

Poster Session	Poster #	STEM Discipline	PI First Name:	PI Last Name:	Project Title:	Institution:
2	83	Computer Science	Nicoletta	Adamo-Villani	Building a Serious Game to Teach Secure Coding in Introductory Programming	Purdue University
2	263	Interdisciplinary	Bruce	Alberts	SCIENCE in the Classroom	Science / AAAS
2	134	Engineering	Raymundo	Arroyave	CCLI: Scaling Up: Classroom-wide Student-led Undergraduate Research Experience for the Introductory Materials Science Course	Texas A&M
1	1	Biological Sciences	Leslie	Atkins	Collaborative Research: Building a Life Science Curriculum for Elementary Teachers	CSU, Chico
3	84	Computer Science	Stephanie	August	CCLI: Enhancing Expertise, Sociability and Literacy through Teaching Artificial Intelligence as a Lab Science	Loyola Marymount University
3	264	Interdisciplinary	Abul	Azad	Universal Environment for Delivering Remote-Laboratories Within the STEM Disciplines	Northern Illinois University
1	85	Computer Science	Godmar	Back	Reinvigorating CS1 by Enabling Creative Web 2.0 Programming	Virginia Tech
3	135	Engineering	Melody	Baglione	Building Sustainability into Control Systems Courses	Cooper Union
1	136	Engineering	Reid	Bailey	Collaborative Research: Technology Leaders: A Program to Prepare Students for Designing Multiscale Agile Systems	University of Virginia
3	246	Geological Sciences	Matthew	Bampton	Creating and Implementing a Concept Inventory-Based Diagnostic Tool to Improve Undergraduate GIS Education	University of Southern Maine

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2	2	Biological Sciences	Gita	Bangera	ComGen: The Community College Genomics Research Initiative	Bellevue College
2	383	Research or Assessment	Lei	Bao	Developing Scientific Reasoning Assessment Tools for STEM Education and Teacher Preparation	The Ohio State University
1	265	Interdisciplinary	Catherine	Bareiss	Computing Foundations for the Scientist	Olivet Nazarene University
1	46	Chemistry	Nathan	Barrows	Collaborative Research: Advancing Chemistry by Enhancing Learning in the Laboratory (ACELL)	Grand Valley State University
3	3	Biological Sciences	Ann	Batiza	An Interdisciplinary Approach to Biological Energy transfer-Cross-Institutional Collaboration and Adaptation	Milwaukee School of Engineering
2	326	Mathematics	Nancy	Baxter Hastings	Professional Enhancement Program (PREP)	Mathematical Association of America (MAA)
2	137	Engineering	James	Becker	Student-Centered Learning Strategies For A Face-to-Face and Online Circuits Course	Montana State University
2	47	Chemistry	Nicholas	Benfaremo	Integration of Spectroscopic Techniques Across the Undergraduate Curriculum	Saint Joseph's College of Maine
3	138	Engineering	Edward	Berger	The Engineering Genome Project	University of Virginia
1	4	Biological Sciences	Mark	Bergland	Developing Computer Simulations Integrating Biomedical Research Techniques with Bioinformatics Tools for Case-based Learning in Introductory Biology Courses	University of Wisconsin-River Falls

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1	388	Social Sciences: (Sociology)	Andrew	Beveridge	Creating and Disseminating Tools to Teach with Demographic Data Maps and Materials	Queens College CUNY
2	86	Computer Science	Ivona	Bezakova	Multiplayer Board Game Strategies in the Introductory CS Curriculum	Rochester Institute of Technology
1	139	Engineering	Rajesh	Bhaskaran	Integrating Advanced Simulations into Engineering Curricula: Helping Students to Approach Simulation like Experts	Cornell University
2	266	Interdisciplinary	Julie	Bianchini	Environmental Connections: Science, Technology, Society, and Education	University of California, Santa Barbara
1	247	Geological Sciences	Karin	Block	The Geoscience Student Data Network: A Cyberinfrastructure-Based Approach for Collaborative Classroom-, Field-, and Laboratory-Based Undergraduate Education	City College of New York
3	267	Interdisciplinary	David	Blockstein	Creating a Learning Community for Solutions to Climate Change	National Council for Science and the Environment
2	5	Biological Sciences	Lawrence	Blumer	Collaborative Research: Creating a Bean Beetle Curriculum Development Network	Morehouse College
3	48	Chemistry	Emily	Borda	Chemistry for the Informed Citizen (CIC)	Western Washington University
1	352	Physics or Astronomy	Andrew	Boudreaux	Developing Proportional Reasoning in a Physics Context with Invention Tasks	Western Washington University
2	353	Physics or Astronomy	Suzanne	Brahmia	Collaborative Proposal: Developing Proportional Reasoning in a Physics Context with Invention Tasks	Rutgers University

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3	87	Computer Science	Sergey	Bratus	SISMAT-Secure Information Systems Mentoring and Training	Dartmouth College
3	354	Physics or Astronomy	Kenneth	Brecher	Light Inquiry Through Experiments: Project LITE	Boston University
3	6	Biological Sciences	Marguerite	Brickman	Project Synergy: Transforming Undergraduate Large-enrollment Science Courses Using Graduate-student 'Scaffolded' Apprentices	University of Georgia
2	140	Engineering	Sean	Brophy	Graphical Representations to Assess System Performance (GRASP): Assessment for Engineering Education	Purdue University
1	88	Computer Science	David	Bunde	Collaborative Research: Responding to Many Core: Teaching Parallel Computing with Higher-level Languages and Activity-based Laboratories	Knox College
3	141	Engineering	Susan	Burkett	EURO: Enhancing Undergraduate Research Opportunities	University of Alabama
1	268	Interdisciplinary	David	Burns	Science Education for New Civic Engagements and Responsibilities (SENCER)	Harrisburg University of Science and Technology
2	89	Computer Science	Yuanfang	Cai	Contemporary Canonical Software Courses	Drexel University
1	142	Engineering	Juan	Caicedo	Collaborative Research: Implementing and Assessing Strategies for Environments for Fostering Effective Critical Thinking (EFFECTs) Development and Implementation	University of South Carolina
2	143	Engineering	Terri	Camesano	CCLI: Developing Grand Challenges Nanobiotechnology Laboratory Experience for Sophomores	Worcester Polytechnic Institute

