

Stephen DeWitt

Steve



Graduate Institution: University of Michigan

Location: Ann Arbor, MI

Graduate Discipline: Applied Physics

Hometown: Lansing, MI

Research Interests:

I am generally interested in the ways computational materials science can be used to model and improve low-cost solar cells.

More specifically, I am interested in nanostructured photoelectrochemical cells (PECs) for the solar generation of hydrogen. I have been working to model the anodic growth of metal oxide nanotubes for use in PEC photoanodes. I also am interested in the role of the various metals in mixed metal oxide photoanodes in order to find a metal combination that maximizes performance.

I am also deeply interested in energy systems in developing countries and what technologies are best for improving economic growth and quality of life.

About me:

I graduated from the University of Michigan with a BSE in engineering physics. While in undergrad I helped to create a student organization named M-HEAL, that repairs, designs, and builds medical equipment for developing countries. I was active in my church leading a weekly discussion group. I also did a little bit of work for Wolverine Soft, the video game development club on campus. I had internships with Dart Container Corp. and Lockheed Martin.

After finishing my PhD work, ideally I would to join a start-up focusing on solar energy research specifically for developing countries. I would also be interested in doing energy policy work.

Hobbies/Personal Interests:

Economics, public policy, economic development, philosophy, theology, video game mechanics, ultimate Frisbee, tennis, swimming, reading novels and short stories, not wearing shoes, climbing trees, intellectual property, entrepreneurship



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