

Karen Jo Matsler, Ed.D

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Education Background/Certification

Argosy University, Doctorate in Curriculum and Instruction	May 2004
University of Sarasota, Education Specialist	Sept. 2003
Texas Tech University, MS (Secondary Education)	1981-1986
Texas Tech University, BSED (Composite Science)	1973-1977
University of Dallas (12 hrs physics graduate credit)	1997, 2006, 2009
Idaho State University (3 hrs graduate credit)	2009
Brigham Young University (2 hours graduate credit)	2008
Colorado. School of Mines (4 hrs physics graduate credit)	1992

Work History

UTeach Master Teacher, University of Texas @ Arlington	2011-current
President of Education Assessment and Training. Inc. (EAT)	2001-current
Dallas Baptist University, adjunct professor (Physics, Education)	2000-current
External evaluator for Department of Education Math Science Partnership Grants (see listing below in Evaluation Projects)	2007-current
Argosy University, adjunct professor (Curriculum and Instruction)	2006-2013
Southern Methodist University (SMU), adjunct professor (Education)	2011-2013
University of Dallas, Director for Teacher Quality Grants	2005-2009
Co-PI National Science Foundation Grant (Science Education, \$6 million)	2002-2008
K-12 Science Coordinator, Birdville Independent School District	2003-2005
K-12 Science Coordinator, Lancaster Independent School District	2002-2003
Lamar High School, Arlington (physics, physical science, biology teacher)	1989-2002
Atkins Junior High, Lubbock (physical science teacher)	1987-1989
Texas Tech University, Teaching Assistant (science lab instructor)	1982-1983
Hutchinson Junior High, Lubbock (7th hon. Biology teacher)	1980-1982
Lamar High School, Arlington (physics, biology teacher)	1977-1980

STEM Related Experience (volunteer)

Grapevine-Colleyville ISD STEM Advisory Council	2013-current
Inquiry Institute STEM Task Force (Curriculum Development)	2007-current
FWMSH STEM Institute Presenter and Consultant	2013-current
Fort Worth Museum Board of Directors for Educational Programs	2012-current
National Director for AAPT/PTRA (PTRA)	2012-current
ESC Region XI Instruction Team for STEM/TRC Grants	2007-current
Advisor for Physics MasterTeacher Leader Task Force (AAPT)	2016-current
NSTA Science Scope Publishing Advisory Board	2013-2016
Metroplex Area Science Supervisors, Board of Directors (founder)	2013-2015
Internal Program Evaluator for AAPT/ PTRA Rural Project	2003-2010
Dallas Baptist University Educator Preparation Board	2007-2010
Physics Teacher Resource Agent	2000-current
Texas Physics Assessment Team (TPAT)	2003-2014
Trainer for End-of-Course State Exams (Texas Education Agency)	2010-2015

Professionally Related Experience (volunteer, offices held, committees)

Executive Board for American Association of Physics Teachers (elected)	2016-2019
Perimeter Institute for Theoretical Physics (Perimeter) instructor for Einstein Plus Academy for teachers (international program)	2014-2016
Texas Education Agency certified professional development provider	2013-current
Texas Education Certification Standards Committee, TExES	2014
AAPT National nominating committee	2013
AAPT Texas Section Representative (national)	2013-2016

