**Anthony E. Kelly**

1804 Cranberry Ln, Reston VA 20191; akelly1@gmu.edu

**Professional Preparation**

Stanford University Psychological Studies in Education Ph.D. 1988

PhD minor: Psychology

California State University Special Major [Rhetoric/psychotherapy] M.A. 1983

California State University Master of Arts in Psychology M.A. 1983

California State University Master of Arts in Education M.A. 1984

St. Patrick’s College, Dublin Bachelors in Education, with honors B.Ed. 1979

**Appointments**

2018+ Associate Dean for Research, George Mason University; College of Education and Human Development

2014-18 Senior Advisor, NSF-EHR

Spring 2011 Senior Adviser, Education Research, Office of the Secretary, US Department of Education, Washington, DC

2000+           Professor of Educational Psychology, George Mason University

2006-7             Program Manager, NSF-Education and Human Resources Directorate

1997-2000 Program Manager, NSF- Education and Human Resources Directorate

1988-2000       Assistant and Associate Professor of Cognitive Science, Rutgers

University

***NSF-related activities***

***Mentor***for NSF’s *Harnessing the Data Revolution* Ideas Lab, May 2019, Alexandria, VA.

***NSF Senior Advisor*** (2014 – 2018).

Office of the Assistant Direction (OAD) Education and Human Resources (EHR) directorate. Administrative responsibilities include responding to directives from Congress, and the Office of Management and Budget; requests from the White House Office of Science and Technology Policy, the NSF Director, the science and engineering directorates at NSF, and the EHR Assistant Director; liaison to many groups and associations, including the American Educational Research Association, the American Psychological Association, and AAAS; capacity-building outreach to institutes of higher education (including HBCUs) and industry partners; international outreach on STEM policy and STEM education.

Review of all program announcements, solicitations, *Dear Colleague Letters*, and other funding mechanisms for the field.

***NSF Program Officer*** (1997-2000; 2005-2006).

NSF Education and Human Resources directorate, with approximately $300 million in awards under management: Worked with scientists within and across Directorates, organized review panels, made and managed awards for various research programs, declined proposals. Conducted negotiation with those recommended for funding, and conducted outreach and capacity building with PIs whose proposals were declined.

**National Service**

White House Office of Science and Technology Policy

White House *BRAIN* Initiative/NSF *Understanding the Brain* initiative

Served as the Education and Human Resources (EHR) Member (2014 – 2017) of the NSF BRAIN/*Understanding the Brain* Committee [part of the White House BRAIN initiative],http://www.nsf.gov/news/special\_reports/brain/

Represented NSF at the 2015 White House funders’ meeting on neuroscience as part of the President’s BRAIN initiative.

Represented NSF at the 2015 White House meeting on *educational neuroscience* as part of the President’s BRAIN initiative. Participated in a break-out session with federal and philanthropic groups that spurred the idea of using the resources of citizen science to advance neuroscience. Indirectly, this session led to the development of a crowd-sourced game (<https://www.mozak.science/landing>), an exhibit at the US President’s *Frontier* conference (http://www.frontiersconference.org/) and a journal article, (<http://www.sciencedirect.com/science/article/pii/S0896627316307954>),

White House initiative on the Future of Education R&D and Digital Learning

Presented at the White House Symposium on the Future of Education R&D and Digital Learning (2016): *Smart and connected communities and their potential role in STEM education*. Washington, DC

White House initiative on Next Generation Learning

Co-organized for NSF the 2016 conference on *Active Learning in STEM Education* at the request of the White House/OSTP. <http://nsfactivelearning16.org/>

Co-organized for NSF the 2015 conference *Next Generation STEM Learning for All* (November 9, 2015) at the request of the White House/OSTP [http://nsfstemforum.edc.org/].

Presented at the 2015 White House Symposium on "Next Generation High Schools” (November 11): *Investing in STEM education research*.

White House initiative on Measuring Noncognitive Skills

Represented NSF at the White House meeting on, “*Hard-to-measure skills: Cognitive, intrapersonal and interpersonal competencies*” Washington, DC. (2014).

Represented NSF at the White House funders’ meeting on "*Advancing a research agenda for hard-to-measure 21st Century competencies*,” Washington, DC. (2015).

