



Richelle Smith

Postdoctoral Scholar, Electrical Engineering

Bio

BIO

Richelle L. Smith is a Postdoctoral Scholar at Stanford University with Professor Tom Lee. She received the B.S. and M.S. degrees in Electrical Engineering-Electrophysics from the University of Southern California (USC) in 2017, and the M.S. and Ph.D. degrees in Electrical Engineering from Stanford University in 2019 and 2024, respectively.

Her research interests include analog/mixed-signal circuit design and energy-efficient systems, with a focus on phase-domain communications and computing. Recent projects encompass oscillatory computing for combinatorial optimization, quantum computing emulation with oscillator circuits, brain-inspired/neuromorphic circuit design, as well as wireline transceivers and phase-domain/edge modulation signaling.

She has acted as a technical consultant to Rambus Labs. She has held internship positions at Linear Technology, Rambus Labs, Stanford Brains in Silicon Lab, TDK-InvenSense, and Silicon Laboratories. She holds 5 U.S. patents. Dr. Smith serves as a Reviewer for IEEE Transactions on Circuits and Systems—Part I: Regular Papers, IEEE Transactions on Circuits and Systems—Part II: Express Briefs, and IEEE Journal on Emerging and Selected Topics in Circuits and Systems.

Selected Awards:

- SPOTLIGHT paper, IEEE Journal on Emerging and Selected Topics in Circuits and Systems (JETCAS), 2024
- IEEE Solid-State Circuits Society (SSCS) Predoctoral Achievement Award, 2022–2023
- ARCS Foundation Northern California Fellowship (William K. Bowes, Jr. Foundation Scholar), 2022–2024
- Cadence Women in Technology Scholarship, 2021
- Analog Devices Outstanding Student Designer Award, 2019
- Stanford Graduate Fellowship (Sang Samuel Wang Scholar), 2017–2022
- NSF Graduate Research Fellowship, 2017–2022
- USC Discovery Scholar Prize, 2017
- Astronaut Scholarship, 2016
- Barry Goldwater Scholarship, 2016
- Tau Beta Pi Forge No. 42 Scholarship, 2015
- Rambus Innovator of the Future Scholarship, 2013
- USC Trustee Full Tuition Scholarship, 2013–2017

STANFORD ADVISORS

- Thomas Lee, Postdoctoral Faculty Sponsor

LINKS

- Personal Site: <https://sites.google.com/view/richellesmith/home>

Teaching

COURSES

2025-26

- RF Integrated Circuit Design: EE 314A (Spr)