Elif N. Poyraz, Ph.D.

Rutgers University - Center for Cognitive Science
152 Frelinghuysen Rd, Piscataway, NJ 08854
elif.poyraz@rutgers.edu ⋄ https://elifpoyraz.com

Employment

Teacher-Scholar Post Doctoral Associate 2025 - present
Center for Cognitive Science, Rutgers University - New Brunswick
Mentor: Jinjing (Jenny) Wang

Education

Ph.D. in Cognitive Psychology 2025
with a Certificate in Cognitive Science
Rutgers University - New Brunswick
Advisor: Alan M. Leslie

M.S. in Cognitive Psychology 2021
Rutgers University - New Brunswick

B.S. in Psychology 2017
Middle East Technical University (METU)

Exchange Program, Psychology Sept.-Dec. 2015
University of California - San Diego

Awards & Scholarships

Rutgers School of Graduate Studies Conference Travel Award, $1000	2024
Rutgers Psychology Department Conference Travel Award	2024
Rutgers Center for Cognitive Science Travel Award	2024
Rutgers TA/GA Professional Development Fund	2017-2018
UC-EAP Full Tuition Fee Remission, Overseas Exchange Program, $40,000	2015

Peer Reviewed Conference Proceedings

Poyraz, E., Hemmer, P., & Leslie, A.M. (2020). Can Changes in Inhibitory Control Explain Child-Level Theory of Mind Performance? In Proceedings of The Forty-Second Annual Conference of The Cognitive Science Society (pp. 1825– 1832).

Manuscripts

Poyraz, E. & Leslie, A.M. (in preparation). Selective Effect of Inhibitory Control in Theory of Mind Tasks.
Poyraz, E., Hemmer, P., & Leslie, A.M. (in preparation). Modeling How Inhibitory Control Affects False Belief Reasoning Over Time Using Dense Longitudinal Data.

Ongoing Research Summary

Project Name: **Developmental Changes in Theory of Mind and Inhibition** 2023-2025
Role: **Primary Researcher**
Advisor: Alan M. Leslie
About: Fourteen 3 and 4-year-olds tested online repeatedly (*10 to 35 times*) over the course of a year, in a variety of theory of mind and inhibitory control tasks to investigate developmental change.
Skills: Analysis and Visualization implemented in R, Bayesian analyses implemented in JASP.

Project Name: **Theory of mind and inhibitory control** 2022-2025
Role: **Primary Researcher**
Advisor: Alan M. Leslie
About: Over 250 3, 4, and 5-year-olds tested once in person and online, in a variety of theory of mind and inhibitory control tasks.
Skills: Bayesian Change-Point Algorithm and Visualization implemented in MATLAB.

Project Name: **Can changes in inhibitory control explain child-level theory of mind development?** 2020-2025
Role: **Primary Researcher**
Advisors: Pernille Hemmer & Alan M. Leslie
About: Implement computational models to asses models of developmental change in theory of mind and inhibitory control.
Skills: Model implementation implemented via WinBUGS. Model analysis and visualization implemented in MATLAB.

Project Name: **Can children account for others' knowledge state when making numerical decisions?** 2022-present
Role: **Primary Researcher**
Advisor: Jinjing (Jenny) Wang
About: Over 250 2, 3, and 4-year-olds tested in person in a science museum, in a novel task.
Skills: Analysis implemented in R.

Project Name: **Epistemic Action Understanding in Children** 2024-present
Role: **Primary Researcher**
Collaborators: Sholei Croom & Jinjing (Jenny) Wang
About: Extend a novel task to investigate how children infer others' epistemic goals by observing their actions.
Skills: Experiment implemented asynchronously in Lookit, programmed with JSON. Analysis and Visualization implemented in R.

Invited Talks

Poyraz, E., & Leslie, A.M. (2024). Preschoolers, False Belief Performance, and Development of Inhibitory Control. Invited talk, presented at UMass-Boston Early Minds Lab.
Poyraz, E., & Leslie, A.M. (2024). Preschoolers, False Belief Performance, and Development of Inhibitory Control. Invited talk, presented at Boston University Developing Minds Lab.
Poyraz, E., Hemmer, P., & Leslie, A.M. (2020). Can Changes in Inhibitory Control Explain Child-Level Theory of Mind Performance? Invited talk, presented at Rutgers University Cognition and Learning Center.