White House Initiative on Smart Cities

Served on the NSF Committeeon *Smart and Connected Communities* (S&CC). The S&CC was the NSF response to the 2015 White House initiative on smart cities (September, 2015). Attended a conference on S&CC in December 2015, in DC; and presented at the 2016 S&CC conference at the University of Washington. As a result of these efforts, NSF released the *Smart and Connected Communities* program announcement in 2016: https://www.nsf.gov/pubs/2016/nsf16610/nsf16610.htm

Federal and National Science Foundation Service

Networking and Informational Technology Research and Development (NITRD)

The multiagency NITRD Program seeks to provide the research and development (R&D) foundations for assuring continued U.S. technological leadership and meeting the needs of the Federal Government for advanced information technologies. The NITRD Program also seeks to accelerate development and deployment of advanced information technologies in order to maintain world leadership in science and engineering, enhance national defense and national and homeland security, improve U.S. productivity and economic competitiveness, protect the environment, and improve the health, education, and quality of life of all Americans. <https://www.nitrd.gov/>

Represented NSF (2014- 2016) on the NITRD Cyber Security and Information Assurance Research and Development Senior Steering Group (CSIA R&D SSG). This NITRD team wrote the 2016 *National Privacy Research Strategy* (NPRS). [https://www.nitrd.gov/Publications/PublicationDetail.aspx?pubid=65]

Represent NSF(2016-present) on the NITRD *implementation* group for the *National Privacy Research Strategy*.

As part of the NITRD-NPRS implementation work, this workshop is planned:

Kelly, A. E., & Garfinkel, S. (2017). *Special Panel: Data Privacy for Pervasive Technologies Related to Assistive Environments*. Workshop at the PETRA 17 conference, Greece. [http://www.petrae.org/workshops/DP-PETRA.html]

US Department of State

Presented (2017) US Department of State: *Funding opportunities for women in STEM*. Washington, DC.

National Strategic Computing Initiative (NSCI)

Represent EHR (2014 – present) on the NSF *National Computing Research* Initiative (NSCI) [committee formed by Presidential Executive Order (https://www.whitehouse.gov/the-press-office/2015/07/29/executive-order-creating-national-strategic-computing-initiative]

NSF Public Access Working Group

Represent EHR (2014 – present) on the NSF *Public Access Working Group* http://www.nsf.gov/pubs/2015/nsf15052/nsf15052.pdf and https://www.nsf.gov/pubs/2016/nsf16009/nsf16009.jsp

NSF Office of International Science and Engineering (OISE)

Represent EHR (2015- present) on the steering committee for the NSF *Office of International Science and Engineering* (OISE): NSF practices and international research policy.

NSF Director’s “Big Ideas” initiative

Represent EHR (2016- present) on the NSF Director’s Big Idea on *Harnessing Data for 21st Century Science and Engineering* (<https://www.nsf.gov/about/congress/reports/nsf_big_ideas.pdf>)

NSF Directorate for Education and Human Resources Advisory Committee (EHR-AC)

Organize for the EHR (2014 – present) the Directorate for Education and Human Resources Advisory Board Meetings: Fall, 2014; Spring 2015; Fall 2015; Spring 2016; Fall 2016; Spring 2017. <https://www.nsf.gov/ehr/advisory_meetings.jsp>.

NSF Policy on Graduate Education

Co-chaired (Fall 2014) the NSF-wide Graduate Education Strategic Planning Committee, which led to the *NSF Strategic Framework for Investments in Graduate Education* [https://www.nsf.gov/pubs/2016/nsf16074/nsf16074.pdf].

Co-chaired (Fall 2014) the Federal Coordination in STEM Education Interagency Working (FC-STEM) Group on Graduate Education.

***Research Funding—over $3,600,000\****

***Grants*** *– continuous NSF funding since 1994, except when employed at NSF or the US Department of Education*

Kelly, A. E. (2016-2017). NSF Senior Advisor (*IPA appointment*). National Science Foundation. \*Note: *IPA appointments act as grants to the institution*.

Kelly, A. E. (2015-2016). NSF Senior Advisor (*IPA appointment*). National Science Foundation.

