdenetuya B, **Kwon D**, Choi S, Choe SA. Alcohol use during pregnancy: findings from a gender-based violence survey in Mongolia. *Archives of Women’s Mental Health*. 2022;25(4):789-795.
20. Graf GH, Crowe CL, Kothari M, **Kwon D**, Manly JJ, Turney IC, Valeri L, Belsky DW. Testing Black-White Disparities in Biological Aging Among Older Adults in the United States: Analysis of DNA-Methylation and Blood-Chemistry Methods. *American Journal of Epidemiology*. 2022;191(4):613-625.
21. Graf GH, Zhang Y, Domingue BW, Harris KM, Kothari M, **Kwon D**, Muennig P, Belsky DW. Social mobility and biological aging among older adults in the United States. *PNAS Nexus*. 2022;1(2):pgac029.
22. **Kwon D**, Choe YJ, Kim SY, Chun BC, Choe SA. Ambient Air Pollution and Kawasaki Disease in Korean Children: A Study of the National Health Insurance Claim Data. *Journal of the American Heart Association*. 2022;11(9):e024092.
23. Graf GH, Li X, **Kwon D**, Belsky DW, Widom CS. Biological aging in maltreated children followed up into middle adulthood. *Psychoneuroendocrinology*. 2022;143:105848.
24. **Kwon D**, Belsky DW. A toolkit for quantification of biological age from blood chemistry and organ function test data: BioAge. *Geroscience*. 2021;43(6):2795-2808.
25. Crowe CL, Domingue BW, Graf GH, Keyes KM, **Kwon D**, Belsky DW. Associations of Loneliness and Social Isolation With Health Span and Life Span in the U.S. Health and Retirement Study. *Journals of Gerontology: Series A*. 2021;76(11):1997-2006.
26. Belsky DW, Caspi A, Arseneault L, Baccarelli A, Corcoran DL, Gao X, Hannon E, Harrington HL, Rasmussen LJH, Houts R, Huffman K, Kraus WE, **Kwon D**, Mill J, Pieper CF, Prinz JA, Poulton R, Schwartz J, Sugden K, Vokonas P, Williams BS, Moffitt TE. Quantification of the pace of biological aging in humans through a blood test, the DunedinPoAm DNA methylation algorithm. *Elife*. 2020;9:e54870.

WORKING PAPERS

27. **Kwon D**, Shao K, Paul KC, O’Sharkey K, Yu Y, Su J, Bronstein JM, Ritz B. Traffic-related air toxics and Parkinson’s disease in California’s Central Valley. *Submitted*.

28. **Kwon D**, Paul KC, Lin Y, Thordarson D, Wu J, Su J, Jones DP, Bronstein JM, Ritz B. Untargeted serum metabolomics and air pollution in Parkinson's disease. *Submitted*.
29. Klingler MC, **Kwon D**, Knorr DA, Wiley KS, Non AL, Fox MM. Social relationships, psychological distress, and maternal immune function during pregnancy. *Submitted*.
30. **Kwon D**, Paul KC, Folle AD, Wu J, Su J, Keener AM, Bronstein JM, Ritz B. Traffic-related air pollution and Parkinson's disease progression in central California. *In Preparation*.

RESEARCH POSITIONS	Postdoctoral Scholar for Dr. Andres Cardenas Department of Epidemiology, Stanford University	07/2025–
	Research Assistant for Dr. Beate Ritz Department of Epidemiology, UCLA	09/2022–06/2025
	Research Assistant for Dr. Molly Fox Department of Anthropology, UCLA	02/2022–06/2025
	Research Assistant for Dr. Seung-Ah Choe Department of Preventive Medicine, Korea University	05/2021–08/2021
	Project Coordinator for Dr. Daniel Belsky Department of Epidemiology, Columbia University	07/2019–06/2020
	Research Assistant for Dr. Jiyoung Ahn Department of Population Health, NYU	07/2018–06/2019
	Research Assistant for Dr. Elodie Ghedin Center for Genomics & Systems Biology, NYU	09/2016–05/2018
	Research Assistant for Dr. Daniel Suter Department of Biological Sciences, Purdue University	08/2014–05/2016
	Research Assistant for Dr. Chan Hee Chae Department of Veterinary Pathology, Seoul National University	05/2014–08/2014
AWARDS, HONORS, & FELLOWSHIPS	Notable Korean Scientists, Biological Research Information Center	03/2025
	Outstanding Publication Award Honorable Mention, <i>Geroscience</i>	06/2024
	Departmental Fellowship, UCLA	09/2022–06/2024
	Teaching Apprentice Service Award, UCLA	01/2023–03/2023
	Graduate Global Public Health Scholarship, NYU	08/2016–05/2018
	Honors Research in Biology, Purdue University	08/2014–05/2016
	Conference Travel Awards: UCLA Department of Epidemiology 05/2023, 05/2024; UCLA Graduate Division 05/2023; International Society of Environmental Epidemiology (ISEE) North America Chapter (NAC) 05/2023	
PRESENTATIONS	CONFERENCE PRESENTATIONS (*PRESENTED BY CO-AUTHOR)	
	ISEE, Atlanta, GA	08/2025
	ISEE, Santiago, Chile	08/2024
	ISEE*, Kaohsiung, Taiwan	09/2023
	International Society for Evolution, Medicine & Public Health, Irvine, CA	08/2023
	World Parkinson Congress*, Barcelona, Spain	07/2023
	ISEE NAC, Corvallis, OR	06/2023
	Human Biology Association, Reno, NV	04/2023
	INVITED SEMINARS	
	Korea University, Center for Fine Particulate Matter Research, Seoul, Korea	05/2025
	Sookmyung Women's University, College of Pharmacy, Seoul, Korea	05/2025

PROFESSIONAL SERVICE	AD HOC JOURNAL REVIEWER (*CO-REVIEWED WITH ADVISOR) <i>Neurology*</i> 06/2024; <i>JAMA Neurology*</i> 10/2022	
TEACHING EXPERIENCE	Teaching Assistant, UCLA EPIDEM 200B “Epidemiology Methods II: Prediction and Validity” (Ph.D. course)	01/2023–03/2023
INDUSTRY EXPERIENCE	Project Manager, Global Real-World Evidence Johnson & Johnson, Raritan, New Jersey	08/2024–04/2025
	Intern, Sales & Marketing Zoetis, Seoul, Korea	06/2013–08/2013
TECHNICAL SKILLS	R package: BioAge – [Github repository] Software/Programming Skills: R, Python, SQL, SAS, Stata, SPSS, L ^A T _E X	