

Kent A. Meyer, Ph.D.

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Researcher with experience in the fields of physical and analytical chemistry, spectroscopy, imaging, and nanoscience, seeking research and development and/or project management position

- Multi-disciplinary experimental researcher
- Two dozen scientific publications (2 cover articles)
- Extensive computational experience

Experience

Consultant

Comstock, Inc., Oak Ridge, TN, 2010-present

- Software developer for time-of-flight mass spectrometers

Junior Scientist

Fairfield Service Group, Knoxville, TN, 2010

- Computational modeling for process industrial instrumentation

Postdoctoral Research Associate

Oak Ridge Associated Universities, Oak Ridge, TN, 2004-2009

- Groundbreaking research in nanoscience at Oak Ridge National Laboratory
- Multiple projects developed in tandem

Education

Ph.D., Chemistry

University of Wisconsin-Madison, 2004

Thesis: "Frequency-scanned Ultrafast Spectroscopic Techniques Applied to Infrared Four-wave Mixing Spectroscopy"

- Built state-of-the-art laser instrument
- Studied homogeneous catalyst
- Independent work
- Data analysis and theoretical derivation

B.S., Chemistry

Pennsylvania State University, 1998

Minor in Physics

GPA 3.93/4.00, *magna cum laude*

- Undergraduate research in physical organic chemistry
- Tutor, molecular modeling lab assistant

Skills

- Spectroscopy (FT-IR, Raman, spectrofluorimetry, UV-VIS, time-resolved, pump-probe, non-linear optics, ultrafast)
- Atomic Force Microscopy (AFM) / Near-field Scanning Optical Microscopy (NSOM)
- Microscopy and imaging
- Mass spectrometry (TOF) and ultrahigh vacuum
- Quantum dots and nanoplasmonics
- Computational modeling and data analysis (LabVIEW, Matlab, Fortran)
- Practical knowledge of: mechanical design (CAD, machining, vibrational dampening), fiber optics, laser maintenance, electron microscopy
- Practical organic (Schlenk) and inorganic (zone furnace, sol gel) synthetic research experience

Selected Publications

Meyer, K.A.; Polemi, A.; Shuford, K.L.; et al. *Nanotechnology* **2010**, *21*, 415701.

Meyer, K.A.; Ng, K.; et al. *Appl. Spectrosc.* **2010**, *64*, 1 (w/ cover).

Shuford, K.L.; Meyer, K.A.; et al. *J. Phys. Chem. A* **2009**, *113*, 4009.

Bradshaw, J.A.; Ovchinnikova, O.; Meyer, K.A.; Goeringer, D.E. *Rapid Comm. Mass Spec.* **2009**, *23*, 3781.

Meyer, K.A.; Ovchinnikova, O.; Ng, K.; Goeringer, D.E. *Rev. Sci. Instrum.* **2008**, *77*, 123710.

Meyer, K.A.; Thompson, D.E.; Wright, J.C. *J. Phys. Chem. A* **2004**, *108*, 11485 (w/ cover).

Meyer, K.A.; Besemann, D.M.; Wright, J.C. *Chem. Phys. Lett.* **2003**, *381*, 642.