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3	327	Mathematics	Connie	Campbell	Research Based Videos for Developing Mathematical Thinking Skills in Proof Writing and Problem Solving	Millsaps College
3	144	Engineering	Andres	Carrano	Integration of Experiential Learning to Develop Problem Solving Skills in Deaf and Hard of Hearing STEM Students	Rochester Institute of Technology
2	269	Interdisciplinary	Stephen	Carroll	Enhancing the Relevance and Effectiveness of Course, Program and Department Evaluation: Improving the Utility and Usability of the Student Assessment of Learning Gains Site	Santa Clara University
1	145	Engineering	Grisselle	Centeno	Case Studies Development as Constructivist Pedagogy for Teaching Work Analysis and Design	University of South Florida
1	49	Chemistry	Stephen	Cessna	Promoting Learning Through Authentic and Relevant Research Experiences in Environmental Monitoring and Remediation Across Ten Chemistry and Biology Laboratory Courses	Eastern Mennonite University
3	90	Computer Science	John	Chandy	Exploratory Curriculum for Trustable Computing Systems Security Education	University of Connecticut
1	7	Biological Sciences	Amy	Chang	Biology Scholars Program	American Society for Microbiology
2	146	Engineering	Sushil K.	Chaturvedi	Engineering Laboratory Instruction in Immersive Virtual Environment (ENLIIVEN)	Old Dominion University
1	91	Computer Science	Ping	Chen	An Interactive Undergraduate Data Mining Course with Industrial-Strength Projects	University of Houston-Downtown
3	147	Engineering	Xuemin	Chen	Collaborative Research: Developing Virtual and Remote Undergraduate Laboratory for Engineering Technology	Texas Southern University

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1	148	Engineering	Karen	Chou	Collaborative Research: An Interactive Steel Connection Teaching Tool - A Virtual Structure	Northwestern University
1	355	Physics or Astronomy	Kelvin	Chu	Vermont Physics Initiative - Improving Quantum Mechanics Undergraduate Education	University of Vermont
2	8	Biological Sciences	H. David	Clarke	Creating and Implementing a Research-Infused Botanical Curriculum: Exploring Plants from Communities to Molecules	University of North Carolina at Asheville
2	50	Chemistry	Renee	Cole	Collaborative Research: Exploring Student Understanding of Physical Chemistry	University of Iowa
3	51	Chemistry	David	Collard	Collaborative Research: Chemistry Coalitions, Workshops and Communities of Scholars	Georgia Institute of Technology
1	52	Chemistry	Linda	Columbus	Known Structure, Unknown Function: An Undergraduate Research Curriculum	University of Virginia
3	270	Interdisciplinary	Timothy	Comar	Biocalculus: Text Development, Dialog, and Assessment	Benedictine University
3	384	Research or Assessment	Mark	Connolly	Impact of Professional Development Programs on Future STEM Faculty: A Mixed-Methods Longitudinal Study	University of Wisconsin-Madison
2	149	Engineering	Kenneth	Connor	Mobile Studio Environments to Enhance STEM Education	Rensselaer Polytechnic Institute
3	150	Engineering	Eric	Constans	Making the Connection - Using a Long-Term Sustainable Design Project to Integrate the Mechanical Engineering Curriculum	Rowan University

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3	9	Biological Sciences	Todd	Cooke	The Physics of Life: Interdisciplinary Education at the Introductory Level	University of Maryland
2	53	Chemistry	Melanie	Cooper	Chemistry and the Logic of Life: A Research-Based, Integrated General Chemistry Curriculum (<i>now called Chemistry, Life the Universe and Everything (CLUE)</i>)	Clemson University
1	271	Interdisciplinary	Edgar	Corpuz	The Impact of Interactive Engagement Teaching Approach using PDAs as Classroom Interaction System in a Predominantly Hispanic Institution	University of Texas-Pan American
1	151	Engineering	Shane	Cotter	CSI Union: Understanding Forensic and Biometric Technologies	Union College
2	272	Interdisciplinary	Edward	Coyle	The VIP Program - Integrating Undergraduate Design Projects and Graduate Research	Georgia Institute of Technology
2	92	Computer Science	James	Cross	jGRASP: Toward Effortless Program Visualization with a Canvas of Dynamic Objects	Auburn University
1	10	Biological Sciences	Alison	Crowe	Guided Group Activities to Enhance Ways of Learning in Biology: GATEWAY Learning in Biology	University of Washington
2	152	Engineering	James	Dabney	Collaborative Research: Develop Innovative Labs-to-Go Kits for Multidisciplinary Undergraduate Engineering and Technology Education	University of Houston - Clear Lake
3	93	Computer Science	Kostadin	Damevski	Longevity-Oriented Curriculum Enhancement for Cyber-Physical Systems	Virginia State University
2	356	Physics or Astronomy	Melissa	Dancy	Collaborative Research: From Dissemination to Adoption: A Study of the Instructional Change Process in Faculty Most Likely to Succeed	University of Colorado

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3	153	Engineering	Denny	Davis	Appraisal System for Superior Engineering Education Evaluation-Instrument Sharing and Scholarship (ASSESS)	Washington State University
2	248	Geological Sciences	Declan	De Paor	Scaffolding Undergraduate GEoscience Inquiry Using New Loggable Google Earth Explorations	Old Dominion University
1	154	Engineering	Norbert	Delatte	Implementation and Assessment of Failure Case Studies in the Engineering Curriculum	Cleveland State University
2	155	Engineering	William	DeLuca	GRIDc II: Green Research for Incorporating Data in the Classroom Phase 2	North Carolina State University
3	357	Physics or Astronomy	Dedra	Demaree	A Multi-institutional and Department-wide Approach to 2nd Generation Introductory Physics Curriculum Reform	Oregon State University
1	94	Computer Science	Peter	DePasquale	COMTOR: Enabling Students and Educators to Automatically Assess Software Documentation and Source Code Comments	The College of New Jersey
1	328	Mathematics	Scott	Dexter	Linear Algebra In New Environments (LINE)	Brooklyn College
3	156	Engineering	Hazar	Dib	Collaborative Research: An Interactive Steel Connection Teaching Tool - A Virtual Structure	Purdue University
2	95	Computer Science	Matthew	Dickerson	Teaching Computational Thinking through Multi-Agent Simulation: Increasing Recruitment, Retention, and Relevance of Undergraduate Computer Science	Middlebury College
3	273	Interdisciplinary	Lisa	Dierker	Course Curriculum and Laboratory Improvement (CCLI): An Inquiry-based, Supportive Approach to Statistical Reasoning and Application	Wesleyan University

