

Tools and Strategies for Disseminating Knowledge via the Scholarship of Teaching and Learning (SoTL)

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WORKSHOP MODE

This workshop will be facilitated in-person.

OVERVIEW OF WORKSHOP

Many disciplinary engineering PhD programs (e.g., non-Engineering Education programs) do not adequately prepare graduates for teaching and/or disseminating best teaching practices via the scholarship of teaching and learning (SOTL). As we look to broaden participation in the STEM fields in general, and engineering specifically, the limited scholarly training of disciplinary engineering educators causes a potential challenge for implementing effective pedagogical approaches critical for improving representation among minoritized and underrepresented populations. The purpose of this workshop is to provide participants with different tools and strategies to implement innovative curriculum in the engineering classroom and share lessons learned via SoTL.

ACTIVITIES

Participants will receive short lectures summarizing six specific tools and strategies related to new curriculum development, curriculum assessment, and the dissemination of knowledge via SoTL. In between each lecture, participants will complete a short active learning assignment to put the tool or strategy into practice. Learn more here: <https://www.sotlaccelerator.com/> No non-standard room and equipment is required.

TARGET AUDIENCE

The target audience are engineering educators (not formally trained in engineering education research) who are applying innovative pedagogical approaches in the engineering classroom, yet, have limited experience as it relates to the dissemination of lessons learned via SoTL.

OUTCOMES

By the end of the workshop, participants will learn how to apply six different tools and strategies as it relates to new curriculum development, assessment, and dissemination of knowledge via SoTL.

KEYWORDS

SoTL, professional development, mentoring

PRESENTERS' BACKGROUNDS

[Dr. Lisa Bosman](#), PhD in Industrial Engineering, was **recently promoted to Associate Professor at Purdue University** in West Lafayette, IN, USA. She is the founding director of [iAGREE Labs](#) (Inclusive, Applied, and Grounded Research in Entrepreneurially-Minded Education) aimed to empower action through real-world solutions and evidence-based practices. While working at Purdue University (2018-present), Dr. Bosman was **awarded 15 grants totalling \$1,166,589**. Prior to her current job, Dr. Bosman worked for a federally recognized tribal college and university, College of Menominee Nation (2011-2018), where she received 15 grant awards totalling \$897,551. Dr. Bosman has **disseminated research through more than 75 peer-reviewed publications**. In addition, she has published two teaching-oriented books: [Teaching the Entrepreneurial Mindset to Engineers](#) (Springer, 2018) and [Teaching the Entrepreneurial Mindset Across the University – An Integrative Approach](#) (Springer, 2021). Her research centers on three themes related to developing the entrepreneurial mindset in future leaders and innovators: (1) Teaching & Curriculum Development, (2) Educator Professional Development, (3) Real-World Applied Learning (Academic Entrepreneurship).