Advisory Committee, Noyce Grant, Texas State University	2012-2016
Committee on Physics in Pre High School Education (AAPT)	2012-2015
PTRA National Advisory Board (appointed)	2003-2010
AAPT e-Mentoring Committee (appointed)	2011-current
UTA Dept. of Education Disposition Committee	2011-2012
Science Teacher Association of Texas Legislative Committee (appointed)	2011-2012
PTRA Publication Editorial Review Board	2003-current
Past President Texas Section AAPT (TSAAPT)	2012-2013
American Institute of Physics (AIP), Governing Board	
Advisory Committee on Physics Education (appointed)	2007-2012
President Texas Section AAPT (TSAAPT) (elected)	2010-2011
Science Teacher Association of Texas, Executive Board (elected)	2002-2006, 2011
Secretary Science Teacher Association of Texas (STAT) (elected)	2009-2010
AAPT High School National Committee (Physics) (appointed)	2007-2010
President Texas Science Education Leadership Association (TSELA) (elected)	2008-2009
Site coordinator for Teacher Expo, APS-DPP	2008-09
Texas Section AAPT Executive Council or Representative	2002-09
Texas PTRA Rural Initiative Director	2002-2009
Texas Education Agency Advisory Committee on Assessments	2006-2008
Committee Chair, CAST (State Science Teacher meeting)	2007-08
Panelist reviewer for the National Science Foundation	2007
Texas Education Agency Physics Task Force	2007
Committee Chair National Science Teacher Association	2004-2005
Secretary for Texas Science Education Leadership Association	2004-2005
Science Teacher Association of Texas Awards Committee	2004
AAPT Committee for teacher mentoring (PhysTEC)	2003-2004
AAPT Committee for Preparation of Pre-service Teachers	2002-2003
Regional Director/Coordinator for Urban PTRA Project	1999-2002
Arlington ISD school boundary committee (2010 committee)	1999-2001

Honors Received

Katherine Mays Award, Outstanding Contributions to Physics Education	March 2014
American Physical Society (APS) Excellence in Education Award	May 2011
American Association of Physics Teachers (AAPT) Outstanding Service Citation	July 2008
Teacher of the Year, Lamar High School	May 2002
RadioShack National American Teacher Award	Mar. 2000
Grand Marshall, Arlington 4 th of July Parade,	July 2000, 2004
National Tandy Teacher Award, Honorable Mention	Feb. 1999
Arlington AWARE Runner Up (Top Teacher in the District Award)	May 1998
Lamar High School Teacher of the Month	April 1997, Feb. 2001, Jan 2002
Arlington ISD Wall of Fame	2000
Assoc. of Texas Professional Educators, Secondary Teacher of the Year (state)	1996

Recent Presentations

2015

Texas Section AAPT/APS Spring Conference, Baytown, TX, Invited Speaker, *Engaging Teachers in Professional Development*, and workshop *Mystery of Dark Matter*, March 6-7, 2015

National Science Teacher Association, Chicago, IL, *Was Newton Wrong?* March 12, 2015.

ESC 3, REAL Conference (Regional Excellence through Academic Leadership), Victoria, TX, *Addressing Accountability for both Students and Teachers*, Aug 19, 2015.

Texas Section AAPT/APS Fall Conference, Baylor University, 1) *Dark Matter* and 2) *The Physics of Metallurgy, Environment, and Corrosion*. Oct 30, 2015.

Conference for the Advancement of Science Teaching (CAST), Fort Worth, TX, 1) *Can You hear me Now?* 2) *Taking the Leap to Quantum*. Nov 12, 2015.

Region 10 Educational Service Center, *Critical Concepts in Biology*, Dec. 15-16, 2015.

2016

American Association of Physics Teachers, New Orleans, LA, *Corrosion Engineering in Chemistry*, Jan. 11, 2016.
FWMSH/PTRA Quantum workshop, Fort Worth, TX, *Principles of Quantum and Technology*, June 13-17, 2016
Lee College/PTRA Quantum workshop, Baytown, TX, *Principles of Quantum and Technology*, June 20-24, 2016.
Perimeter Institute for Theoretical Physics, Waterloo, Canada, facilitator and presenter, *Einstein Plus International Institute*, July 3-12, 2016.
AAPT/PTRA Leadership Institute, Sacramento, CA 1) *Elementary Chemistry* and 2) *Can you control your impulse?* July 13-16, 2016
Birdville Independent School District, Birdville, TX, *Teaching Physics Conceptually*, August 17, 2016.
Conference for the Advancement of Science Teaching (CAST), San Antonio, TX, 1) *What is a Black Hole Anyway?*, 2) *Things are a little Quarky*, 3) *30 demos in 60 minutes*, and 4) *Understanding Circuits* Nov. 10-12, 2016.
National Network for Education Renewal (NNER), Arlington, TX, *Building a Successful Science and Mathematics Teacher Preparation Program*, Nov

