

Brent M. Dingle

Menomonie WI 54751

Manager, Scientist, Educator, and Engineer

DocDingle.com
dingleb@uwstout.edu

Equipped for excellence in research, design, development, and leadership

Talented and knowledgeable professional with demonstrated management abilities; Innovative, adaptive, and versatile; Proven leader of development teams with significant experience in simulation, animation, math modeling, graphics, gaming, and human interaction; Noteworthy experience in academia and industry.

Experience: 15+ years in Programming: Windows, Linux, Mac, iOS, Web, many languages
10+ years in Simulation Modeling, Graphics, Interfaces, and Analysis
5+ years in Instructional Preparation and Execution
5+ years in Management and Leadership
2+ years in Database Design and Development
2 released video game titles

Assistant Professor ♦ University of Wisconsin – Stout

*Created and taught computer science and game design and development courses
Led undergrad and grad students in research and development efforts
August 2013 to present, Menomonie, Wisconsin*

Software Developer ♦ Kihon Games

*Programmer on multiple iOS games: two officially released
March 2012 to December 2012, Tucson, Arizona*

Senior Systems Engineer II ♦ Raytheon Missile Systems

*Designed, developed, and released work projects in modeling, simulation, and analysis
Multiple management and leadership positions
June 2007 to May 2012, Tucson, Arizona*

Professional Tutor ♦ The Tradition at Northgate

*Organized and conducted tutoring in mathematics, physics, engineering, and computer science
May 2004 to May 2007, College Station, Texas*

Lecturer ♦ Texas A&M University

*Prepped, planned, and taught introductory computer science courses
August 2003 to December 2003
August 2001 to May 2002, College Station, Texas*

Teaching Assistant ♦ Texas A&M University

*Taught introductory mathematics, engineering, and computer science courses
January 2003 to May 2003
August 1997 to July 2001, College Station, Texas*

Software Engineer ♦ Rec Sports – Texas A&M University

*Designed and created the database and supporting software for the Walk of Champions
May 1998 to May 2000, College Station, Texas*

Software Developer ♦ Customer Development Corporation

*Developed SQL drivers and client software for a proprietary data warehouse
May 1995 to June 1997, Peoria, Illinois*

Software Developer ♦ Caterpillar – Work Study

*Designed and developed interpolation software for visual inspection of boron steel testing
January 1994 to January 1995, Mossville, Illinois*

Education: Ph.D. Computer Science
 Texas A&M University, May 2007
 Dissertation Topic: Volumetric Particle Modeling
 Advisor: John Keyser,
 Committee: Donald House, Frank Shipman, Peter Stiller

M.S. Mathematics
 Texas A&M University, December 1999
 Area of Specialization: Numerical Methods and Physically Based Modeling

B.S. Computer Science
 Bradley University, magna cum laude, May 1995

B.S. Mathematics
 Bradley University, magna cum laude, May 1995

Service and

Leadership: 2015 Member, E3 Competition Steering Committee, UW-Stout
 2015 Member, Computers and Writing Conference Committee, UW-Stout
 2015 Member, Hiring Search Committee, UW-Stout
 2014-2015 Faculty Advisor, Student Club Stout-Magic the Gathering, UW-Stout
 2014 Presenter, Science Olympiad State Competition, UW-Stout
 2014 Judge, Spring Game Contest, UW-Stout
 2013 Judge, Fall 48-Hour Gaming Contest, UW-Stout
 2013 Judge, ACM Programming Contest, UW-Stout
 2010-2011 Deputy Integrated Product Team Lead, Raytheon Missile Systems
 2010-2011 Simulation Team Lead, FMS Processor Replacement Program (PRP), Raytheon
 2008-2011 Simulation Team Lead, Phases 1, 2, and 3 PRP, Raytheon Missile Systems
 1998-1999 President, Graduate Student Organization, Mathematics, Texas A&M University
 1998-1999 Representative, Graduate Student Council, Mathematics, Texas A&M University
 1994-1995 Member by appointment, Advisory Board to the Dean, Bradley University
 1994-1995 Vice President, Association of Computing Machinery, Bradley University
 1993-1994 President, Mathematical Association of America, Bradley University

Peer Reviewed

Papers: *Teaching Strategic Lean Thinking through Simulation Gaming, 2015*
 To appear in: Proceedings of the 2015 Industrial and Systems Engineering Research Conference, Thomas A. Lacksonen and Brent Dingle. *This paper, while peer reviewed and accepted, was not published due to non-author related funding issues.*

The Trial of Galileo: a game of motion graphs, 2014
 In Proceedings of CHI PLAY '14. ACM, pp. 363-366, Ian Pommer, Michael N. Flaherty, Alicia Griesbach, Bryant Seiler, John Leitner, Kenneth Patterson, Dylan Tepp, and Brent Dingle. 2014.

Keyframing Particles of Physically Based Systems, 2005
 In TPCG05: Eurographics UK Chapter Proceedings, University of Kent, Canterbury, United Kingdom, June 2005, pp. 11 – 18, Brent Dingle and John Keyser. 2005. *Winner of Robert Fletcher Prize for Best Application Paper and Presentation.*

Research

Interests: Simulation, Modeling, Graphics, Gaming, Mobile, Web, HCI, Numerical Methods, Symbolic Computing, Robotic Motion Planning, Emergent Behavior, Imaging and Image Processing

Courses

Taught:

University of Wisconsin – Stout

CS 244: Data Structures

CS 245: Introduction to Computer Organization

CS 345/545: Digital Image Processing

GDD 325: 2D Game Design and Development

GDD 450: 3D Game Design and Development I

GDD 451: 3D Game Design and Development II

Texas A&M University – College Station

CPSC 110: Introductory Programming using Pascal

CPSC 203: Introduction to Computing using FORTRAN