# Dr. Jeremy W. Aber

#### Curriculum Vitae

Department of Geosciences
Middle Tennessee State University
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#### EDUCATION

Ph.D. Kansas State University, Geography, December 2012.

Dissertation: Comparing the dominant and continuous theoretical frameworks of spatial microgenesis.

M.A. Kansas State University, Geography, May 2007

Thesis: Place attachment and sense of community among U.S. video arcade collectors.

B.F.A. Emporia State University, Kansas, May 2005

Art major - Emphasis in glass casting; Minor in Geospatial Analysis

International student exchange, University of Tartu, Estonia. Baltic Studies Program, fall semester 2000.

## PROFESSIONAL EXPERIENCE

Associate Professor at Middle Tennessee State University, Tennessee. Teaching Physical Geography (PGEO 1030), Cartography (PGEO 4380), Intro to GIS (PGEO 4530/5530), Intermediate GIS (PGEO 4560/5560), and the Physical Geography Field Course (PGEO 3401). Fall 2019 – Present.

Assistant Professor at Middle Tennessee State University, Tennessee. Fall 2013 – Summer 2019.

Full-time Instructor at Emporia State University, Kansas. Taught Intro to Earth Science (ES 110), Computer Mapping Systems (ES 551), Cartography (GE 371), and ArcGIS Applications (ES 567) Fall 2012 – Spring 2013.

Instructor at Emporia State University, Kansas. Taught Cartography (GE 371), fall of 2010 and spring of 2012.

# PUBLISHED WORKS

**Aber, J. W.**, K. Sadler, S. N. Hidayati, P. Phoebus, J. B. Grinath, R. El Kadiri, C. Harris, H. Momm, A. D. Reed, A. B. Perry. 2019. <u>Natural resource condition assessment for Russell Cave National Monument</u>. Natural Resource Report NPS/RUCA/NRR-2019/1942. National Park Service, Fort Collins, Colorado.

Momm, H. G., W. S. Porter, L. M. Yasarer, R. El Kadiri, R. L. Bingner, **J. W. Aber**. 2019. <u>Crop conversion impacts on runoff and sediment loads in the Upper Sunflower River watershed</u>. *Agricultural Water Management*. 217, 399-412.

**Aber, J. W.**, T. A. Babb, D. E. Campbell, and K. M. Corns. 2018. <u>A Comparison of the strengths and weaknesses of small-format aerial photography platforms</u>. *International Journal of Aviation, Aeronautics, and Aerospace, 5*(3).

**Aber, J. W.** and T. A. Babb. 2018. The Challenges of processing kite aerial photography imagery with modern photogrammetry techniques. International Journal of Aviation, Aeronautics, and Aerospace, 5(2).

Aber, S.W. and J.W. Aber. 2017. Map Librarianship. Chandos Publishing, Cambridge, MA.

Momm, H. G., Z. Law, S.N. Hidayati, J. Walck, K. Sadler, M. Abolins, L. Simpson, and **J. W. Aber**. 2016. <u>National Resource Condition Assessment for Stones River National Battlefield</u>. Natural Resource Report NPS/STRI/NRR—2016/1141. National Park Service, Fort Collins, Colorado.

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- **Aber, J. W.** 2015. <u>Using ArcGIS to quantitatively measure sketch map quality for the comparison of theoretical frameworks of spatial microgenesis</u>. *Emporia State Research Studies*. 50:1, 11-17.
- **Aber, J. W.** 2012. Cartographic figures in <u>Civil Wars in the Democratic Republic of Congo, 1960-2010</u>, by E. Kisangani. Lynne Rienner Pub, Boulder, CO.
- **Aber, J. W.** 2008. Spatial Scales of the Arcade Collecting Community. *Aether: The Journal of Media Geography*. 2, 61-71.

