

TMS 2015

144th Annual Meeting & Exhibition

March 15-19, 2015 • Walt Disney World
Orlando, Florida, USA

Connecting the global minerals, metals, and materials community.



Plan Now to Attend:

Computational Thermodynamics and Kinetics

This ongoing TMS symposium series focuses on computational thermodynamics and kinetics of microstructural evolution in materials during synthesis, processing, and in service. The goal of the symposium is to bring together experts in computational and experimental methods to assess the current status of the development and integration of computational methods, models, and simulation techniques at different time and length scales and applying these tools, in conjunction with critical experimentation, for materials discovery, development, and optimization. In addition to a fundamental understanding of the mechanisms underlying microstructure development, attention will also be given to applications practical to computer-aided engineering of advanced structural and functional materials and recent advances in computational methods and algorithms for microstructure modeling.

Six sessions are anticipated with a number of invited speakers for each session. Topics of choice for this year include, but are not limited to:

- Density functional computations of thermodynamic, diffusion and defect properties of materials
- Modeling and characterization of interfaces and surfaces of materials
- Thermodynamics, kinetics, and multiscale modeling of precipitate microstructure evolution
- Computational tools specific to thermodynamic and kinetic assessments and predictions, e.g. CALPHAD

Sponsored by:

- TMS Functional Materials Division (formerly EMPMD); TMS Materials Processing & Manufacturing Division; TMS Structural Materials Division
- Chemistry and Physics of Materials Committee; Computational Materials Science and Engineering Committee

Organized by:

Richard Hennig, Cornell University (USA)
Francesca Tavazza, NIST (USA)
Maryam Ghazisaeidi, The Ohio-State University (USA)
Vidvuds Ozolins, University of California Los Angeles (USA)

**For more information on how
to participate, visit:**

www.tms.org/TMS2015

Questions? Contact programming@tms.org