Kelly, A. E. (2014-2015). NSF Senior Advisor (*IPA appointment*).. National Science Foundation.

Kelly, A. E. (2014). *Human subjects’ protections in the digital age*. National Science Foundation ($279,000).

Kelly, A. E., & Seppala (2013). *BCC: Organizing Multi-disciplinary Communities to Conduct Data-intensive Research on Education and Learning*. National Science Foundation ($538,403).

Kelly, A. E., & Seppala (2012). [*Advancing an Online Project in the Assessment and Effective Teaching of Calculus*](javascript:void(0))*.*  National Science Foundation, ($227,213.00).

Kelly, A. E (2010). “*Planning Conferences on Longitudinal Study analysis of High School Algebra and College Mathematics*”. National Science Foundation (#[1104899](http://nsf.gov/awardsearch/showAward.do?AwardNumber=1104899)) ($163,187). with M Hjalmarson.

Kelly, A. E (2011). Senior Advisor for Research, Office of the Secretary, US Department of Education. ($150,000).

Kelly, A. E. (2009). *NSF RAPID: Advocating for an Inventive and Transformative Recovery in National STEM Education.* National Science Foundation (#[0947782](https://www.fastlane-beta.nsf.gov/researchadmin/viewProposalStatusDetails.do?propId=0947782&performOrg=George%20Mason%20University)). ($168,593).

Kelly, A. E. (2008). “*Distributed Learning and Collaboration (DLAC)*”: *STEM issues bearing on sustainability and megacities*. National Science Foundation (# [0904173](https://www.fastlane-beta.nsf.gov/researchadmin/viewProposalStatusDetails.do?propId=0904173&performOrg=George%20Mason%20University)) ($41,890).

Kelly, A. E. (2009). Fulbright Scholars Program: New Century Scholar (2009-2010). *The University as Innovation Driver and Knowledge Center*. ($30,000).

Kelly, A. E. (2008). *Identifying the learning needs of megacities.* Vice President For Research award, George Mason University ($8000).

Kelly, A.E., & Bannan-Ritland, B. (2008). *Modeling Cyber-Enabled Learning and Teaching:   Addressing Methodological and Measurement Issues*. National Science Foundation (# 0816216 ) ($200,000).

Kelly, A. E. (2004). *ROLE: Understanding and Describing the Design Experiment: Creativity Extension* to a prior Kelly & Lesh, National Science Foundation award ([0107008](http://nsf.gov/awardsearch/showAward.do?AwardNumber=0107008)). ($324,982).

Kelly, A. E. (Director), & Lesh, R. (Co-director). (2001). *Understanding and Explicating the Design Experiment* ($786,397). National Science Foundation # [0107008](http://nsf.gov/awardsearch/showAward.do?AwardNumber=0107008).

Kelly, A. E. (1997). *Understanding and capitalizing upon for education the new initiative in Learning and Intelligent Systems at the National Science Foundation*, NSF grant No. REC-9712517, $20,000.

Kelly, A. E. (Director), & Lesh, R. (Co-director). (1994). *Methodologies for research in learning and teaching science and mathematics*. National Science Foundation, RED-9450510: $149,989.

***Selected Refereed Publications***

Kelly, A. E. (2017). Is learning data in the right shape? *Journal of Learning Analytics*, *4*(2), 154–159. <http://dx.doi.org/10.18608/jla.2017.42.12>

Kelly, A. E., & Seppala, M.  (2016). Changing policies concerning student privacy and ethics in online education.  International Journal of Information and Education Technology, 6(8). 652-655.

Kelly, A.E. (2015). Confidentiality, privacy, and Institutional Review Boards. Presidential Column, *APS Observer*.

Kelly, A. E., & Leavy, A. (2013). The design space of student learning: Who is accountable and accountable for what? Special Issue: Research in Education Related to Teacher Accountability.  *Irish Educational Studies*, *32*(1), 1-6.C

Kelly, A. E. (2013). Theme guest editor. Special Issue: Research in Education Related to Teacher Accountability.  *Irish Educational Studies*, *32*(1).

