

CURRICULUM VITAE

Allison S. Langer
Temple University
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EDUCATION

- 2021 – Present **Temple University**
Doctoral Student in Developmental Psychology
Concentrations: Developmental Psychopathology, Quantitative Methods
Advisors: Peter Marshall, Ph.D. & Jason Chein, Ph.D.
- 2013 – 2017 **University of Pennsylvania—Bachelor of Arts with Distinction**
Major: Biological Basis of Behavior, Minor: Psychology, *Magna Cum Laude*
Faculty Mentor – Robert Schultz, Ph.D.
- Fall 2015 **The International School at the University of Haifa—Study Abroad**
Honors Program in Psychology
Faculty Mentor – Simone Shamay-Tsoory, Ph.D.

GRANTS & FELLOWSHIPS

- 2022 – 2026 National Science Foundation Graduate Research Fellowship (\$144,000)
2021 – 2025 University Fellowship, Temple University (\$64,000)
2017 McMorris Summer Internship in Autism Research (\$3,750)
2016 McMorris Family Foundation Grant for Undergraduate Thesis Research (\$1,000)
2015 Masa Israel Scholarship, University of Haifa (\$1,000)

HONORS & SERVICE

- 2023 – Present *Temple University Psychology Colloquium Committee*, member
2021 *NSF Graduate Research Fellowship Program*, Honorable Mention
2021 – Present *Psychology Graduate Students for Inclusivity (PGSI)*, member
2017 – Present *Psi Chi International Honors Society in Psychology*, member
2016 – Present *Nu Rho Psi National Honors Society in Neuroscience*, member
2015 – 2017 *Dean's List*, University of Pennsylvania

WORKS IN PREPARATION

Langer, A., Martinez, S., Marshall, J. P., Chein, J. (under review). Children's Susceptibility to Content Generated by Artificial Intelligence.

Langer, A., Wilson, J. R., Howard, L., & Marshall, P. J. (under review). The Influence of Child Characteristics on Children's Behavior towards a Social Robot Versus a Human.

Langer, A. (in preparation). Scoping Review of Evidence from EEG for Altered Brain Responses among Technology Users from Infancy to Young Adulthood.

PEER REVIEWED PUBLICATIONS

Langer, A., Marshall, P. J., & Levy-Tzedek, S. (2023). Ethical Considerations in Child-Robot Interactions. *Neuroscience & Biobehavioral Reviews*, 105230.

Yang, Y., **Langer, A.,** Howard, L., Marshall, P. J., & Wilson, J. R. (2023). Towards an Ontology for Generating Behaviors for Socially Assistive Robots Helping Young Children. *Proceedings of the Association for the Advancement of Artificial Intelligence Symposium Series* (Vol. 2, No. 1, pp. 213-218).

Taylor, S. C., Gehringer, B. N., Dow, H. C., **Langer, A.,** Rawot, E., Smernoff, Z., Steeman, S., Almasy, L., Rader, D. J., Bučan, M., & Brodtkin, E. S. (2022). Contrasting Views of Autism Spectrum Traits in Adults, Especially in Self-Reports vs. Informant-Reports for Women High in Autism Spectrum Traits. *Journal of Autism and Developmental Disorders*, 1–13.

Elkhatib Smidt, S. D., Ghorai, A., Taylor, S. C., Gehringer, B. N., Dow, H. C., **Langer, A.,** Rawot, E., Zhang, J., Mitchell, J. A., Rader, D. J., Almasy, L., Brodtkin, E. S., & Bučan, M. (2022). The relationship between autism spectrum and sleep–wake traits. *Autism Research*, 15(4), 641-652.

Smidt, S. E., Ghorai, A., Gehringer, B., Dow, H., Smernoff, Z., Taylor, S., **Langer, A.,** Rawot, E., Zhang, J., Rader, D. J., Almasy, L., Brodtkin, E. S., & Bucan, M. (2021). 768 The Relationship Between Circadian Rhythm and Autism Spectrum Disorder Traits and Executive Function Across the Life Span. *Sleep*, 44 (Supplement_2), A299-A299.

Taylor, S. C., Steeman, S., Gehringer, B. N., Dow, H. C., **Langer, A.,** Rawot, E., Perez, L., Goodman, M., Smernoff, Z., Grewal, M., Eshraghi, O., Pallathra, A. A., Oksas, C., Mendez, M., Gur, R. C., Rader, D. J., Bucan, M., Almasy, L., & Brodtkin, E. S. (2021). Heritability of quantitative autism spectrum traits in adults: A family-based study. *Autism Research*, 14(8), 1543-1553.

Langer, A., Levy-Tzedek, S. (2021). Emerging Roles for Social Robots in Rehabilitation: Current Directions. *J. Human Robot Interaction*. 10, 4, Article 30 (July 2021).

Langer, A., Levy-Tzedek S. (2020). Priming and Timing in Human-Robot Interactions. In: Noceti N., Sciutti A., Rea F. (eds) *Modelling Human Motion*. Springer, Cham.

