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Lusk is a professor of physics at the Colorado School of Mines where he is the director of the Golden Energy Computing Organization and the lead theorist for the NSF Renewable Energy Materials Research Science and Engineering Center. He studied solid-state physics at the U.S. Naval Academy and was subsequently

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at the University of California, Santa Barbara, she held an assistant professorship at the Royal Institute of Technology, Stockholm, Sweden. She has been at Sandia for 10 years. Her main interest is in exchange-correlation functionals for density functional theory (DFT), but also how these functionals via high-performance computing use of DFT can make a real impact on modeling and simulation efforts at the engineering scales.

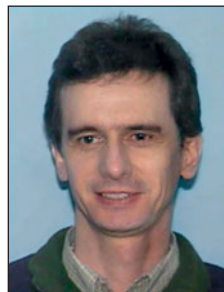


Gerbrand Ceder

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Ceder is the R.P. Simmons Professor of Materials Science and Engineering at the Massachusetts Institute of Technology (MIT). He has worked for 15 years in the Li-battery field, optimizing several new electrodes materials and has regularly served as scientific advisor to companies and investors in this area. In addition, Ceder is the founder of Computational Modeling Consultants and

Pellion Technologies. His research interests lie in the design of novel materials for energy generation and storage, including battery materials, hydrogen storage, thermoelectrics, electrodes for fuel cells, and photovoltaics. Ceder has received the MRS Gold Medal, and the Battery Research Award from the Electrochemical Society for his work on understanding battery materials, the Career Award from the National Science Foundation, and the Robert Lansing Hardy Award from The Metals, Minerals and Materials Society. He also has received three awards from the graduate students at MIT for best teaching.



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Franceschetti received his PhD degree in condensed matter physics from SISSA in Trieste, Italy, in 1994. He then joined the Solid State Theory Group at NREL as a postdoc and later as a research associate, working on the electronic and optical properties of semiconductor alloys, superlattices, and nanostructures. From 2000 to 2004, he was a research associate professor at Vanderbilt University and Oak Ridge

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Hautier is a PhD degree student in the department of Materials Science and Engineering at the Massachusetts Institute of Technology (MIT). He earned a materials engineering degree from the Universite Libre de Bruxelles and an engineering degree from the Ecole Centrale Paris in 2004. From 2004 to 2006, he conducted research at IMEC, Belgium, on nanowire growth. His current research focuses on the

prediction of new lithium ion battery cathode materials by combining data mining approaches with high-throughput *ab initio* computations. Hautier is a Total MIT Energy Initiative and a Belgian American Education Foundation fellow. He also was a recipient of a Fonds Wetenschappelijk Onderzoek scholarship.

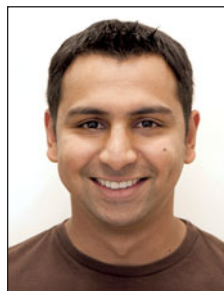


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Ihm is a Seoul National University Distinguished Professor in the Department of Physics and Astronomy and director of the Center for Theoretical Physics. He received his PhD degree in physics from UC Berkeley in 1980. He worked at MIT, AT&T Bell Labs, and Bellcore. He has been involved in the development of computational materials physics based on electronic and total energy calculations. His major research topics include the electronic

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Jain is a PhD candidate at the Massachusetts Institute of Technology in the Department of Materials Science and Engineering. He received a bachelor's degree in applied and engineering physics from Cornell University and currently holds a Department of Energy Computational Science graduate fellowship. Jain is using large-scale density functional theory calculations to create a materials encyclopedia for the design

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Nordlund is professor of computational materials physics at the University of Helsinki. He got his PhD in 1995 at the University of Helsinki, spent two years as a postdoctoral researcher at the University of Illinois in Urbana-Champaign 1996-1997, and was appointed professor in 2003. His research interests include atom-level studies of plasma-wall interactions in fusion reactors, nonequilibrium processes in nanoclusters, nanotubes and nanowires, and ion and

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Ong is a graduate student in the Department of Materials Science and Engineering at the Massachusetts Institute of Technology. He graduated from the University of Cambridge, UK with First Class Honors in 1999 and was awarded the university's Institute of Civil Engineers Baker Prize. His undergraduate studies were funded by the Singapore Public Service Commission Overseas Merit Scholarship. Ong's research

focuses on the application of first-principles modeling to study of the phase equilibria, transport, and other properties of materials for energy storage. His work spans from first-principles thermodynamics of solid-state cathode materials to the modeling of complex liquid electrolyte systems.

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ment of Energy Nuclear Engineering graduate fellow. Following several years in the High Performance Computational Materials Science Group at Lawrence Livermore National Laboratory, Wirth joined the faculty at the University of California, Berkeley, as an assistant professor of nuclear engineering in 2002. He was promoted to associate professor in 2006. His research interests involve the combination of multiscale modeling and advanced microstructural characterization to develop improved understanding and models of microstructure–property relationships and microstructural evolution during processing and service in hostile environments, with an emphasis on irradiation effects. He has received the 2007 Fusion Power Associates David J. Rose Excellence in Fusion Engineering Award and the 2003 Presidential Early Career Award for Scientists and Engineers (PECASE).

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