



Curriculum Vita  
**Adam Bowden**



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### EDUCATION

- ▶ **Master of Computer Science**  
Texas A&M University – Commerce, December 2019
- ▶ **Master of Mathematics**  
Texas A&M University – Commerce, August 2014
- ▶ **Bachelor of Computer Science**  
Texas A&M University – Commerce, August 2012
- ▶ **Associates of Computer Science**  
Paris Junior College, July 2010

### TEACHING EXPERIENCE

- ▶ **August 2015 – Present**, Instructor of Mathematics, *Texas A&M University – Commerce*
- ▶ **August 2014 – August 2015**, Ad – Interim Instructor of Mathematics, *Texas A&M University – Commerce*
- ▶ **June 2014 – July 2014** and **June 2015 – July 2015**, Adjunct Instructor, *Paris Junior College*
- ▶ **August 2012 – May 2014**, Graduate Assistant – Teaching, *Texas A&M University - Commerce*

### PUBLICATIONS

- ▶ (In Review) Bowden, A., Sirakov, N.M. Poisson Gradient Vector Fields Features to Enhance Image Classification. *J Computational and Applied Math* (2022)
- ▶ Bowden, A., Sirakov, N.M. Active Contour Directed by the Poisson Gradient Vector Field and Edge Tracking. *J Math Imaging Vis* (2021). <https://doi.org/10.1007/s10851-021-01017-3>
- ▶ Bowden, A. & Sirakov, N. M. (2015). Applications of the Euler - Lagrange Poisson Active Contour in Vector Fields, Overcoming Noise, and Line Integrals. *Differential Equations and Dynamical Systems – Series B*.

## PUBLICATIONS (cont.)

- Bowden, A., Todorov, M. D., & Sirakov, N. M. (2014). Implementation of the Euler-Lagrange and Poisson Equations to Extract One Connected Region. *AIP Conference Proceedings*, 1629(1), 400-407.

## PRESENTATIONS

- *Recent Experiences in Dual Credit*, 101st Annual Mathematics Association of America Conference – Texas Section, Denton, TX, April 2, 2022
- *Answering HB2223 In Math: The Co-Requisite Model at TAMUC* (Co-presented with Dr. Pamela Webster, Mrs. Laura Been, and Mrs. Rebecca Steward), Co-Requisite Courses Conference, Houston, TX, June 22, 2019
- *Investigating Deep Euler-Lagrange-Poisson Segmentation Learning for Image Segmentation*, 99th Annual Mathematics Association of America Conference – Texas Section, Stephenville, TX, March 29, 2019
- *Strategies for Dual Credit Success: Building Connections, Rigor, and Quality*, 2018 Dual Credit & Early College High School Conference, Denton, TX, April 11, 2018
- *University Math at the High School: Addressing Challenges and Finding Strategies for Successful Dual Credit Classes*, 98th Annual Mathematics Association of America Conference – Texas Section, Dallas, TX, April 6 2018
- *What Links Computers, Science, Engineering, and Medicine? The Answer and an Example* (Co-presented with Dr. Nikolay Sirakov), Math Club, Texas A&M University – Commerce, Commerce, TX, February 9, 2018
- *Teaching with Technology: Experiences from Dual Credit*, Conference for the Advancement of Mathematics Teaching, Fort Worth, TX, July 7, 2017
- *Splitting ELPAC and Its Applications*, 97th Annual Mathematics Association of America Conference – Texas Section, Commerce, TX, March 31, 2017
- *The Magical Mysteries of Math* (Co-presented with Mrs. Rebecca Steward) Math Club, Texas A&M University – Commerce, Commerce, TX, December 8, 2016
- *Enhancements to the Euler – Lagrange Poisson Active Contour*, 96th Annual Mathematics Association of America Conference – Texas Section, Nacogdoches, TX, April 1 2016
- *The Magical Mysteries of Math* (Co-presented with Mrs. Rebecca Steward) Math Club, Texas A&M University – Commerce, Commerce, TX, December 3, 2015
- *Investigations Into the Noise and Multiple Region Segmentation Abilities of Euler-Lagrange Poisson Active Contour*, The 9th International Conference on Differential Equations and Dynamical Systems, Dallas, TX, May 14 2015

## PRESENTATIONS (cont.)

- *Handling Noise and Multiple Region Segmentation With an Euler – Lagrange Poisson Active Contour*, Math Department Colloquium, Texas A&M University – Commerce, Commerce, TX, February 6 2015
- *Application of the Euler-Lagrange and Poisson Equations to Image Segmentation*, 94th Annual Mathematics Association of America Conference – Texas Section, Laredo, TX, April 5 2014

## SERVICE

- Co-sponsor of the Math Clubs (Alpha Gamma Alpha and Council for Teaching Mathematics) (2019 – present)  
*Duties include: arranging monthly meetings for members, overseeing and recruiting club members and officers, and handling fundraising.*
- Co-coach of the Math Bowl competition teams (2019 – present)  
*Duties include: raising funds for travel and registration, hosting practice activities, and arranging for transportation and oversight of teams to the competition*
- Math Department website coordinator  
*Duties include insuring web information is up-to-date and accurate.*
- Northeast Texas Algebra Competition (NTAC) question organizer  
*Duties include creating competition presentation and organizing questions and answers*
- Co-chaired the Mathematics Advisory Council (MAC) and Chair of MAC Action Plan Committee (Fall 2018 – Spring 2021)  
*Duties included: arranging and leading two meetings each year, collecting council feedback, and leading the committee to take action on feedback.*
- Assisted with dual credit math coordination  
*Duties included communicating with dual credit instructors to insure consistent and sufficient standards of rigor and compliance with university and department requirements.*
- Assisted with the annual SCUDEM competition in the math department.
- Created the webpage for the 2017 Mathematical Association of America (MAA) – Texas Section hosted on campus:  
(<https://www.tamuc.edu/academics/colleges/scienceEngineeringAgriculture/departments/mathematics/maa2017/default.aspx>)