Langer, A., Feingold-Polak R., Mueller O., Kellmeyer P., Levy-Tzedek S. (2019). Trust in Socially Assistive Robots: Considerations for use in Neurological Rehabilitation. *Neuroscience & Biobehavioral Reviews*, 2019: 104, 231-239. PMID: 31348963

Budman I., Meiri G., Ilan M., Faroy M., **Langer, A.,** Reboh D., Michaelovski A., Flusser H., Menashe I., Donchin O., Dinstein I. (2019). Quantifying the social symptoms of autism using motion capture. *Scientific Reports*, 2019, 9: 7712.

PRESENTATIONS & WORKSHOPS

Langer, A., & Marshall, P. J. (April, 2024). *Examining Teachers' Opinions on the Potential for Using Social Robots in Philadelphia Public Schools* [Talk]. American Educational Research Association, Philadelphia, PA, USA.

Howard, L., Wilson, J., **Langer, A.,** Marshall, P.J. (March, 2024). *Draw a Robot Task: The Influence of Children's Age and Drawings on Robot Interactions* [Paper presentation]. IEEE Ro-Man, Pasadena, CA, USA.

Langer, A., Klugman, J. (October, 2023). *Using Hierarchical Linear Modeling to Examine Financial Stress Among Mothers in the Baby's First Years Study* [Poster Presentation]. Society for the Study of

Human Development, Philadelphia, PA, USA.

Yang, Y., **Langer, A.**, Howard, L., Marshall, P. J., & Wilson, J. R. (October, 2023). *Towards An Ontology for Generating Behaviors for Socially Assistive Robots Helping Young Children* [Paper Presentation; awarded Best Paper]. Artificial Intelligence for Human-Robot Interaction, Arlington, VA, USA.

Langer, A. (July, 2023). *Career & Educational Journey* [Invited Talk]. Students and Trainees in Autism Research Speaker Series Summer 2023, Center for Autism Research at the Children's Hospital of Philadelphia, Philadelphia, Pennsylvania.

Langer, A. (July, 2023). *Data visualization using R* [Invited Workshop]. Undergraduate Summer Research Program, Hackman Scholars, 2023. Franklin & Marshall College, Lancaster, Pennsylvania.

Langer, A., Levy-Tzedek, S. (March, 2023). *Emerging Roles for Social Robots in Rehabilitation: Current Directions* [Invited Talk]. ACM/IEEE International Conference on Human-Robot Interaction, Association for Computing Machinery, Stockholm, Sweden.

Elkhatib Smidt, S., Ghorai, A., Gehringer, B., Dow, H., Smernoff, Z., Taylor, S., Rawot, E., **Langer, A.**, Zhang, J., Rader, D., Almasy, L., Brodtkin, E., & Bucan, M. (May, 2021). *The Relationship Between Circadian Rhythm and Autism Spectrum Disorder Traits and Executive Function across the Life Span* [Virtual Poster Presentation]. SLEEP 2021.

S. C. Taylor, Z. L. Smernoff, B. N. Gehringer, H. C. Dow, **A. Langer**, E. Rawot, S. Steeman, O. Eshraghi, L. Almasy, D. J. Rader, M. Bucan, R. Barzilay, and E. S. Brodtkin. (May, 2021). *Levels of Autism Spectrum Traits Are Inversely Correlated with Psychological Resilience Factors during the COVID-19 Pandemic* [Virtual Poster Presentation]. International Society for Autism Research (INSAR).

J. Zhang, A. Ghorai, S. C. Taylor, H. C. Dow, B. N. Gehringer, **A. Langer**, E. Rawot, L. S. Perez, M. H. Goodman A., A. Pallathra, S. D. Elkhatib Smidt, D. J. Rader, L. Almasy, E. S. Brodtkin and M. Bucan. (May, 2021). *The Genetic Characterization of Probands with Autism Spectrum Disorder and Their Extended Family Members* [Virtual Poster Presentation]. International Society for Autism Research (INSAR).

Taylor, S., Gehringer, B., Dow, H., **Langer, A.**, Rawot, E., Perez, L., Pallathra, A., Grewal, M., Smernoff, Z., Steeman, S., Eshraghi, O., Almasy, L., Rader, D., Bucan, M., & Brodtkin, E. (June, 2020). *Autistic Adults' Views of Their Own Social and Executive Functioning Do Not Correlate with Informants' Views of Them* [Virtual Poster Presentation]. International Society for Autism Research (INSAR).

Zhang, J., Ghorai, A., Taylor, S., Gehringer, B., Dow, H., **Langer, A.**, Rawot, E., Perez, L., M. Goodman, M., Pallathra, A., Elkhatib Smidt, S., Rader, D., Almasy, L., Brodtkin, E., & Bucan, M. (June, 2020). *Genetic Architecture of Autism Spectrum Disorder without Intellectual Disability* [Virtual Poster Presentation]. International Society for Autism Research (INSAR).