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2	329	Mathematics	Ivo	Dinov	Statistics Online Computational Resource for Education	UCLA
2	11	Biological Sciences	Elizabeth	Dinsdale	Microbes, Metagenomes and Marine Mammals: Enabling the Next Generation of Scientists to Enter the Genomic Era	San Diego State University
3	12	Biological Sciences	Clarissa	Dirks	SPARST: Assessing the Process of Science	The Evergreen State College
1	157	Engineering	Jianyu	Dong	Enhance Computer Network Curriculum Using Collaborative Project-based Learning	California State University Los Angeles
2	158	Engineering	Elliot	Douglas	Implementing Guided Inquiry in Diverse Institutions	University of Florida
1	358	Physics or Astronomy	Tevian	Dray	Paradigms in Physics: Interactive Electromagnetic Curricular Materials	Oregon State University
1	274	Interdisciplinary	Marion	Dresner	Interactive Teaching Material for Understanding Ecological Response from Climate Change in Urban Forests	Portland State University
3	54	Chemistry	John	Dwyer	Project TUESTYC: A Grant Proposal Preparation and Mentoring Program for Two-Year College Faculty	St. Catherine University
1	13	Biological Sciences	Diane	Ebert-May	Faculty Institutes for Reforming Science Teaching (FIRST IV) for Postdoctoral Scholars	Michigan State University
3	159	Engineering	Raghu	Echempati	Collaborative Research: Transforming Web-based Courseware into a Full Statics Course with Digital Feedback and Assessment that Informs Interactive Classroom Activities	Kettering University

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1	160	Engineering	Christine	Ehlig-Economides	Collaborative Research - Liver Energy	Texas A&M University
2	161	Engineering	Usama	El Shamy	A Multi-institutional Classroom Learning Environment for Geotechnical Engineering Education	Southern Methodist University
3	96	Computer Science	Heidi	Ellis	HumIT: Student IT Services to Support Open Source Software for Humanity	Western New England University (formerly College)
3	330	Mathematics	Douglas	Ensley	Mobile Math Apps	Shippensburg University
3	162	Engineering	Ning	Fang	Improving Students' Problem-Solving in Engineering Dynamics Through Interactive Web-Based Simulation and Animation Modules	Utah State University
1	331	Mathematics	David	Feikes	Connecting Mathematics for Elementary Teachers (CMET) Type II: Dissemination, Enhancement and Research	Purdue University North Central
2	359	Physics or Astronomy	Gerald	Feldman	Bridging the Expert-Novice Problem-Solving Gap with the GW-ACCESS Protocol	George Washington University
1	163	Engineering	Cynthia	Finelli	Motivating Change in Faculty Teaching Practices to Support a Diverse Student Body in Engineering	University of Michigan
1	55	Chemistry	Richard	Fitch	Cross-Course Collaboration in the Undergraduate Chemistry Curriculum	Indiana State University
2	56	Chemistry	Steven	Fleming	Bio-Organic Reaction Animations	Temple University

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2	275	Interdisciplinary	Thomas	Foster	Regional Collaboration to Improve Science Content Courses Intended for Pre-service Elementary Teachers	Southern Illinois University Edwardsville
2	14	Biological Sciences	Margaret	Franzen	Connecting Research Labs and Classrooms: A Role for Physical Modeling Projects in the Undergraduate Curriculum	Milwaukee School of Engineering
3	57	Chemistry	Kimberley	Frederick	Development and Implementation of an Inquiry-Based, Laboratory-Driven, General Chemistry Sequence	Skidmore College
3	276	Interdisciplinary	Eric	Freudenthal	CCLI Phase 2: Increasing Attractiveness of Computing: The Design and Evaluation of Introductory Computing Coursework that Elicits Creativity	University of Texas at El Paso
2	389	Social Sciences: <i>(Multi-disciplinary)</i>	William	Frey	Infusing Quantitative Literacy Throughout the Social Science Curriculum	University of Michigan-Ann Arbor
1	58	Chemistry	Laura	Frost	An Innovative Guided Inquiry Lab Course Integrating Analytical and Biochemistry for Enhanced Student Learning	Georgia Southern University
2	332	Mathematics	Charles	Funkhouser	Native American-based Mathematics Materials for Integration Into Undergraduate Courses	California State University Fullerton
2	59	Chemistry	Anne	Gaquere-Parker	Enhancing Undergraduate Chemistry Education through Incorporation of Art-based Experiments	University of West Georgia
3	360	Physics or Astronomy	Edmundo	Garcia-Solis	Using the Context of Nuclear and Particle Physics for the Integration of Modern Research Techniques into the Undergraduate Physics Curriculum	Chicago State University
3	333	Mathematics	Joan	Garfield	Collaborative Research: The CATALSTS Project, Change Agents for Teaching and Learning Statistics	University of Minnesota

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1	97	Computer Science	Alessio	Gaspar	Do you have a CLUE? C Learning Undergraduate Environment	University of South Florida Polytechnic
1	277	Interdisciplinary	Eric	Gaze	Collaborative Research: Quantitative Literacy and Reasoning Assessment	Bowdoin College
2	278	Interdisciplinary	Edward	Gehring	Production and Assessment of Student-Authored Wiki Textbooks	North Carolina State University
3	60	Chemistry	John	Gelder	Before, During and After Class Learning Cycle Activities	Oklahoma State University
3	279	Interdisciplinary	Grandon	Gill	Incorporating Complex Open Authentic Case Studies into a Capstone Course	University of South Florida
1	61	Chemistry	David	Gingrich	The Development of Biochemistry Laboratories Centered on Hemoglobin	SUNY Potsdam
2	164	Engineering	James	Goedert	Virtual Interactive Construction Education (VICE-Bridge: A Project-Based Educational Paradigm Using Cyberinfrastructure Tools	University of Nebraska
2	98	Computer Science	Swapna	Gokhale	Integrating Open Source Software into Software Engineering Curriculum	University of Connecticut
1	361	Physics or Astronomy	Fred	Goldberg	Developing Large-Enrollment, Guided-Inquiry, Conceptual Physics Course	San Diego State University
1	280	Interdisciplinary	Herman	Gordon	Social Networking to Support Scientific Problem Solving	University of Arizona

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3	15	Biological Sciences	Tamar	Goulet	Class Generated Community Clicker Cases: Testing a Novel Pedagogic Approach Connecting Science and Non-Major Students in Large Introductory Biology Classes	University of Mississippi
3	165	Engineering	Yi	Guo	Meeting the Educational Challenge in Mico/Nanorobotics for Biomedical Applications	Stevens Institute of Technology
1	166	Engineering	Emad	Habib	Collaborative Research: Development of Adaptable Web Modules to Stimulate Active Learning in Hydrology using Data and Model Simulations	University of Louisiana at Lafayette
1	16	Biological Sciences	Joel	Hagen	SUMS4Bio:Strengthening Undergraduate Mathematics and Statistics Education for Biologists	Radford University
2	362	Physics or Astronomy	Stephen	Hagen	An Advanced Laboratory in Biological Physics	University of Florida
2	167	Engineering	James	Hanson	Collaborative Research: Innovative Learning Styles and Universal Access for Geotechnical Engineering Education	California Polytechnic State University
3	168	Engineering	Qinghua	He	TUES: Integrating Biofuels Education into Chemical Engineering Curriculum to Prepare Competent Engineers and Researchers for Renewable and Sustainable Energy Solutions	Tuskegee University
1	169	Engineering	Greg	Heileman	A Model for Online Cross-Institutional STEM Course Offering and Support Services in New Mexico	University of New Mexico
2	170	Engineering	Gretchen	Hein	First-Year Innovation & Design in Engineering for Academic Success (IDEAS) Modules and Center	Michigan Technological University
3	99	Computer Science	Jesse	Heines	Computational Thinking through Computing and Music	Univ. of Massachusetts Lowell