Kelly, A. E. (2011). Can cognitive neuroscience ground a science of learning? *Educational Philosophy and Theory*. Theme issue on educational neuroscience. [43(1),](http://onlinelibrary.wiley.com/doi/10.1111/epat.2011.43.issue-1/issuetoc) 17–23.

Kelly, A. E. & Yin, R. (2007). Strengthening structured abstracts for educational research. *Educational Researcher*. *36*(3),133-138. Also appears in, "Selecting Research Methods" edited by W. Paul Vogt (Illinois State University) (2008) as part of the SAGE *Benchmark in Social Research Methods* series.

Kelly, A. E. (2004). Design research in education: Yes, but is it methodological? *Journal of the Learning Sciences*, *13*(1), 115-128.

Kelly, A. E. & Sloane, F. C. (2003). Educational research and the problems of practice, *Irish Educational Studies*, *22*(1), 29-40.

Sloane, F. C., Kelly, A. E. (2003). Issues in high stakes testing programs. *Theory into Practice*, *42*(1).

Zaritksy, R., Kelly, A. E., Flowers, W., Rogers, E., & O’Neill, P. (2003). Clinical design sciences: A view from sister design efforts. *Educational Researcher*, *32*(1), 32-34.

Kelly, A. E., & Lesh, R.  (2002).  Understanding and explicating the design experiment methodology.  *Building Research Capacity [UK]*, *3*, 1-3.

Berz, W. L. & Kelly, A. E. (1998). Perceptions of more complete musical compositions: An exploratory study. *Psychology of Music*, *26*, 175-185.

Sabelli, N., & Kelly, A. E.  (1998). The NSF Learning and Intelligent Systems Research Initiative: Implications for educational research and practice. *Educational Technology*, *38*(2), 42-46.

Lesh, R., & Kelly, A. E. (1997). Teachers’ evolving conceptions of one-to-one tutoring: A three-tiered teaching experiment. *Journal for Research in Mathematics Education*, *28*(4), 398-430.

Birenbaum, M., & Kelly, A. E., & Levi-Keren, M.  (1994).  Stimulus features and sex differences in mental rotation test performance.  *Intelligence*, *19*(1), 51-64.

Birenbaum. M., Kelly, A. E., & Tatsuoka, K. K., & Gutvirtz, Y.  (1994).  Attribute-mastery patterns from rule space as the basis for student models in algebra.  *International Journal of Man-Machine Studies, 40*, 497-508.

Birenbaum, M., Kelly, A. E., & Tatsuoka, K. K.  (1993).  Diagnosing knowledge states in algebra using the rule space model.  *Journal for Research in Mathematics Education*, *24*(5), 442-459.

Kelly, A. E., Sleeman, D., & Gilhooly, K. J. (1993). Artificial intelligence in education: using state space search and heuristics in mathematics instruction. *International Journal of Man-Machine Studies*, *38*, 725-746.

Kelly, A. E. & Spear, P. S. (1991). Intraprogram synopses for children’s comprehension of television content. *Journal of Experimental Child Psychology*, *52*, 87-98.

Blando, J. A., Kelly, A. E., Schneider, B, & Sleeman, D.  (1989).  Analyzing and modeling arithmetic errors and error types.  *Journal for Research in Mathematics Education*, *20*(3), 301-308.

Sleeman, D., Kelly, A. E., Martinak, R., Ward, R., & Moore, J. (1989). Studies of diagnosis and remediation with high school algebra students. *Cognitive Science*, *13*(4), 551-568.

### **Books, Chapters and Monographs**

Kelly, A. E. (2014). Design-based Research in Engineering Education: Current State and Next Steps. In A. Johri & B. Olds (Eds). *Cambridge Handbook of Engineering Education Research*.

Sloane, F. C., Helding, B., & Kelly, A. E. (2014). 23 Longitudinal Analysis and Interrupted Time Series Designs. *Handbook of Design Research Methods in Education: Innovations in Science, Technology, Engineering, and Mathematics Learning and Teaching*, 449.

