Robert Cooper

Education – degree, discipline, institution, year

- Ph.D., Physics, University of Michigan, Ann Arbor, MI, 2008
- M.S., Physics, University of Michigan, Ann Arbor, MI, 2005
- B.S., Physics, University of Toledo, Toledo, OH, 2002
- B.S., Mathematics, University of Toledo, Toledo, OH, 2002

Academic experience – institution, rank, title (chair, coordinator, etc. if appropriate), when (ex. 2002-2007), full time or part time

• New Mexico State University (NMSU), Department of Physics, Assistant Professor, 2015 – present, full time

Non-academic experience – *company or entity, title, brief description of position, when (ex. 2008-2012), full time or part time*

- Sandia National Laboratories, Senior Member of the Technical Staff, 2009-2011, full time
- Indiana University, Department of Physics, Center for Exploration of Energy and Matter, Postdoctoral Scholar, 2011-2015, full time
- Stanford University, Department of Physics, Postdoctoral Scholar, 2008-2009, full time

Certifications or professional registrations

• n.a.

Current membership in professional organizations

• American Physical Society (APS) in Division of Particles and Fields (DPF), Division of Nuclear Physics (DNP), 4-Corners Section (4-C)

Honors and awards

- Faculty Travel Grant for travel to NUFACT in Uppsala, Sweden, New Mexico State University (NMSU), 2017
- MiniGrant for development of low-cost FPGA electronics, NMSU, 2015
- U.S. Patent 8,338,975. *Method for Improving the Angular Resolution of a Neutron Scatter Camera*, Sandia National Laboratories, 2012

Service activities (within and outside of the institution)

- Recruitment Committee, met with students at APS DNP and APS 4-C section meetings as well as meet with prospective students, 2015-present
- Grand Awards Judge in Physics, Intel International Science and Engineering Fair (ISEF), 2016-present
- Advisory Board and Judge, Northwest Ohio Science and Engineering Fair (NWOSEF), 1999-present
- Reviewer, Department of Energy (DOE) Office of Science Graduate Student Research (SCGSR), 2016
- Question Writer, Oak Ridge Associated Universities (ORAU) National Science Bowl (NSB), 2017

• Abstract Reviewer, American Physical Society (APS) Division of Nuclear Physics (DNP) Conference Experiences for Undergraduates (CEU), 2017

Briefly list the most important publications and presentations from the past five years – title, coauthors if any, where published and/or presented, date of publication or presentation

- D. Akimov, et al. [COHERENT collaboration], "Observation of Coherent Elastic Neutrino-Nucleus Scattering." *Science* **357**, 1123 (2017).
- A.A. Aguilar-Arevalo, et al. [MiniBooNE-DM collaboration], "Dark Matter Search in Proton Beam Dump with MiniBooNE." *Physical Review Letters* **118**, 221803 (2017).
- M.J. Bales, R. Alarcon, C.D. Bass, E.J. Beise, H. Breuer, J. Byrne, T.E. Chupp, K.J. Coakley, R.L. Cooper, M.S. Dewey, S. Gardner, T.R. Gentile, D. He, H.P. Mumm, J.S. Nico, B. O'Neill, A.K. Thompson, F.E. Wietfeldt, "Precision Measurement of the Radiative β Decay Mode of the Free Neutron." *Physical Review Letters* 116, 242501 (2016).
- S.J. Brice, R.L. Cooper, F. DeJongh, A. Empl, L.M. Garrison, A. Hime, E. Hungerford, T. Kobilarcik, B. Loer, C. Mariani, M. Mocko, G. Muhrer, R. Pattie, Z. Pavlovic, E. Ramberg, K. Scholberg, R. Tayloe, R.T. Thornton, J. Yoo, A. Young. "A New Method for Measuring Coherent Elastic Neutrino-Nucleus Scattering at an Off-Axis High-Energy Neutrino Beam Target." *Physical Review* **D 89**, 072004 (2014).
- T.E. Chupp, R.L. Cooper, K.P. Coulter, S.J. Freedman, B.K. Fujikawa, A. Garcia, G.L. Jones, H.P. Mumm, J.S. Nico, A.K. Thompson, C.A. Trull, F.E. Wietfeldt, and J.F. Wilkerson. "Search for a T-Odd, P-Even Triple Correlation in Neutron Decay." *Physical Review* C 86, 035505 (2012).
- Invited Talk, "Dark Matter Search in the MiniBooNE Proton Beam Dump Experiment" at *19th International Workshop on Neutrinos from Accelerators (NUFACT)*, Uppsala University, Uppsala, Sweden, September 26, 2017.
- Invited Talk, "Dark Photon/Dark Matter Measurements with CEvNS Detectors" at *New Extensions of Coherent scattering and other Lepton Interactions for new Physics SEarches (vECLIPSE)*, University of Tennessee, Knoxville, TN, August 22, 2017.
- Invited Talk, "Current and Future Results from MiniBooNE-DM" at U.S. Cosmic Visions: New Ideas in Dark Matter, University of Maryland, College Park, MD, March 23, 2017
- Invited Talk, "The CAPTAIN Low-Energy Physics Program" at *11th International Workshop on Neutrino-Nucleus Scattering in the Few-GeV Region (NuInt17)*, University of Toronto, Toronto, Ontario, June 30, 2017.
- Invited Talk "SBN Future" at *Dark Sectors Workshop*, SLAC National Accelerator Laboratory, Stanford, CA, April 28, 2016.

Briefly list the most recent professional development activities

- Attendee and participant at the annual 4-Corners Section meetings of the American Physical Society, 2016-present
- Attendee and participant at the annual APS Division of Nuclear Physics meeting, 2011present
- Participant at Brookhaven National Laboratory Cold Electronics Mini-Summer School, Brookhaven, NY, July 18-21, 2016