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1	385	Research or Assessment	Charles	Henderson	Collaborative Research: Increasing the Impact of TUES Projects through Effective Propagation Strategies: A How-To Guide for PIs	Western Michigan University
2	281	Interdisciplinary	Nancy	Hensel	Developing Undergraduate Research at Community Colleges: Tapping the Potential of All Students	New American Colleges and Universities
2	17	Biological Sciences	Heather	Henter	The San Diego Biodiversity Project: Integrating Authentic Research and Collaboration into the Biology Curriculum	University of California, San Diego
2	62	Chemistry	Susan	Hershberger	Collaboration and Guided Inquiry in the Organic Chemistry Laboratory	Miami University
3	18	Biological Sciences	James	Hewlett	Collaborative Research: Community College Undergraduate Research Initiative (CCURI)	Finger Lakes Community College
3	363	Physics or Astronomy	Robert	Hilborn	Enhancing STEM Student Learning through Faculty Development: Workshops for New Physics and Astronomy Faculty	American Association of Physics Teachers
1	100	Computer Science	Gregory	Hislop	SoftHum: Student Participation in the Community of Open Source Software for Humanity	Drexel University
3	249	Geological Sciences	Jan	Hodder	Collaborative Research: Supporting and Advancing Geoscience Education at Two-year Colleges through Workshops and Web Resources	University of Oregon
2	101	Computer Science	Joseph	Hollingsworth	Hands-On Collaborative Reasoning across the Curriculum - Phase II	Indiana University Southeast
1	250	Geological Sciences	John	Horel	Observing Snow and Wind: Using the Environment to Engage Students in Science and Engineering	University of Utah

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1	19	Biological Sciences	Sally	Hoskins	C.R.E.A.T.E .Cornerstone--Inspiring Undergraduates to Persist and Succeed in the Biology Major	City College of the City University of New York
3	171	Engineering	Sandra	Houston	Advancement of Unsaturated Soils Theory into the Undergraduate Civil Engineering Curriculum	Arizona State University
1	172	Engineering	Steve	Hsiung	Dissemination of Microprocessor Courses through Classroom and Interactive Cyber-Enabled Technologies	Old Dominion University
2	173	Engineering	Fei	Hu	A Building-Block Approach to Tele-healthcare Engineering Education	The University of Alabama
3	102	Computer Science	Dijiang	Huang	A Cloud-based Resource and Service Sharing Platform for Computer and Network Security Education	Arizona State University
3	63	Chemistry	Sally	Hunnicutt	POGIL-PCL and the Development and Implementation of Guided Inquiry Experiments for Physical Chemistry	Virginia Commonwealth University
3	174	Engineering	Jane	Hunter	Transforming the Undergraduate Engineering Experience: Using Cyberinfrastructure Tools to Introduce the Grand Challenges for Engineering	The University of Arizona
2	251	Geological Sciences	Mohammad	Iqbal	Field and Lab-based Activities for Undergraduate Students to Study the Hydrologic Environment	University of Northern Iowa
1	175	Engineering	Stephanie	Ivey	Transforming a Civil Engineering Curriculum through GIS Integration	University of Memphis
3	282	Interdisciplinary	Howard	Jackson	A Coherent Multi-disciplinary Initiative to Enhance Student Learning in STEM Courses	University of Cincinnati

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1	283	Interdisciplinary	Paula	Jackson	WIKled Biology	Kennesaw State University
2	176	Engineering	Timothy	Jacobs	TUES: Comprehensive Course Redesign: Thermodynamics for Next Generation Engineers	Texas A&M University
3	177	Engineering	Kauser	Jahan	Hands on an Aquarium	Rowan University
1	64	Chemistry	Ben	Jang	Achieving Student Mastery of Chromatographic and Spectroscopic Methods in Organic Chemistry through a University/Community College Partnership	Texas A&M U.-Commerce
2	20	Biological Sciences	Kristin	Jenkins	Show Me the Evolution! Assessing Effectiveness of a New Teaching Resource	National Evolutionary Synthesis Center
1	103	Computer Science	Wei	Jin	A Cognitive-Apprenticeship Learning Curriculum Augmented by Cognitive Tutors (CAL-CT) for Fundamental Programming Concepts	Shaw University
1	364	Physics or Astronomy	Andy	Johnson	Radioactivity by Inquiry For College Science Courses	Black Hills State University
3	21	Biological Sciences	Thomas	Jones	Virtual Ecology: An Inquiry-Based Online Learning Environment	East Tennessee State University
2	104	Computer Science	Anthony	Joseph	Technology Entrepreneurship in Computer Science	Pace University
1	334	Mathematics	Thomas	Judson	Collaborative Research: UTMOST: Undergraduate Teaching in Mathematics with Open Software and Textbooks	Stephen F. Austin State University

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2	65	Chemistry	Michael	Kahlow	Redesigning Introductory Chemistry: A Student-Driven Model Curriculum	University of Wisconsin - River Falls
3	66	Chemistry	Lawrence	Kaplan	Collaborative Research: Chemistry Coalitions, Workshops & Community of Scholars	Williams College
3	105	Computer Science	Lydia	Kavraki	Teaching Robot Motion Planning Through an Integrated Software Environment	Rice University
1	106	Computer Science	Siddharth	Kaza	Building Security In: Injecting Security throughout the Undergraduate Computing Curriculum	Towson University
1	178	Engineering	David	Kazmer	Collaborative Research: Engineering Faculty Engagement in Learning Through Service (EFELTS)	Univ. Mass. Lowell
1	22	Biological Sciences	Susan	Keen	Learning Modules to Enhance Understanding of Animal Development	University of California at Davis
2	335	Mathematics	Karen	Keene	CELTIC: Calculus for Elementary Teachers: An Innovative Context	North Carolina State University
2	284	Interdisciplinary	Kristy	Kenyon	Extending CREATE Demographically and Geographically, to Test its Efficacy on Diverse Populations of Learners at 2 Year and 4-Year Institutions	Hobart and William Smith Colleges
3	336	Mathematics	Taufiqar	Khan	Emphasizing Core Calculus Concepts Using Biomedical Applications to Engage, Mentor and Retain STEM Students	Clemson University
2	179	Engineering	Mohammad	Khavanin	CALCULATE: Curricular Advances to Learn Calculus and Understand the Lessons that are Appropriate to Engineering	University of North Dakota