Toumey, C., Besley, J., Blanchard, M., Brown, M., Cobb, M., Ecklund, E. H., Glass, M., Guterbock, T., Kelly, A. E., & Lewenstein, B. (2013). Rethinking Public Knowledge of Science: The Process of Crafting the Concept of Science in the Service of Citizens & Consumers. In S. Locke and L. Allibone (Eds.), *Knowledges and Publics: Beyond Deficit, Engagement & Transfer*. Newcastle on Tyne: Cambridge Scholars Publishing

Kelly, A. E. (2013/2009). When is design research appropriate? In T. Plomb & N. Nieveen (Eds.), *Introduction to Educational Design Research* (pp. 73-88), Revised and updated: <http://international.slo.nl/edr/>.

Kelly, A. E. (2012). *Developing validity and reliability criteria for assessments in innovation and design research studies*” in David Yun Dai (Ed.), Design Research on Learning and Thinking in Educational Settings: Enhancing Intellectual Growth and Functioning. New York: Taylor & Francis.

Tatsuoka, K., Kelly, A. E., Tatsuoka, C., & Dean, M. (2011). Cognitive diagnostic method: Rule space, Q-matrix theory, and applications. In C. Secolsky & D. B. Denison (Eds.), *Handbook on measurement, assessment, and evaluation in higher education*. New York, NY: Routledge.

# Sloane, F., Helding, B., Kelly, A. E. (2008). Modeling student development in science education. In K. Tobin, & W-M Roth (Eds.) *World of Science Education: Handbook of Research in North America* (Rotterdam: Sense Publishers).

Kelly, A. E. (2008). Brain research and education: Potential implications for pedagogy. In *Education, sciences cognitives et neurosciences*. Paris: Presses Universitaries de France.

# Kelly, A. E., Baek, J., Lesh, R. (2008). (Eds.), *Handbook of design research methods in education:  Innovations in science, technology, mathematics and engineering*. New York: Routledge.

# Kelly, A. E., Baek, J., Lesh, R., & Bannan-Ritland, B. (2008). Enabling innovations in education and systematizing their impact. In A. E. Kelly, R. Lesh, and J. Baek (Eds.), *Handbook of design research methods in education:  Innovations in science, technology, mathematics and engineering*. New York: Routledge.

Lesh, R., Kelly, A. E., & Yoon, C. (2008). Multi-tier design experiments in mathematics, science and technology education. In A. E. Kelly, R. Lesh, and J. Baek (Eds.), *Handbook of design research methods in education:  Innovations in science, technology, mathematics and engineering*. New York: Routledge.

Sloane, F., Helding, B., & Kelly, A. E. (2008). Longitudinal analysis and interrupted time series designs: Opportunities for the practice of design research. In A. E. Kelly, R. Lesh, and J. Baek (Eds.), *Handbook of design research methods in education:  Innovations in science, technology, mathematics and engineering*. New York: Routledge.

Sloane, F., & Kelly, A. E. (2008). Design research and the study of change: Conceptualizing individual growth in designed settings. In A. E. Kelly, R. Lesh, and J. Baek (Eds.), *Handbook of design research methods in education:  Innovations in science, technology, mathematics and engineering*. New York: Routledge.

Kelly, A. E. (2007). *Quality criteria for design research*. In Jan van den Akker, Koeno Gravemeijer, Susan McKenney, Nienke Nieveen (Eds.). *Educational design Research*: (107-118). New York: Routledge.

Kelly, A. E. (2002). *Understanding the brain. Toward a new learning science*. Paris. OECD. Section: “Cognitive Neuroscience Meets Education” (co-author C. Ball).

Kelly, A. E., & Lesh, R. (Eds.) (2000). *Handbook of research design in mathematics and science education*. Mahwah, NJ: Erlbaum. Edited Book.

