Home: 2918 Alvaro Station SE Work: 1) Myers Science Education Consulting

Bolivia, NC 28422 <u>www.MyersScienceEducation.com</u>

Phone: 910-755-5382 Cell phone: 860-989-7552 2) Ingram Planetarium, Assistant Mngr.

fredmyers3p@gmail.com

Professional Mission: To enhance the lives of all learners through excellent science education

Education

Sixth Year, Administration & Supervision, Southern Connecticut State University, May, 1992

M.A. in physics, State University of New York at Stony Brook, Stony Brook, N.Y.; 1973

B.A. in physics, Magna Cum Laude, State University of New York at Geneseo, Geneseo, N.Y.; 1972 Other graduate coursework totaling 33 credits at Wesleyan, Yale, and Univ. of Southern Illinois

Primary Educational Employment Experiences

Myers Science Education Consulting, Director (7/14 – present)

Ingram Planetarium, Assistant Manager (10/15 – present)

Project AERO (American Education Reaches Out), Washington DC, Science Faculty (1/15 – 3/16)

Glastonbury Public Schools, Director of Science, K-12 (Glastonbury, CT; 7/06 – 6/15); retired

Responsible for the Science Program, including curriculum, instruction, assessment, and evaluation

Farmington High School, Science Department Chairman and Teacher (Farmington, CT; 8/92-6/06)

Teaching assignments included Physics, Honors Physics, A.P. Physics, Astronomy, Astrophysics Leadership roles: K-12 Science Coordinator (7/03-6/06) and Summer Learning Academy Coordinator (2/03-2/05);

Connecticut State Department of Education Alternate Route to Certification Program, Instructor of Physical Science Methods (6/94-5/96)

Greenwich High School, Teacher and Physics Section Head (Greenwich, CT; 9/89-6/92)

Choate Rosemary Hall, Teacher, Coach, and Physics Section Head (Wallingford, CT; 9/75-6/89)

University of New Haven, Adjunct Professor of Astronomy (New Haven, CT; 9/86-5/87)

Freeport High School, Teacher (Freeport, NY; 4/73-6/75)

Professional Leadership

President, Association of Presidential Awardees in Science Teaching (4/14 – present)

Emeritus Director, Connecticut Science Supervisors Association (9/14 – present)

Member, Connecticut Next Generation Science Advisory Council (8/14 – 6/15)

President-Elect, Association of Presidential Awardees in Science Teaching (3/12 - 3/14)

Member, Next Generation Science Standards Primary Review Committee (11/11 - 4/13)

President, Glastonbury Schools Administrators Association, (9/09 - 6/13)

Member, McGraw-Hill Publishing Science Review Committee (3/12 – 3/13)

Contributor to Conceptual Physics publications, Pearson Publishing (9/01 – present)

Member, PROM/SE 8+1 Fundamental Science Concepts Committee, Michigan St. U. (4/05 – 12/13)

Treasurer, Association of Presidential Awardees in Science Teaching (6/03-3/12)

Member, Connecticut Academic Performance Test – Science Development Committee (4/94-6/10)

Member, National Science Teachers Association High School Committee (3/06-3/09)

President, Connecticut Science Supervisors Association (6/06-6/08)

Connecticut Academy for Mathematics and Science Fellow (5/93 – present)

PIMMS Vanguard Fellow (Project to Increase Mastery in Mathematics and Science) (7/84 – present)

Co-developer and presenter of PIMMS Leadership Institute (7/99-8/01)

Science Educator in Residence, Connecticut State Department of Education (1/99-6/99)

Connecticut Association of Physics Teachers, Co-founder (1987); President (6/89-6/92)

CSDE Connecticut Academic Performance Test Science Committee (9/94-6/10)

AAPT Physics Teacher Resource Agent (6/92-8/96)

Current memberships: AAPT, NSTA, CAPT, CSTA, CSSA

Major Awards Received

CSSA Fred Scimone Award – CT Science Supervisor of the Year, 2010

PIMMS Outstanding Service Award, 2002

University of Connecticut Excellence in High School Physics Teaching Award, 1998

Connecticut Outstanding High School Science Educator Award (CSEAC), 1996

Milken Family Foundation National Educator Award, 1995

The Janet Guernsey Award for Excellence in Physics Teaching in New England (NES-AAPT), 1994

The Christa McAuliffe Fellowship, 1993

The Connecticut Science Teachers Award, 1993

Vanguard Fellows Book Award (PIMMS), 1991

Presidential Award for Excellence in Science Teaching, Connecticut recipient, 1990

Independence Foundation Chair for Excellence in Teaching, Choate Rosemary Hall, 1986

Publications

"Temporary Personal Radioactivity", The Physics Teacher, November, 2012

"A High School Science Sequence for the 21st Century", The Physics Teacher, April, 1989

Education Certificates

Connecticut: Professional Educator #C072009003707 (Physics, Earth/Space Sciences, and General Science)

Connecticut: Intermediate Administrator and Supervisor (#18603) New York: Permanent #254871892 (Physics & General Science)

Presentations and Consultations

I have made approximately 100 presentations at state, regional, and national science conferences and for various school districts. The most prominent themes have been:

- inverting the high school science sequence to physics, then chemistry, then biology
- using photography to enhance physics instruction
- the art and science of physics demonstrations
- instructional techniques for reaching all science learners

Key presenter in "8 + 1 Fundamental Science Concepts", NSF-PROM/SE Video, March, 2012 (can be viewed at www.8plus1science.org)

In addition, I served as a consultant on science education matters to several school districts in Connecticut as well as St. Louis and San Diego.

Primary References:

Paul Hewitt - Author of Conceptual Physics, St. Petersburg, FL; pghewitt@aol.com

Alan Bookman, Ph.D. - Superintendent, Glastonbury Public Schools, Glastonbury, CT;

Timothy Breslin, Ph.D. - former Principal, Farmington High School, Farmington, CT;

Matthew Dunbar - Assistant Superintendent, Glastonbury Public Schools Glastonbury, CT;

Simon Billinge, Ph.D. – Physicist, Columbia University, NY, NY; sb2896@columbia.edu

Secondary References:

Sigmund Abeles, Ph.D. - Retired Science Consultant, CT State Department of Education;

Michael Fowler, Ph.D. - Retired chemistry and physics teacher, Farmington High School;

Leon Lederman, Ph.D. - Nobel Laureate, Fermi National Laboratories, Batavia, IL;

Carlton Pennypacker, Ph.D. - Astronomer, Univ. of California, Berkeley, CA;

Harry Rosvally, Ph.D. - K-12 STEM Curriculum Director, Danbury Public Schools, CT;

William Schmidt, Ph.D. - PROM/SE, TIMSS, & Michigan State Univ., Lansing, MI;

Rosemary Tralli, Ph.D. – Ass't Superintendent, Glastonbury Public Schools, Glastonbury, CT;

Joseph Wesney, Ph.D. - Retired Science Dept. Chair, Greenwich H.S, Greenwich, CT;