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2	107	Computer Science	Jihie	Kim	Scaffolding Wiki Use in Engineering Courses	University of Southern California
3	180	Engineering	Spencer	Kim	Transforming Curriculum for Workforce Development in Green Plastics Manufacturing Technology	Rochester Institute of Technology
1	337	Mathematics	Sandra	Kingan	Mathematics and Social Advocacy	Brooklyn College
3	252	Geological Sciences	David	Kinner	Testing the Benefits of Undergraduate Research-Based Learning at Various Curricular Levels Using Authentic Research Questions in Hydrogeomorphology	Western Carolina University
1	181	Engineering	Nikos	Kiritsis	A Model Portal for Pre-Engineering	McNeese State University
3	285	Interdisciplinary	Kathleen	Kitto	iCollaborate - MSE	Western Washington University
2	182	Engineering	Nathan	Klingbeil	A National Model for Engineering Mathematics Education	Wright State University
2	338	Mathematics	Eugene	Klotz	Math Images II	Drexel University
1	286	Interdisciplinary	David	Klotzkin	A Multidisciplinary Introduction to Microfabrication	Binghamton University
2	287	Interdisciplinary	Michael	Klymkowsky	Socratic Graphs	University of Colorado, Boulder

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1	67	Chemistry	Tracy	Knowles	Team Science: Using Team-based Learning Strategies to Increase Student Success in Science Courses	Bluegrass Community and Technical College
2	23	Biological Sciences	David	Koetje	Leveraging Laboratory Activities to Achieve Educational Reforms	Calvin College
2	365	Physics or Astronomy	Patrick	Kohl	Studio Physics: Understanding and Implementing the Transformation	Colorado School of Mines
3	108	Computer Science	Abdullah	Konak	Exploration of a Collaborative Virtual Computer Laboratory (CVCLAB) to Enhance Distance Learning in Information Security	Penn State Berks
3	288	Interdisciplinary	Sacha	Kopp	Inquiry-Based Integrated Natural Sciences for Pre-Service Elementary Teachers	The University of Texas at Austin
3	183	Engineering	Milo	Koretsky	Collaborative Research: Integration of Conceptual Learning throughout the Core Chemical Engineering Curriculum	Oregon State University
1	184	Engineering	John	Krupczak	Technological Literacy: Assessment and Measurement of Learning Gains	Hope College
1	109	Computer Science	Amruth	Kumar	The Next Generation of Practice Exercises for Computer Science I	Ramapo College of New Jersey
2	185	Engineering	Sanjeev	Kumar	C2P2 Oriented Laboratory Instruction in Geotechnical Engineering using Digital Videos and Evaluation of its Impact on Students' Learning	SIUC
2	110	Computer Science	Stan	Kurkovsky	Using Mobile Game Development to Improve Student Learning & Satisfaction in Introductory Computer Science Courses	Central Connecticut State University

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3	111	Computer Science	Barry	Kurtz	Developing Software and Methodologies for eBook/Browsers to Enhance Learning	Appalachian State University
1	112	Computer Science	Clifton	Kussmaul	Process Oriented Guided Inquiry Learning (POGIL) in Computer Science	Muhlenberg College
3	366	Physics or Astronomy	Rubin	Landau	Blended, Multimodal Access to Computational Physics Curricula	Oregon State University
1	367	Physics or Astronomy	Rubin	Landau	Collaborative Research: INSTANCES: Incorporating Computational Scientific Thinking Advances into Education & Science Courses	Oregon State University
3	186	Engineering	Amy	Landis	Integrating Sustainability into the Civil Engineering Curriculum Through Three Courses at the University of Pittsburgh	Arizona State University
2	68	Chemistry	Juliette	Lantz	A New Approach to Analytical Chemistry: The development of Process-Oriented Guided Inquiry Learning Materials	Drew University
1	289	Interdisciplinary	James	Lassoie	Bridging Learners with Practitioners: Interdisciplinary Experiential Learning in Conservation Science Using Conservation Bridge	Cornell University
3	339	Mathematics	Sandra	Laursen	Collaborative Research: Research, Dissemination, and Faculty Development of Inquiry-Based Learning (IBL) Methods in the Teaching and Learning of Mathematics	University Colorado Boulder
1	187	Engineering	Oenardi	Lawanto	Promoting Metacognitive Knowledge and Shared Note-taking to Learning Electric Circuit Concepts through Enhanced Guided Notes	Utah State University
2	368	Physics or Astronomy	Priscilla	Laws	Collaborative Research: The Impact of LivePhoto Physics Materials and Workshops	Dickinson College

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3	369	Physics or Astronomy	Kevin	Lee	Multi-Modal Modules for Learning Introductory Astronomy Concepts	University of Nebraska-Lincoln
3	24	Biological Sciences	Paula	Lemons	Case Study Teaching: How Do Questions and Emotional Engagement Impact Student Learning?	University of Georgia
2	290	Interdisciplinary	Jill	Leonard	Increasing Adoption of Active Learning in STEM Disciplines by Integrating a Faculty Development Program and a Technology-facilitated Learning Environment	Northern Michigan University
2	188	Engineering	Kemper	Lewis	Collaborative Research - Teaching the Global, Economic, Environmental, and Societal Foundations of Engineering Design through Product Archaeology	University at Buffalo - SUNY
2	113	Computer Science	Chengcheng	Li	A Centralized Resource Management Model for Computer Networking Laboratory Equipment Sharing among Collaborating Institutes	East Carolina University
3	291	Interdisciplinary	Gregory	Light	Enhancing Critical Thinking in STEM Disciplines: A Faculty Development Model	Northwestern University
3	114	Computer Science	Susan	Lincke	Information Security: Audit, Case Study, and Service Learning	University of Wisconsin-Parkside
3	189	Engineering	Julie	Linsey	Sketched-Truss Recognition Tutoring System: Improved Student Learning through Active Learning and Immediate Student Feedback	Texas A&M University
1	292	Interdisciplinary	Ronnie	Lipschutz	Sustainability Engineering and Ecological Design Learning Partnership (SEED-LP)	University of California, Santa Cruz
1	25	Biological Sciences	Tammy	Long	Reforming Introductory Biology at MSU: Does It Make a Difference?	Michigan State University

