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**MARCH 14-18, 2021 • ORLANDO WORLD CENTER MARRIOTT
ORLANDO, FLORIDA, USA**
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SUBMIT AN ABSTRACT TO:

MATERIALS DESIGN

FATIGUE IN MATERIALS: FUNDAMENTALS, MULTISCALE CHARACTERIZATIONS AND COMPUTATIONAL MODELING

This symposium features novel methods and new discoveries for understanding material fatigue and life prediction. It brings together scientists and engineers from all over the world to present their latest work on current issues in characterizing and simulating fatigue damage; identification of microstructural weak links; enhancement of fatigue strength and resistance; quantitative relationships among processing, microstructure, environment, and fatigue properties; and life prediction. This symposium provides a platform for fostering new ideas about fatigue at multiple scales and in multiple environments, numerically, theoretically, and experimentally.

The symposium will be organized into six sessions:

- Data-Driven Investigations of Fatigue
- Multiscale Modeling Approaches to Improve Fatigue Predictions
- Microstructure-based Fatigue Studies on Additive-Manufactured Materials (Jointly organized with AM Fatigue & Fracture symposium)
- Fatigue Characterization Using Advanced Experimental Methods in 2D and 3D
- Multi-mechanical Interactions during Extreme Environment Fatigue Loading
- Crack Initiation Mechanisms and Short-Crack Growth Behavior

ORGANIZERS

Garrett Pataky, Clemson University, USA
Ashley Spear, University of Utah, USA
Antonios Kontsos, Drexel University, USA
Brian Wisner, Ohio University, USA

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Abstract Deadline is July 1, 2020. Submit online at
www.programmaster.org/TMS2021.

Questions?
Contact programming@tms.org