

# David Sondak



**Graduate Institution:** Rensselaer Polytechnic Institute

**Location:** Troy, NY

**Graduate Discipline:** Aerospace Engineering

**Hometown:** Gettysburg, PA

## **Research Interests:**

*David's general research interests include fluid turbulence, turbulence modeling, and plasma physics. His current work focuses on developing subgrid-scale models for finite element simulations of magnetohydrodynamic turbulence. An application area of particular interest for this work is in nuclear fusion, specifically in magnetically confined plasmas. Additionally, he is interested in developing turbulence models for the Vlasov equation which may have applications to plasma microturbulence in tokamaks. David is also interested in modeling astrophysical plasmas as a research topic to pursue in the future.*

## **About me:**

*David received a B.S. degree in Mechanical Engineering from Lehigh University in 2008 and is currently pursuing a PhD in Aerospace Engineering at Rensselaer Polytechnic Institute. As an undergraduate he participated in a research project under the supervision of Professor Eugenio Schuster at General Atomics National Fusion Facility in San Diego, California. His work focused on studying the effects of time delays on the axisymmetric control loop of the KSTAR superconducting tokamak in South Korea. David is a member of the Mechanical Engineering honor society Pi Tau Sigma and the American Society of Mechanical Engineers. In the future he plans to become a professor as such a career would bridge his passions of teaching and learning. In his spare time he enjoys outdoor activities such as hiking and skiing. He also plays racquetball, tennis, and soccer and enjoys a good book whenever possible.*



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