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1	190	Engineering	Michael	Loui	Enhancing the ECE 101 Curriculum Through Diversity Harnessing	University of Illinois at Urbana-Champaign
1	370	Physics or Astronomy	Michael	Loveude	Collaborative Project: Research on the Teaching and Learning of Thermal Physics	California State University Fullerton
2	293	Interdisciplinary	Marcin	Lukowiak	Multi-Disciplinary Applied Cryptography	Rochester Institute of Technology
1	253	Geological Sciences	Heather	Macdonald	Collaborative Research: On the Cutting Edge: A Community Resource Transforming Geoscience Education	College of William & Mary
3	294	Interdisciplinary	Krishna	Madhavan	Collaborative Research: Deep Insights Anytime, Anywhere (DIA2) - Central Resource for Characterizing the TUES Portfolio through Interactive Knowledge Mining and Visualization	Purdue University
1	295	Interdisciplinary	Mark	Maier	Supporting Community College Faculty Across the STEM Disciplines	Glendale Community College
2	296	Interdisciplinary	Mitch	Malachowski	Collaborative Research: Transformational Learning through Undergraduate Research: Comprehensive Support for Faculty, Institutions, State Systems and Consortia	University of San Diego
2	386	Research or Assessment	Adam	Maltese	Undergraduate Scientists: Measuring the Outcomes of Research Experiences from Multiple Perspectives (US-MORE)	Indiana University
2	191	Engineering	Hong	Man	SimuRad A Software Simulation Environment for Medical Imaging Education	Stevens Institute of Technology
2	26	Biological Sciences	Gili	Marbach-Ad	Assessing the impact of a disciplinary Teaching and Learning Center on Current and Future Faculty Professional Development	University of Maryland

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1	340	Mathematics	Barbara	Margolius	Flash Applets for WeBWoRK Online Homework System	Cleveland State University
2	341	Mathematics	Maura	Mast	Common Sense: Quantitative Reasoning in the Undergraduate Curriculum	University of Massachusetts Boston
3	297	Interdisciplinary	Robert	Mathieu	The CIRT Network: Shaping, Connecting, and Supporting the Future National STEM Faculty	University of Wisconsin - Madison
3	192	Engineering	Timothy	Matis	Collaborative Research: Stochastic Challenge	Texas Tech University
1	298	Interdisciplinary	George	Maughan	Advancing Diagnostic Skills Training in the Undergraduate Technology and Engineering Curriculum	Indiana State Univesity
1	193	Engineering	Michael	Mauk	Lab on a Chip: Integrating Microfluidics into the Engineering Technology Curricula	Drexel University
2	254	Geological Sciences	David	McConnell	GARNET II: Self-Regulated Learning and the Affective Domain in Physical Geology	North Carolina State University
3	27	Biological Sciences	Jenny	McFarland	Defining and Assessing the Core Principles for Undergraduate Physiology	Edmonds Community College
3	342	Mathematics	Douglas	Meade	Collaborative Research: Maplets for Calculus (M4C)	University of South Carolina
2	194	Engineering	Kathleen	Meehan	Lab-in-a-Box: Development of Materials to Support Independent Experimentation on Concepts from Circuits and Electronics	Virginia Polytechnic Institute & State University

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1	115	Computer Science	Natarajan	Meghanathan	Incorporating Systems Security and Software Security in Senior Projects	Jackson State University
2	371	Physics or Astronomy	Dawn	Meredith	Fluids for Life Science Students	Unive
3	69	Chemistry	Matthew	Miller	Fostering an Induction into Authentic Research in the Freshman/Sophomore Sequence	South Dakota State University
1	28	Biological Sciences	Dennis	Minchella	An Adaptation of a Research-Based Laboratory Model to the Life Sciences	Purdue University
1	70	Chemistry	Kereen	Monteyne	COLLABORATIVE RESEARCH: An Integrated Cognitive and Conceptual Curriculum for a General Chemistry Inquiry Laboratory	Northern Kentucky University
2	71	Chemistry	Shaun	Murphree	Introduction of a Guided-inquiry Curriculum in Organic Chemistry by Means of Microwave-assisted Synthesis	Allegheny College
3	72	Chemistry	Pushpalatha	Murthy	Enhancing Active Learning: An Inquiry-based Laboratory in Biomolecular Chemistry	Michigan Technological University
2	29	Biological Sciences	Philip	Myers	Discovering Patterns in the Natural World through Student Inquiry	University of Michigan
2	116	Computer Science	Kara	Nance	Remote Access Virtualized Environments (RAVE): Piloting a National Infrastructure for Cybersecurity Education	University of Alaska Fairbanks
3	387	Research or Assessment	Ross	Nehm	Collaborative Research: Educational Assessment Tools for Genomics and Bioinformatics Education	The Ohio State University

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1	343	Mathematics	Mary	Nelson	Colorado Momentum: Oral Assessment in the Mathematical Sciences Classroom	University of Colorado at Boulder
3	30	Biological Sciences	Pete	Nelson	Understanding Biophysics Using Microsoft Excel	Benedictine University
2	299	Interdisciplinary	Charles	Niederriter	Integrating Sustainability Across and Within the Science Curriculum of Gustavus Adolphus College	Gustavus Adolphus College
2	344	Mathematics	Deborah	Nolan	Preparing the STEM Work-force for a Data-rich World	UC Berkeley
3	345	Mathematics	Deborah	Nolan	Learning From the Scientist's Lab Book: Designing Interactive Dynamic Documents for Teaching Statistical Thinking and Practice	UC Davis
3	195	Engineering	William	Oakes	Collaborative Research: Assessing Individual Ethical Reasoning and Team Ethical Climate: Understanding their Relationship in Undergraduate Design Teams	Purdue University
1	73	Chemistry	Leah	O'Brien	Isothermal Titration Calorimetry in Upper-level Physical Chemistry and Biochemistry Laboratory Courses	Southern Illinois University Edwardsville
3	255	Geological Sciences	Eric	Oches	Integrating Earth and Environmental Science Education into a Business Curriculum Using Technology Enhanced Learning	Bentley University
1	31	Biological Sciences	Clare	O'Connor	Pathways over Time: A Research Project for the Introductory Biology Laboratory	Boston College
3	300	Interdisciplinary	Craig	Ogilvie	Dissemination of ThinkSpace: An Online Delivery Tool of Authentic, Complex Problems to Increase Students' Problem-solving Skills	Iowa State University