#### **PRESENTATIONS**

- Lobegeier, M., J. W. Aber, W. Cribb. 2019. <u>Assessing Student Learning with E-Portfolios in the Department of Geosciences at Middle Tennessee State University</u>, poster presentation at the Earth Educator's Rendezvous, Nashville, TN.
- **Aber, J. W.**, H. G. Momm, R. El Kadiri, and D. Lemke. 2019. <u>Understanding and fostering geoscience student attitudes toward agricultural careers</u>, poster presentation at the American Association of Geographers National Meeting, Washington DC.
- Bingner, R. L., H. G. Momm, W. Porter, L. Yasarer, R. El Kadiri, and **J. W. Aber**. (2019). Management Practice Impacts on Runoff and Sediment Loads in the Upper Sunflower River Watershed, April 2-3, Presentation with abstract at the Mississippi Water Resources Conference, Jackson, MS.
- **Aber, J. W.**, H. G. Momm, R. El Kadiri, and D. Lemke. 2018. <u>Understanding and fostering geoscience student attitudes toward agricultural careers</u>, poster presentation at the Earth Educators' Rendezvous, Lawrence, KS.
- Lobegeier, M. K., R. El Kadiri, **J. W. Aber**, M. J. Abolins, W. Cribb, C. Harris, H. G. Momm. <u>MT Rocks: The implementation of the MT Engage initiative in the Department of Geosciences at Middle Tennessee State University</u>, poster presentation at the Earth Educators' Rendezvous, Lawrence, KS.
- **Aber, J. W.** and P. A. Seagraves. 2018. <u>Property value and proximity to job centers A geospatial approach</u>, a paper presented at the Pacific Rim Real Estate Society's Annual Conference, Auckland, New Zealand.
- **Aber, J. W.**, N. Dennis, and T. Newell. 2017. <u>The Challenges of Working with Kite Aerial Photography</u> <u>Imagery</u>, a paper presented at the American Association of Geographers National Meeting, Boston, MA.
- Momm, H.G., R.E. Kadiri, **J. W. Aber**, D. Lemke, and W. Tadesse. 2017. Educational and Research Capacity Building Through the Investigation of Long-Term Anthropogenic and Climatic Effects on Water Quality in Agricultural Watersheds. Presentation at the Non-Land-Grant Agriculture and Renewable Resources Universities (NARRU) 2017 Fall Conference, Morro Bay, California, U.S.A., October 1-4.
- **Aber, J. W.** and A. Reed. 2016. <u>Analog Activities in a Digital World: Tabletop Gaming and Social Media</u>, a paper presented at the American Association of Geographers National Meeting, San Francisco, CA.
- **Aber, J. W.** 2015. <u>Kite Aerial Photography Monitoring of Vegetation Change</u>, a paper presented at the Association of American Geographers National Meeting, Chicago, IL.
- **Aber, J. W.**, M. Sprague, S. W. Aber, and J. S. Aber. 2015. Small-Format Aerial Photography for Civil War Sites, poster presentation at the Kansas Academy of Sciences poster session, Pittsburg, KS.
- **Aber, J. W.** and D. Green 2014. <u>Virtual Spaces and the Manipulation of Player Emotion</u>, a paper presented at the Association of American Geographers National Meeting, Tampa, FL.
- **Aber, J. W.** 2012. Mapping Microaggressions, a paper presented at the Association of American Geographers National Meeting, New York City, NY.
- **Aber, J. W.** 2011. The Effect of Spatial Training and Map Exposure on Spatial Microgenesis, a paper presented at the Association of American Geographers National Meeting, Seattle, WA.
- **Aber, J. W.** 2010. Videogames as Geographic Education Tools, a paper presented at the Association of American Geographers National Meeting, Washington DC.

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**Aber, J. W.** 2009. Representations of Space in Videogames, a paper presented at the Association of American Geographers National Meeting, Las Vegas, NV.

**Aber, J. W.** 2008. Gender, Sexuality and Rural Spaces in Modern Video Games, a paper presented at the Association of American Geographers National Meeting, Boston, MA.

**Aber, J. W.** 2007. The Video Arcade in Memoriam: California Extreme and Place Attachment, a paper presented at the Association of American Geographers National Meeting, San Francisco, CA.

#### **GRANTS**

**Co-PI:** Educational and Research Capacity Building through the Investigation of Long-Term Anthropogenic and Climatic Effects on Water Quality in Agricultural Watersheds. 2017. External Collaborator: Alabama A&M University. Funded by the United States Department of Agriculture, \$283,000.

**PI:** Natural Resource Assessment of the Russell Cave National Monument. 2016. External Collaborator: Russell Cave National Monument. Funded by the National Parks Service, \$66,986.

**Co-PI:** Tennessee Space Grant Consortium, MTSU Campus Request. 2015-2019. External Collaborator: Vanderbilt University. Funded by NASA, \$106,194.

**Co-PI:** Tennessee Board of Regents Student Engagement, Retention, and Success Grant, Aiding Student Success in STEM (ASSIST). 2014. External Collaborator: Austin Peay State University. Funded by the Tennessee Board of Regents, \$40,000.

**Co-PI:** Natural Resource Assessment of the Stones River National Battlefield Park. 2013. External Collaborator: Stones River National Battlefield. Funded by the National Parks Service, \$65,119.

## RESEARCH INTERESTS

GIS, cartography, geographic visualization techniques, small-format aerial photography, virtual geographies and video games, cognitive geography, sense of place and place attachment.

#### TEACHING INTERESTS

GIS, cartography and digital mapping, physical and regional geography.

#### SKILLS AND EXPERIENCE

GIS, spatial analysis, and interactive and paper cartography. Experienced user of ArcGIS, Idrisi, ERDAS Imagine, and ENVI.

Large amount of computer expertise including all versions of Windows; Linux; web design and administration, Windows and ArcGIS server administration.

Qualitative and quantitative research techniques, including field work, working with human subjects, and academic writing.

International experience living in Canada, Norway, and Poland in addition to undergraduate experience living in Estonia.

#### Honors and Awards

Eagle Scout recipient, awarded 1998.

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