

CURRICULUM VITAE: KYLE GWIRTZ

Ph.D. Candidate
Geophysics,
Scripps Institution of Oceanography,
La Jolla, California, 92037

Tel. 785-341-2933
kgwirtz@ucsd.edu

EDUCATION

Scripps Institution of Oceanography	Geophysics	Ph.D.	In Progress
University of Arizona	Applied Mathematics	M.S.	2019
University of Kansas	Mathematics	B.Sc.	2009

AWARDS

NASA Earth and Space Science Fellowship (NESSF) 2018-2021

PUBLICATIONS

K. Gwirtz, M. Morzfeld, A. Fournier, G. Hulot, *Can one use Earth's magnetic axial dipole field intensity to predict reversals?*, *Geophysical Journal International*, 225(1), 277-297 (2021).

M. Brio, J.G. Caputo, K. Gwirtz, J. Liu and A. Maimistov, *Scattering of a short electromagnetic pulse from a Lorentz-Duffing film: theoretical and numerical analysis*, *Wave Motion*, 89, 43-56 (2019).

RESEARCH EXPERIENCE

Graduate Intern, NASA Goddard Space Flight Center Summer 2018

TALKS & PRESENTATIONS

SIAM-Computational Science and Engineering Spring 2021

Title of Talk: Geomagnetic Data Assimilation for Decadal Scale Forecasts: Lessons from a New Simplified Model

SIAM-Mathematics of Planet Earth Summer 2020

Title of Talk: Data assimilation experiments with a reduced-order model of the geodynamo

Scripps Institution of Oceanography, Paleomagnetism Seminar Summer 2020

Title of Talk: Can one use Earth's magnetic axial dipole field intensity to predict reversals?

International Union of Geodesy and Geophysics General Assembly Summer 2019

Title of Poster: Geomagnetic data assimilation: numerical experiments with a reduced-scale model

American Geophysical Union Fall 2018 Meeting Fall 2018

Title of Poster: Localization and bias correction in geomagnetic data assimilation: systematic numerical experiments with reduced-scale models

U2 can UQ, University of Arizona Spring 2018

Title of Talk: Geomagnetic data assimilation

RTG workshop, University of Arizona Fall 2017

Title of Talk: Invariant densities for maps with noise

RTG workshop, University of Arizona Spring 2017

Title of Talk: Thin ferroelectric films