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1	196	Engineering	Matthew	Ohland	SMARTER Teamwork: System for Management, Assessment, Research, Training, Education, and Remediation for Teamwork	Purdue University
3	372	Physics or Astronomy	Thomas	Olsen	Expanding the STEM Workforce by Equipping Physics Graduates and Departments to Fully Engage the Career Options available to Recipients of the Bachelors Degree in Physics	American Institute of Physics (SPS)
1	256	Geological Sciences	Carol	Ormand	Developing and Testing Materials to Improve Spatial Skills in Upper Division Geoscience Courses	Carleton College
2	197	Engineering	Selahattin	Ozcelik	Laboratory-Based Robotics Program at TAMUK	Texas A&M University-Kingsville (TAMUK)
1	301	Interdisciplinary	Robert	Panoff	INSTANCES: Incorporating Computational Scientific Thinking Advances into Education & Science Courses	Shodor Education Foundation, Inc.
3	198	Engineering	Christopher	Papadopoulos	Leveraging Simulation Tools to Deliver III-Structured Problems: Enhancing Student Problem-Solving Ability in Statics and Mechanics of Materials	University of Puerto Rico Mayaguez
1	199	Engineering	Ian	Papautsky	Collaborative Research: Microfluidics for Multiple Engineering Disciplines	University of Cincinnati
2	257	Geological Sciences	Thomas	Parham	Development of Cutting-Edge Geoscience Virtual Reality Applications for Classroom Instruction and Pedagogical Evaluation of the Impact of Learning of VR Technology	Iowa State University
2	200	Engineering	Hirak	Patangia	Development of Novel Learning Materials for Green Energy Education Centered Around a Photovoltaic (PV) Test Station	University of Arkansas-Little Rock
2	32	Biological Sciences	Mark	Pauley	Integrating Bioinformatics into the Life Sciences Phase 2	University of Nebraska at Omaha

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1	346	Mathematics	Dennis	Pearl	CAUSEmos: CAUSE Making Outreach Sustainable for Statistics Educators	The Ohio State University
2	302	Interdisciplinary	Katherine	Perkins	Physics and Chemistry Education Technology	University of Colorado Boulder
3	303	Interdisciplinary	Jeff	Phillips	Problem-solving Examples with Narration for Students (PENS)	Loyola Marymount University
3	201	Engineering	Olga	Pierrakos	Design and Implementation of an Innovative Problem-based Learning Model and Assessment Tools in Undergraduate Engineering Education	James Madison University
1	373	Physics or Astronomy	Steven	Pollock	Developing Research-Based Tutorials in Upper-Division Electricity and Magnetism	University of Colorado at Boulder
1	304	Interdisciplinary	Darrell	Porcello	Infusing Emerging Nano and Green Technologies into Community College STEM Curriculum	University of California, Berkeley
1	202	Engineering	Danilo	Pozzo	A Consolidated Chemical Engineering Laboratory with a Focus on Bioenergy	University of Washington
2	203	Engineering	Michael	Prince	Collaborative Research: Inquiry-Based Activities to Repair Persistent Student Misconceptions of Critical Engineering Concepts	Bucknell University
3	117	Computer Science	Kai	Qian	Collaborative Research: Portable, Modular, Modern Technology Infused Courseware for Broader Embedded Systems Education	Southern Polytechnic State University
1	118	Computer Science	Xiao	Qin	QoSec: A Novel Middleware-Based Approach to Teaching Computer Security Courses	Auburn University

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3	204	Engineering	Stella	Quinones	A Novel Applied Quantum Mechanics Course for Electrical Engineers	The University of Texas at El Paso
2	305	Interdisciplinary	Ian	Quitadamo	Using Community-Based Inquiry to Build Faculty Capacity and Student Critical Thinking	Central Washington University
1	205	Engineering	Ravi	Ramachandran	Collaborative Research: TUES: Vertical Integration of Concepts and Laboratory Experiences in Biometrics Across the Four Year Electrical and Computer Engineering Curriculum	Rowan University
2	119	Computer Science	Bina	Ramamurthy	A Comprehensive Framework for Timely Introduction of Emerging Data-Intensive Computing to STEM Audiences	University at Buffalo
3	120	Computer Science	Rajiv	Ramnath	Curriculum for Accelerated Services Engineering	The Ohio State University
2	374	Physics or Astronomy	Travis	Rector	RBSE-U: The Implementation of Research-Based Science Education in Astronomy for Undergraduates	University of Alaska Anchorage
3	375	Physics or Astronomy	Edward	Redish	Collaborative: Research: Creating a Common Thermodynamics	University of Maryland
2	206	Engineering	Teri	Reed-Rhoads	ciHUB.org, a Virtual Community to Support Research, Development, and Dissemination of Concept Inventories	Purdue University - West Lafayette
3	207	Engineering	Kenneth	Reid	Classification of First Year Engineering Courses Based on Descriptions, Outcomes, Assessment	Ohio Northern University
3	306	Interdisciplinary	Jane	Rice	Integrated Science through Foundational Big Ideas: Learning Modules for Pre-service Elementary Teachers	Michigan State University

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1	121	Computer Science	Susan	Rodger	Integrating Visualization and Interaction into the Formal Languages and Automata Course	Duke University
1	208	Engineering	Carolyn	Rose	Collaborative Research: Networked Collaboration Modules for Integrating Mathematics and Engineering Education Using Intelligent Agents	Carnegie Mellon University
3	33	Biological Sciences	Anne	Rosenwald	Generating a Community for Undergraduate Research Through the Use of Comparative Microbial Genomics	Georgetown University
2	209	Engineering	Benjamin	Ruddell	Collaborative Research: Cyber Enabled Data and Modeling Driven Curriculum Modules for Hydrology Education	Arizona State University
1	307	Interdisciplinary	Arlene	Russell	Opening the Teaching Pipeline for STEM Majors at UCLA	University of California, Los Angeles
2	122	Computer Science	Jungwoo	Ryoo	An Immersive Security Education Environment (I-SEE) Using Second Life	The Pennsylvania State University
3	210	Engineering	Maryam	Saeedifard	Collaborative Research: Development of a New Power Electronics Curriculum Relevant to Tomorrow's Power Engineering Challenges	Purdue University
1	211	Engineering	Jafar	Saniie	Remote Access Environments for Undergraduate Computer Engineering Laboratories	Illinois Institute of Technology
1	376	Physics or Astronomy	Eleanor	Sayre	Collaborative Research: Developing a Tool for Teachers to Assess Real-time Learning and Forgetting in Large Classes	Kansas State University
3	390	Social Sciences: (Mathematics Teacher Preparation)	Edna O.	Schack	Collaborative Research: Noticing Numeracy Now	Morehead State University

