

## 2016-17 DR K–12 New Awards

*This list contains grants awarded fall 2016 – summer 2017.*

### 2016

Award Number	Project	PI	Institution
1652752	<a href="#">CAREER: Analyzing the Nexus between Advantaged Social Positioning and Science Identity Development Among English Language Learners</a>	Shakhnoza Kayumova	University of Massachusetts Dartmouth
1652513	<a href="#">CAREER: Designing and Enacting Mathematically Captivating Learning Experiences for High School Mathematics</a>	Leslie Dietiker	Trustees of Boston University
1651571	<a href="#">CAREER: Investigating Changes in Students' Prior Mathematical Reasoning: An Exploration of Backward Transfer Effects in School Algebra</a>	Hartmut Hohensee	University of Delaware
1644471	<a href="#">Perceptual and Implementation Strategies for Knowledge Acquisition of Digital Tactile Graphics for Blind and Visually Impaired Students (Collaborative Research: Giudice)</a>	Nicholas Giudice	University of Maine
1644538	<a href="#">Perceptual and Implementation Strategies for Knowledge Acquisition of Digital Tactile Graphics for Blind and Visually Impaired Students (Collaborative Research: Gorlewicz)</a>	Jenna Gorlewicz	Saint Louis University
1644476	<a href="#">Perceptual and Implementation Strategies for Knowledge Acquisition of Digital Tactile Graphics for Blind and Visually Impaired Students (Collaborative Research: Smith)</a>	Derrick Smith	University of Alabama in Huntsville

Award Number	Project	PI	Institution
1644491	<a href="#">Perceptual and Implementation Strategies for Knowledge Acquisition of Digital Tactile Graphics for Blind and Visually Impaired Students (Collaborative Research: Stefik)</a>	Andreas Stefik	University of Nevada, Las Vegas
1620914	<a href="#">The Mathematical Knowledge for Teaching Measures: Refreshing the Item Pool</a>	Heather Hill	Harvard University

## 2017

Award Number	Project	PI	Institution
1720930	<a href="#">A Partnership to Adapt, Implement and Study a Professional Learning Model and Build District Capacity to Improve Science Instruction and Student Understanding (Collaborative Research: Borko)</a>	Hilda Borko	Stanford University
1720894	<a href="#">A Partnership to Adapt, Implement and Study a Professional Learning Model and Build District Capacity to Improve Science Instruction and Student Understanding (Collaborative Research: Weiss)</a>	Emily Weiss	University of California, Berkeley
1720514	<a href="#">An Efficacy Study of a Comprehensive Middle School Science Curriculum that Integrates Disciplinary Core Ideas, Science and Engineering Practices, and Crosscutting Concepts</a>	Christopher Harris	SRI International
1721003	<a href="#">BioGraph 2.0: Online Professional Development for High School Biology Teachers for Teaching and Learning About Complex Systems</a>	Susan Yoon	University of Pennsylvania
1719950	<a href="#">Building a Community of Science Teacher Educators to Prepare Novices for Ambitious Science Teaching</a>	David Stroupe	Michigan State University

Award Number	Project	PI	Institution
1720129	<a href="#">Building a Grades K-2 Early Algebra Learning Progression Prototype for Diverse Populations</a>	Maria Blanton	TERC, Inc.
1741748	<a href="#">Building Capacity to Retain Underrepresented Students in STEM Fields</a>	Arthur Powell	Rutgers University-Newark
1743807	<a href="#">Community for Advancing Discovery Research in Education (CADRE) 2018</a>	Catherine McCulloch	Education Development Center, Inc.
1738702	<a href="#">Critical Issues in Mathematics Education 2017</a>	David Eisenbud	Mathematical Sciences Research Institute
1720931	<a href="#">Culturally Responsive Indigenous Science: Connecting Land, Language, and Culture</a>	Paula Price	Washington State University
1720801	<a href="#">Designing a Middle Grades Spatial Skills Curriculum</a>	Nicholas Lux	Montana State University
1720646	<a href="#">Developing and Evaluating Assessments of Problem Solving (Collaborative Research: Bostic)</a>	Jonathan Bostic	Bowling Green State University
1720661	<a href="#">Developing and Evaluating Assessments of Problem Solving (Collaborative Research: Sondergeld)</a>	Toni Sondergeld	Drexel University
1720866	<a href="#">Developing and Validating a Scalable, Classroom-Focused Measure of Usable Knowledge for Teaching Mathematics: The Classroom Video Analysis Instrument</a>	Nicole Kersting	University of Arizona
1720334	<a href="#">Developing Teacher Noticing in Engineering in an Online Professional Development Program</a>	Jessica Watkins	Tufts University

