Publication Date: November 2020
Manuscript Deadline: June 1, 2020

Machine Learning Applications in Advanced Manufacturing Processes

Machine learning holds tremendous promise for revolutionizing modern manufacturing, from conventional operations to new advanced manufacturing processes, such as additive manufacturing. This special topic focuses on reducing waste, energy usage and carbon emissions, and spurring innovation in materials development and production. Advances in digital manufacturing, process control, predictive maintenance, and automation can be realized by integration of data analytics and validated models to ensure product quality, optimize operations, enhance productivity, and improve efficiency.

Original research papers should be 3,000-6,000 words with up to 8 figures maximum; review papers should be 6,000-10,000 words with up to 15 figures maximum.

Detailed author instructions are available at: http://www.tms.org/AuthorTools/

Keywords for this topic: Additive manufacturing; computational materials science & engineering; digital manufacturing; process control

Guest Editor(s): Donna Guillen, Edward Herderick, Srikanth Patala and Judy Schneider: donna.guillen@inl.gov; herderick.2@osu.edu; spatala@ncsu.edu; jas0094@uah.edu

Committee Sponsor(s): Energy; Additive Manufacturing; Computational Materials Science and Engineering

If you are interested in submitting a paper, upload your manuscript at https://www.editorialmanager.com/jomj/

Please note that all submissions will be subject to peer review. Submission does not guarantee acceptance.

For more information on JOM, please visit jom.tms.org