Langer, A., Bartley, K., Ferguson, E., Pandey, J., Schultz, R.T. (May, 2021). *Motor Synchrony in Adolescents with Autism Spectrum Disorder: A Feasibility Study on the Use of a Novel Dance Game Intervention* [Poster & Oral Defense]. University of Pennsylvania Department of Biological Basis of Behavior Undergraduate Research Symposium, Philadelphia, PA.

RESEARCH EXPERIENCE

Graduate Research Fellow Collaborator PI: Jason Chein, Ph.D. The Control and Adaptive Behavior Lab Temple University Philadelphia, PA	January 2024 – Present
Graduate Research Fellow PI: Peter Marshall, Ph.D. The Developmental Science Lab Temple University Philadelphia, PA	August 2021 – Present
Clinical Research Coordinator PI: Dr. Edward Brodtkin, M.D. The Autism Spectrum Program of Excellence Perelman School of Medicine University of Pennsylvania Philadelphia, PA	August 2019 – July 2021
Research Assistant PI: Shelly Levy-Tzedek, Ph.D. The Cognition, Aging, and Rehabilitation Lab Ben-Gurion University of the Negev Beer Sheva, Israel	October 2018 – August 2019
Research Assistant PI: Ilan Dinstein, Ph.D. Dinstein Neuroimaging Lab Ben-Gurion University of the Negev Beer Sheva, Israel	October 2017 – May 2018
McMorris Summer Intern PI: Robert Schultz, Ph.D. Center for Autism Research Children's Hospital of Philadelphia Philadelphia, PA Mentored by Robert T. Schultz, Ph.D.	Summer 2017
Honors Undergraduate Thesis Student PI: Robert Schultz, Ph.D. Center for Autism Research Children's Hospital of Philadelphia Philadelphia, PA	February 2016 – May 2017
Research Intern PI: Rachel-Shlomit Brezis, Ph.D. Sagol Center for Brain and Mind The Baruch Ivcher School of Psychology Herzliya, Israel	Summer 2016
Undergraduate Research Assistant PI: Simone Shamay-Tsoory, Ph.D. Social and Affective Neuroscience Lab The University of Haifa Haifa, Israel	Fall 2015

MENTORING EXPERIENCE

STEM Professional Letter Writer Letters to a Pre-Scientist (LPS) Remote Position	Fall 2024-Present
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“Near-Peer” Graduate Mentor Summer 2024
 Building Research Independence by Developing Goals and hands-on Experiences (BRDIGE)
 Temple University
 Philadelphia, PA, USA

Graduate Mentor Summer 2023
 The Mid-Atlantic Neuroscience Diversity Scholars (MiNDS) program
 Temple University
 Philadelphia, PA, USA

Executive Board Member & Mentor Fall 2013 – Spring 2017
 Big Brothers Big Sisters & KIPP West Philadelphia Preparatory Charter School
 Philadelphia, PA, USA

TEACHING & RELEVANT EXPERIENCE

Masa Israel Teaching Fellow September 2017 – June 2018
 Yachdav Elementary School
 Beer Sheva, Israel

Neuroscience Teaching Assistant Spring 2016
 ABCS of Everyday Neuroscience
 University of Pennsylvania & West Philadelphia High School
 Philadelphia, PA, USA

Summer Program Assistant Summer 2015
 The Center for Neuroscience & Society
 University of Pennsylvania
 Philadelphia, PA, USA

Occupational Therapy Intern Summer 2015
 The Social Enrichment Center
 Springfield, PA, USA

SKILLS

Research Methods | IRB protocol preparation, grant preparation, participant recruitment, survey and task design (Qualtrics, REDCap, jsPsych), data management (REDCap), literature review (PRISMA)

Statistics & Analyses | regression, ANOVA, hierarchical linear modeling, structural equation modeling

Tools | RStudio, SPSS, MATLAB, Python (intermediate), Microsoft Office, EndNote, REDCap, MindWare (HRV & EEG data), iPi MoCap, Progeny

Task Administration & Scoring: Penn Computerized Neurobehavioral Test Battery, The Mini Mental State Examination (MMSE), Social Responsiveness Scale (SRS-2), The Bruininks-Oseretsky Test of Motor Proficiency Second Edition (BOT™-2), Autism Quotient (AQ), Ohio State University (OSU) Autism Rating Scale, Ravens Colored Progressive Matrices, Peabody Picture Vocabulary Test (PPVT-5), Social Skills Improvement System (SSIS) Rating Scales, Child Behavior Questionnaire (CBQ)

Language | Hebrew (working proficiency)

PROFESSIONAL DANCE EXPERIENCE

2018-2019 *Pargod Dance Company* | Company Member | Beer Sheva, Israel

2018-2019 *Studio Positive* | Dance Teacher | Beer Sheva, Israel

2013-2017 *Sparks Dance Company* | President & Dancer | University of Pennsylvania, Philadelphia, PA