***Selected Presentations***

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| Kelly, A. E. (2019). *Some Funding Sources for Cybersecurity Research and Development.* Workshop on Interdisciplinary and Collaborative Research in  Cybersecurity. Columbus State University.  Kelly, A. E. (2019). *Research and development opportunities for technology for first responders*. SCITI Labs Program George Mason University, led by CIT via the Department of Homeland Security, Science & Technology Directorate.    Kelly, A. E. (2018). *Exploring Different Models in Mathematics Assessment*. Sultan Qaboos University, Oman.  Kelly, A. E. (2017). *Panelist for the Federal Initiatives to Incentivize Data Sharing and Research Replication*. AERA-NSF Data Sharing and Research Transparency Workshop, Washington, DC. July 25-27.  Kelly, A. E., and Garfinkle. S. (2017). *Data privacy for pervasive technologies related to assistive environments.* Special panel: The 10th ACM International Conference on PErvasive Technologies Related to Assistive Environments. PETRA 2017.  Kelly, A. E. (2016a). *Developing and validating indicators for teachers' science and mathematics content knowledge for teaching*. Symposium discussant at the Annual Meeting of the American Educational Research Association, Washington, DC. |
| Kelly, A. E. (2016b). *Smart and connected communities and education*. Paper presented at the Applied Research in Immersive Environments for Learning SIG Workshop. National Science Foundation: The Future of Data-Intensive Research in Education at the Annual Meeting of the American Educational Research Association, Washington, DC. |
| Kelly, A. E (2016c). *Funding opportunities for educational technology*. Technology as an Agent of Change in Teaching and Learning SIG Business Meeting, Keynote speaker, Annual Meeting of the American Educational Research Association, Washington, DC. |
| Kelly, A. E. (2016d). *The role of education in the design of effective smart and connected communities.* Speaker and moderator at the NSF Visioning Workshop on Smart and Connected Communities Research and Education, University of Washington. |
| Kelly, A. E. (2016e). Co-organized the workshop, and presented on the topic of data privacy at the NSF workshop on data-intensive research in education. Report: <http://cra.org/cra-releases-report-on-data-intensive-research-in-education/> |

Kelly, A. E. (2015a). The rise of privacy concerns in educational and social science research. Keynote presentation at *International Conference on Educational and Information Technology*, Florence, Italy.

Kelly, A. E. (2015b). Funding opportunities for data-intensive research in learning. *Cyberlearning 2015: Connect, Collaborate, and Create the Future*. Arlington, VA

Kelly, A. E. (2015c). Funding opportunities for the Maker movement. Presentation at the *2015 NSF Maker Summit*, Arlington, VA.

Kelly, A. E. (2014a). *Some Funding Directions in Educational Data Analysis*. AERA Grants Program 2014 Fall Research Conference, Washington, DC.

Kelly, A. E. (2014b). What works: A look at the evidence. Presentation at the *2nd Annual Scientific American STEM Summit*, August 5, New York. The event coincided with the publication of *Scientific American* (2014), 311 (2) [article by Kantrowitz, B.] for which I was interviewed.

Kelly, A. E. (2012a). *New approaches to validity judgments for emergent research methods*. Paper presentation. American Educational Research Association Annual Meeting.

Kelly, A. E. (2012b). *The design of stimulus tasks to promote interdisciplinary research in brain-based research in mathematics*. Paper presentation. American Educational Research Association Annual Meeting.

Kelly, A. E. (2011a). [*The importance of task design and analysis for sophisticated statistical modeling of learning*](http://convention2.allacademic.com/one/aera/aera11/index.php?click_key=1&cmd=Multi+Search+Search+Load+Session&session_id=118282&PHPSESSID=bed1767c69310bb2de7912d0facd44dc). Paper presentation. American Educational Research Association Annual Meeting. New Orleans, LA.

Kelly, A. E. (2011b). *Key features of design-based research.* Keynote address at the 16th International Conference on Education 2011, University of Brunei Darussalam. (May 23-25).

Kelly, A. E. (2010a). *Nurturing entrepreneurs: Inspiration, need, resources and metrics*. Presentation at the Fulbright Regional Meeting, “Managing and Measuring the Impact of University Research Parks and Incubators: The Rio Experience,” Rio de Janeiro.

Kelly, A. E. (2010b). *Causation, agency, and inventor’s irritation*. Keynote Address: Response to Intervention Leadership Forum hosted by the National Center for Learning Disabilities, Washington, DC. December 8. http://rtinetwork.org/professional/rti-leadership-forum.

Kelly, A. E. (2010c). [*Cyber-enabled learning and education: An overview*](http://convention2.allacademic.com/one/aera/aera10/index.php?click_key=1&cmd=Multi+Search+Search+Load+Publication&publication_id=393369&PHPSESSID=8b63c8bd751a3ffe753759ba5584b419)*.* American Educational Research Association Annual Meeting. Denver, CO.