Current Projects funded by Math Science Partnerships, National Science Foundation and/or Teacher Quality Grants (Department of Education):

Idaho State University, STEM PD for Eastern Idaho Elementary Teachers, 2007-2017
University of Texas @ Dallas, NOYCE, 2010-2017

Evaluator for Completed Education and Professional Development Projects:

University of West Georgia, SMITE, elementary and middle school science teachers, 2013-2017
Frostburg University, TOPPS, Maryland Higher Education Commission, 2007-2015
University of Texas @ Dallas, STEP, 2010-2017
Lee College, Program for Physics Faculty, Advanced Technological Education (ATE) 2010-2015
University of Arkansas, Opportunities in Physics & Physical Science, 2008-2011
George Washington University, Acts II Institute, 2008
University of West Georgia, TIPPS, 2007-2013
North Carolina (Belmont Abbey, UNCG, UNCP, UNCC), 2008-2010
American Association of Physics Teachers, PTR, 2003-2008
Towson University MPIRE, Maryland Higher Education Commission, 2011-2013
American Association of Physics Teachers, PTR, 2003-2008

Professionally Related Publications

Non-published classroom texts and other materials

Matsler, K., Mader, J. (2012), *Comprehensive Conceptual Curriculum for Chemistry*
Matsler, K., Story, S., (2010), *Games to Prepare your Students for TAKS*.
Olenick, R., Mader, J., Matsler, K., (2009) *Comprehensive Conceptual Curriculum for Physics*. University of Dallas, Dallas, TX
Matsler, K. (July 2005) *Teaching Electricity. Manual for AAPT/PTRA*. American Association of Physics Teachers.
Matsler, K. (July 2005) *Teaching Inquiry. Manual for AAPT/PTRA*. American Association of Physics Teachers.
Matsler, K. (2004) *CASTLE: Teaching Electricity and Magnetism, A Manual for Leaders*. American Association of Physics Teachers.
Mader, J., Matsler, K., & Winn, M. (2000) *Comprehensive Conceptual Curriculum for Physics Curriculum*. American Association of Physics Teachers.
McCullough, R., Matsler, K., Borst, R. (2003, 2004). *Use of Technology in the Physics Classroom*, AAPT/PTRA.

Dissertation

Matsler, K. (2004). *Assessing the impact of sustained, comprehensive professional development on rural teachers as implemented by a national science teacher training program*. A dissertation approved by Argosy University, Sarasota, FL

Published texts and materials

Amann, Mader, Matsler, Nelson (2012). AAPT/PTRA—A Part of the Solution. *The Physics Teacher*, Vol. 49, Dec. 2011, pp. 560-563.

Olenick, Matsler, Mader. (2007) *Comprehensive Conceptual Curriculum for Physics*, University of Dallas, Department of Physics

Steinberg, M., Wainwright, C., Morse, R., Matsler, K. (2004) *Using CASTLE in the high school curriculum*. Posted on PASCO website as resource for teachers.

Olenick, R., Mader, J., Matsler, K., Winn, M. (2000). *C³P 2000+*. University of Dallas, Department of Physics.

Olenick, R. et. al (1997). *Comprehensive Conceptual Curriculum for Physics*. University of Dallas, Department of Physics and TLTG, Austin, TX

Matsler, K. (Feb 1992). *Catch the spirit—activities for Olympics*. Learning '92

Current Professional Memberships

American Association of Physics Teachers (AAPT)
American Evaluation Association (AEA)
National Science Education Leadership Association (NSELA)
National Science Teachers Association (NSTA)
Science Teachers Association of Texas (STAT)
Texas Association of Physics Teachers (TSAAPT)
Texas Science Education Leadership Association (TSELA)