Award Number	Project	PI	Institution
1721041	<a href="#">Engaging Students in Scientific Practices: Evaluating Evidence and Explanation in Secondary Earth and Space Science</a>	Doug Lombardi	Temple University
1748757	<a href="#">Examining an Innovative Approach to Supporting Science Teachers Practice Towards Three-Dimensional Learning Goals through Adapting Classroom Assessment Tasks</a>	William Penuel	University of Colorado Boulder
1721025	<a href="#">Examining Relationships Between Flipped Instruction and Students' Learning of Mathematics</a>	Zandra de Araujo	University of Missouri
1723749	<a href="#">Exploring the Influence of an Asset-Focused Intervention on Students' Interest, Motivation, and Sense of Belonging in the Life Sciences</a>	A. Boykin	Howard University
1744202	<a href="#">Exploring the Potential of Tablets as Early Math Resources for Urban Kindergarteners in Schools and Homes</a>	Amy Parks	Michigan State University
1742257	<a href="#">Foregrounding Agency Versus Structure as Models for Designing Integrated Mathematics and Computational Thinking Curriculum</a>	Melissa Gresalfi	Vanderbilt University
1721160	<a href="#">Fostering Collaborative Computer Science Learning with Intelligent Virtual Companions for Upper Elementary Students (Collaborative Research: Boyer)</a>	Kristy Boyer	University of Florida
1721000	<a href="#">Fostering Collaborative Computer Science Learning with Intelligent Virtual Companions for Upper Elementary Students (Collaborative Research: Wiebe)</a>	Eric Wiebe	North Carolina State University
1719872	<a href="#">High School Students' Climate Literacy Through Epistemology of Scientific Modeling (Collaborative Research: Chandler)</a>	Mark Chandler	Columbia University

Award Number	Project	PI	Institution
1720838	<a href="#">High School Students' Climate Literacy Through Epistemology of Scientific Modeling (Collaborative Research: Forbes)</a>	Cory Forbes	University of Nebraska-Lincoln
1721192	<a href="#">Identifying Effective Instructional Practices that Foster the Development of Algebraic Thinking in Elementary School</a>	Eric Knuth	University of Texas at Austin
1721163	<a href="#">Integrating Chemistry and Earth Science</a>	Alan Berkowitz	Institute of Ecosystem Studies
1721141	<a href="#">Integration of Engineering Design and Life Science: Investigating the influence of an Intervention on Student Interest and Motivation in STEM Fields</a>	Siddika Guzey	Purdue University
1720410	<a href="#">Investigating Productive Use of High-Leverage Student Mathematical Thinking (Collaborative Research: Peterson)</a>	Blake Peterson	Brigham Young University
1720613	<a href="#">Investigating Productive Use of High-Leverage Student Mathematical Thinking (Collaborative Research: Van Zoest)</a>	Laura Van Zoest	Western Michigan University
1720566	<a href="#">Investigating Productive Use of High-Leverage Student Mathematical Thinking Collaborative Research: Stockero)</a>	Shari Stockero	Michigan Technological University
1720578	<a href="#">Learning in Places: Field Based Science in Early Childhood Education</a>	Megan Bang	University of Washington
1720587	<a href="#">Learning Through Collaborative Design: Professional Development to Foster Productive Epistemic Discourse in Science</a>	Sherry Southerland	Florida State University
1720533	<a href="#">Mathematical Learning via Architectural Design and Modeling Using E-Rebuild</a>	Fengfeng Ke	Florida State University
1719555	<a href="#">Mathematics Immersion for Secondary Teachers at Scale (Collaborative Research: Cuoco)</a>	Albert Cuoco	Education Development Center, Inc.