Kelly, A. E. (2010d). [*Complex ecology in teacher communities: Designing for community development*](http://convention2.allacademic.com/one/aera/aera10/index.php?click_key=1&cmd=Multi+Search+Search+Load+Session&session_id=106330&PHPSESSID=8b63c8bd751a3ffe753759ba5584b419)*.* American Educational Research Association Annual Meeting, Discussant. Denver, CO. Discussant.

Kelly, A. E. (2010e). *Using psychometrics to advance assessment in mathematics education*. Symposium Discussant. National Council of Teachers of Mathematics Annual Meeting, San Diego, CA.

Kelly, A. E. (2010f). *Advocating for an inventive and transformative recovery in national STEM education*. NSF SciSIP grantees workshop: Toward a community of practice. Washington, DC, October 19.

Kelly, A. E. (2009a). [*Multilevel insights into teacher learning: Case studies to district-wide reform*](http://convention2.allacademic.com/one/aera/aera09/index.php?click_key=1&cmd=Multi+Search+Search+Load+Session&session_id=64436&PHPSESSID=ca35c99346ba01f10781865fb2cd07d7). American Educational Research Association Annual Meeting, Discussant. San Diego, CA.

Kelly, A. E. (2009b). [*PDC34: Design research methods in STEM education*](http://convention2.allacademic.com/one/aera/aera09/index.php?click_key=1&cmd=Multi+Search+Search+Load+Session&session_id=65202&PHPSESSID=ca35c99346ba01f10781865fb2cd07d7)

. American Educational Research Association Annual Meeting, Professional Development Workshop Leader. San Diego, CA.

Kelly, A. E. (2009c). [*Reflections on the U.S. National Mathematics Panel Report*](http://convention2.allacademic.com/one/aera/aera09/index.php?click_key=1&cmd=Multi+Search+Search+Load+Session&session_id=63354&PHPSESSID=ca35c99346ba01f10781865fb2cd07d7). American Educational Research Association Annual Meeting, Symposium Organizer and Chair. San Diego, CA.

Kelly, A. E. (2009d). [*Reflections on the U.S. National Mathematics Panel Report*](http://convention2.allacademic.com/one/aera/aera09/index.php?click_key=1&cmd=Multi+Search+Search+Load+Session&session_id=63354&PHPSESSID=ca35c99346ba01f10781865fb2cd07d7). National Council of Teachers of Mathematics, Annual Meeting, Symposium Organizer and Chair. Washington, DC

Kelly, A. E. (2009e). *The role of randomized controlled trials in generating evidence in education.* Invited presentation, San Diego State University. San Diego, CA.

Kelly, A. E. & Kim, T. J. (2009f). *Discovering the learning needs of megacities.*Paper presented at the annual meeting of the Association of Collegiate Schools of Planning.

***Scholarly Editing and Reviewing***

*Journal Special Issue Editing:*

Kelly, A. E. (2019, in progress). Invited editor, theme issue on Education and the Climate Crisis. *Irish Journal of Educational Studies*.

Kelly, A. E. (2012). *Irish Educational Studies*. Theme: Research in Education Related to Teacher Accountability. Theme co-editor.

Kelly, A. E. (Ed.) (2008). *Educational Researcher.* Reflections on the US National Mathematics Advisory Panel Report. *37(9)*. Theme editor.

Kelly, A.E. (Ed.) (2003). *Educational Researcher*. The role of design in research. *32*(1), 3-4. Theme editor.

*Journal Editing and Reviewing*

I am attending a meeting at Mary Immaculate College in Limerick, Ireland, March 12 2019, to design a special issues of on emerging international issues in mathematics education for *Irish Educational Studies.*

Editorial Board Member, *Irish Educational Studies* (current); *Educational Psychologist* (former), *Educational Researcher* (former), *Educational Technology Research and Development* (former), *Frontiers in Psychology* (former).

Reviewer for *Educational Researcher, Journal for Research in Mathematics Education, Journal of the Learning Sciences, Educational Psychologist, Educational Technology Research and Development,* [*Educational Evaluation and Policy Analysis*](http://www.aera.net/publications/?id=316)*.*