Conference Presentations

*Denotes Undergraduate Author

Poyraz, E., Croom, S., & Wang, J. (2026). Shaking boxes: When can children infer epistemic goals from actions? Poster presented at Cognitive Development Society Biennial Meeting.
Poyraz, E., *Nguyen, A., Leslie, A.M., & Wang, J. (2026). Numerical tracking and resource sharing: children's representation of others' knowledge state in optimizing their gains. Poster presented at Cognitive Development Society Biennial Meeting.
Poyraz, E., Hemmer, P., & Leslie, A.M. (2025). Modeling Development of Inhibitory Control in False Belief Tasks Using Dense Longitudinal Data. Poster presented at the 2025 Psychonomics Annual Meeting.
Poyraz, E., *Desbiens, S., Leslie, A.M., & Wang, J. (2024). Can children account for others' knowledge state when making numerical decisions? Poster presented at Cognitive Development Society Biennial Meeting.
Poyraz, E., & Leslie, A.M. (2024). Preschoolers, false belief performance and the development of inhibitory control. Poster presented at Cognitive Development Society Biennial Meeting.
Poyraz, E., Hemmer, P., & Leslie, A.M. (2021). Can Changes in Inhibitory Control Explain Child-Level Theory of Mind Performance? Poster presented at Rutgers 14th Annual Perceptual-Cognitive Science Forum
Poyraz, E., Hemmer, P., & Leslie, A.M. (2020). Can Changes in Inhibitory Control Explain Child-Level Theory of Mind Performance? Talk presented at the 2020 Virtual Psychonomics Annual Meeting.
Poyraz, E., Hemmer, P., & Leslie, A.M. (2020). Can Changes in Inhibitory Control Explain Child-Level Theory of Mind Performance? Poster presented at the 42nd Annual Virtual Meeting of the Cognitive Science Society.
Poyraz, E., & Leslie, A.M. (2019). Second-Order Theory of Mind: Thinking About Thinking ... About Thinking. Talk presented at RuCCS Fall 2019 Cognitive Festival.
Poyraz, E., & Leslie, A.M. (2019). Second Order Theory of Mind: "Do they know that we know?". Poster presented at Rutgers 12th Annual Perceptual-Cognitive Science Forum.
Poyraz, E., & Leslie, A.M. (2018). Second Order False-belief Understanding in Children. Talk presented at RuCCS Fall 2019 Cognitive Festival.

Teaching

Primary Instructor
Cognition
(Rutgers PSYCH305) Advanced undergraduate level.

- Designed the entire course; including the selection of readings, creating the assignments and in-class materials, online lecture recordings, lecture slides.
- Taught both in person and asynchronous remote.

Teaching Assistant
Programming for Behavioral Scientists: MATLAB
(Rutgers PSYCH403) Advanced undergraduate level.

- Facilitated class flow, helped students understand the code, troubleshoot errors during and after class, provided feedback to their coding assignments.

Cognitive Science: A Multi-disciplinary Introduction (Rutgers COGSCI201) Introductory undergraduate level.

- Lead recitation sections, engaged students on discussion of various CogSci topics.

Cognition Lab & Sensation and Perception Lab
(Rutgers PSYCH306 & PSYCH302) Advanced undergraduate level.

- Held online and in person classes; taught students about various cognitive and perception phenomena, running experiment codes using PsychoPy, analyzing data on Microsoft Excel, reading

scientific articles and writing lab reports.

Guest Lecturer
Cognitive Science: A Multi-disciplinary Introduction
(Rutgers COGSCI201) Introductory undergraduate level.

- Lecture: Origins of Cognition

Mentorship

Undergraduate Thesis Supervisor, Rutgers University **2018 - present**
Iyer, S. (2024/2025). Investigating Young Children's Ability to Make Merit and Fairness Inferences.
Recipient of 2025 Henry Rutgers Scholar Award, $1000

Shah, K. (2024/2025; co-advised with Alan Leslie). Exploring Intra-Individual and Inter-Individual Variability in Counting Development.
Recipient of 2025 Marilyn Shaw Award for Research Promise
Recipient of 2025 Henry Rutgers Scholar Award, $1000
Recipient of 2024 The Cooper Summer Undergraduate Research Fellowship, $4000

Lacitignola, D. (2022/2023; co-advised with Alan Leslie). Boundary Conditions for Early Word Learning as It Related to Theory of Mind.
Recipient of 2023 Henry Rutgers Scholar Award, $1000

Schansinger, D. (2019/2020; co-advised with Alan Leslie). The Effects of Increasing Executive Function Demands on Higher-Order Theory of Mind Tasks in Adults.
Recipient of 2020 The Cooper Summer Undergraduate Research Fellowship, $3000

Research Credit Supervisor, Rutgers University **2018 - present**
Supervise undergraduate students working in Cognitive Development Lab (PI:Alan Leslie) and CALC (PI: Jenny Wang) in order to receive course credit for Research in Psychology/Cognitive Science; train, supervise and mentor students on all aspects of research, including data collection and analysis, poster preparation and presentation in local and national conferences, writing abstracts and final papers, presentation of projects to the lab.

Departmental Appointments

Graduate Student Representative, Rutgers Psychology Department DEI Committee 2021-2023
Served as a graduate student representative to the department Diversity, Equity and Inclusion Committee. Act as a representative for international students, raising student needs and concerns during monthly meetings.

Professional Activities, Service & Memberships

Developmental Researcher, Liberty Science Museum 2022-current
Lead groups of undergraduate students from Rutgers University under the initiative of Dr. Jenny Wang to organize "live developmental science exhibits". These exhibits included children's participation in a research game designed by me and Dr. Jenny Wang. Engage with parents in order to make developmental science more transparent and accessible, and to increase representation by involving a diverse body of students in the outreach.

Graduate Mentor, Rutgers Honors College Department 2023-2024
Provided feedback during graduate school application workshops, attended networking events, and provided one-on-one mentorship to advanced undergraduate students studying in Rutgers Honors College.

President, Rutgers Cognitive Science Graduate Student Organization 2019-2023
Organized talks by inviting graduate students both from Rutgers and other universities.

Graduate Editor, The "Mental Note" Journal 2019
Served as a reviewer and editor for short manuscript submissions to the journal, which is an undergraduate student initiative to publish short undergraduate student research.

Ad Hoc Reviews

Journal of Experimental Psychology: General

Skills

Programming Languages: MATLAB, Python, R
Organization & Creative: Microsoft Office, Notion, Procreate
Language: Turkish (Native)