Award Number	Project	PI	Institution
1719554	<a href="#">Mathematics Immersion for Secondary Teachers at Scale (Collaborative Research: Heck)</a>	Daniel Heck	Horizon Research Inc.
1721100	<a href="#">Measuring Early Mathematical Reasoning Skills: Developing Tests of Numeric Relational Reasoning and Spatial Reasoning</a>	Leanne Ketterlin Geller	Southern Methodist University
1721021	<a href="#">Mobilizing Teachers to Increase Capacity and Broaden Women's Participation in Physics (Collaborative Research: Hazari)</a>	Zahra Hazari	Florida International University
1720810	<a href="#">Mobilizing Teachers to Increase Capacity and Broaden Women's Participation in Physics (Collaborative Research: Hodapp)</a>	Theodore Hodapp	American Physical Society
1720917	<a href="#">Mobilizing Teachers to Increase Capacity and Broaden Women's Participation in Physics (Collaborative Research: Lock)</a>	Robynne Lock	Texas A&M University-Commerce
1720869	<a href="#">Mobilizing Teachers to Increase Capacity and Broaden Women's Participation in Physics (Collaborative Research: Vieyra)</a>	Rebecca Vieyra	American Association of Physics Teachers
1720964	<a href="#">Multimedia Immersion Inspires STEM Learning</a>	Robert Harari	Stevens Institute of Technology
1721059	<a href="#">Networking Urban Resources with Teachers and University to Enrich Early Childhood Science (NURTURES) Phase II: Expansion and Evaluation</a>	Charlene Czerniak	University of Toledo
1721133	<a href="#">Preparing Next Generation Scientists Through Teacher and Extension Science Partnerships and Schoolyard Citizen Science Investigations in Elementary Schools</a>	Lara Gengareilly	University of New Hampshire
1720914	<a href="#">Project Accelerate: University-High School AP Physics Partnerships</a>	Andrew Duffy	Trustees of Boston University

Award Number	Project	PI	Institution
1721236	<a href="#">Project MAPLE: Makerspaces Promoting Learning and Engagement</a>	Jeffrey Ginger	University of Illinois at Urbana-Champaign
1720958	<a href="#">Promoting Scientific Explorers Among Students with Learning Disabilities: The Design and Testing of a Grade 2 Science Program Focused on Earth's Systems</a>	Christian Doabler	University of Texas at Austin
1720996	<a href="#">Research on the Utility of Abstraction as a Guiding Principle for Learning about the Nature of Models in Science Education</a>	Daniel Capps	University of Georgia Research Foundation, Inc.
1720585	<a href="#">Schoolyard Scientists: An Investigation of Impacts Associated with Urban Youth Engagement in Participatory Scientific Research Activities</a>	Kevin Cuff	University of California, Berkeley
1721054	<a href="#">Science and Engineering Education for Infrastructure Transformation</a>	Charles Xie	Concord Consortium
1721356	<a href="#">Transforming Scientific Practices to Promote Students Interest and Motivation in the Life Sciences: A Teacher Leadership Development Intervention</a>	Pauline W. U. Chinn	University of Hawaii
1720507	<a href="#">Video in the Middle: Flexible Digital Experiences for Mathematics Teacher Education</a>	Nanette Seago	WestEd
1720856	<a href="#">Youth Participatory Science to Address Urban Heavy Metal Contamination</a>	Daniel Morales-Doyle	University of Illinois at Chicago