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2	377	Physics or Astronomy	Michael	Schatz	Transforming Homework into Cyberlearning in an Introductory STEM Course	Georgia Tech
3	123	Computer Science	Madeleine	Schep	Computer Science for the Liberal Arts: Reaching an Untapped Pool of Students	Columbia College
2	308	Interdisciplinary	Kimberly	Schneider	Learning Environment and Academic Research Network (LEARN): A Model for Retention in the STEM Disciplines	University of Central Florida
2	212	Engineering	Lisa	Schneider	Applications and Confidence Inventories for Assessing Curricular Change in Introductory Engineering Mathematics Instruction	Cornell University
3	378	Physics or Astronomy	Scott	Schultz	New Faculty Workshop for TYC Physics Faculty	American Association of Physics Teachers
3	309	Interdisciplinary	Renee	Schwartz	Engaging STEM Students from the Beginning: An Interdisciplinary Approach to Teaching Introductory Biology and Chemistry	Western Michigan University
3	213	Engineering	Roger	Seals	Strengthening the Competitiveness of Engineering and Computer Science Faculty	Louisiana State University
1	310	Interdisciplinary	Dusan	Sekulic	Systems Thinking for Sustainability	University of Kentucky
1	214	Engineering	Sukalyan	Sengupta	Development and Testing of a Fundamentals of Environmental Engineering Concept Inventory	University of Massachusetts Dartmouth
2	215	Engineering	Youngwoo (Young)	Seo	Water Distribution System Analysis Lab Modules and Kits for Undergraduate Education	University of Toledo

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3	216	Engineering	Mehdi	Setareh	Integrating Web-Based Visualization With Structural Systems Understanding To Improve The Technical Education Of Architects	Virginia Tech.
1	217	Engineering	David	Shaffer	Professional Practice Simulations for Engaging, Education and Assessing Undergraduate Engineers	University of Wisconsin-Madison
2	218	Engineering	Sheri	Sheppard	Collaborative Research: Engineering Pathways Study--The College-Career Transition Informing Educational Practice	Stanford University
3	219	Engineering	Enid	Sichel	Authoring Tool for a Hands-on, On-line, Lab Curriculum for Engineering Technology Students	Five Colleges, Inc., Amherst MA
2	347	Mathematics	Kyle	Siegrist	The Probability Distributome Project: Interactive Teaching of Probability Distributions Theory and Applications using Data, Models and Webapps	University of Alabama in Huntsville
1	391	Social Sciences: (Economics)	Scott	Simkins	Developing an Economics Pedagogic Portal	North Carolina A&T State University
1	220	Engineering	Judith	Sims-Knight	Can Students Use Assessment-based Double-loop Learning to Improve their Design Skills?	UMASS Dartmouth
3	258	Geological Sciences	Jill	Singer	Collaborative: Faculty Development to Support High Impact Activities that Transform Undergraduate Geoscience Education	SUNY - Buffalo State
1	124	Computer Science	Murali	Sitaraman	Hands-On Collaborative Reasoning Across the Curriculum Phase II	Clemson University
2	221	Engineering	Brian	Skromme	Problem Generation, Solution, Student Input, and Tutoring Modules for Introductory Linear Circuit Analysis	Arizona State University

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3	222	Engineering	Joseph	Slater	Enhancing Integrated Technology and Interdisciplinary Based Engineering Education Through the High Altitude Balloon (HAB) Experience	Wright State University
1	34	Biological Sciences	James	Smith	Integrative Case Studies in Evolution Education	Michigan State University
2	74	Chemistry	Jerry	Smith	Collaborative Research: Chemistry Coalitions, Workshops, and Communities of Scholars	Georgia State University
2	311	Interdisciplinary	Michelle	Smith	Environmental AIMS (Applied Investigations in Mathematics & Statistics): Excellence in Undergraduate Participatory Real-world Research in the Environmental Sciences	Eastern Kentucky University
2	125	Computer Science	Leen-Kiat	Soh	Integrated Computational and Creative Thinking (IC2Think)	University of Nebraska
1	379	Physics or Astronomy	Chitra	Solomonson	Introducing Research Experiences at Community Colleges	Green River Community College
1	223	Engineering	Gangbing	Song	Collaborative Research: Develop Innovative Labs-to-Go Kits for Multidisciplinary Undergraduate Engineering and Technology Education	University of Houston
2	392	Social Sciences: (Sociology)	Roberta	Spalter-Roth	Innovation in Digital Libraries: An Experimental Examination of the Production, Diffusion, and Use of STEM Teaching Materials	American Sociological Association
2	224	Engineering	Andreas	Spanias	Collaborative Research: Phase 3 Design, Implementation and Dissemination of Multidisciplinary online Java Digital Signal Processing (J-DSP) Materials	Arizona State University
2	35	Biological Sciences	Kathrin	Stanger-Hall	Animated Case Studies In Science (ACSIS): Transforming Student Learning of Biology	University of Georgia

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3	312	Interdisciplinary	Barry	Stein	Expanding Use of the CAT: Assessing and Improving Critical Thinking	Tennessee Tech University
3	36	Biological Sciences	Eleanor	Sterling	Developing and Assessing Process Skills in Conservation Biology and Other Integrative Fields	American Museum of Natural History
1	37	Biological Sciences	Stephanie	Stockwell	CCLI: Establishing a Microarray Teaching and Learning Center in the Shenandoah Valley in Support of Science Education	James Madison University
3	225	Engineering	Ruth	Streveler	Collaborative Research: Expanding and Sustaining Research Capacity in Engineering and Technology Education: Building on Successful Programs for Faculty and Graduate Students	Purdue University
3	126	Computer Science	Aaron	Striegel	Curriculum and Laboratory Development Through 3-D Interfacing via the Nintendo Wiimote	University of Notre Dame
1	226	Engineering	Carlos	Stroud	Collaborative Research - CCLI Phase II: Diverse Partnership for Teaching Quantum Mechanics and Modern Physics with Photon Counting Instrumentation	University of Rochester
3	348	Mathematics	Rodney	Sturdivant	Playing Games with a Purpose: A New Approach to Teaching and Learning Statistics	United States Military Academy at West Point
1	313	Interdisciplinary	Jaspal	Subhlok	Collaborative Research: Tablet PC-Based Indexed Captioned Searchable Videos for STEM Coursework	University of Houston
2	314	Interdisciplinary	Benjamin	Surplless	Breadth and Depth in Elemental Analysis	Trinity University
1	349	Mathematics	Jeff	Suzuki	Mathematics and Social Advocacy	Brooklyn College

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2	227	Engineering	Christopher	Swan	Engineering Faculty Engagement in Learning Through Service - EFELTS	Tufts University
3	315	Interdisciplinary	Mary Anne	Sydlik	Collaborative Research: Automated Analysis of Constructed Response Concept Inventories to Reveal Student Thinking: Forging a National Network for Innovative Assessment Methods	Western Michigan University
1	316	Interdisciplinary	Donald	Takehara	High Altitude Ballooning in Undergraduate STEM Curriculum: Preparing for Widespread Implementation	Taylor University
2	38	Biological Sciences	Robert	Tallitsch	The Effects of Computer-assisted Instruction in Teaching Human Anatomy: An Experimental Study	Augustana College
3	39	Biological Sciences	Kimberly	Tanner	CCB FEST: Community College Biology Faculty Enhancement Through Scientific Teaching	San Francisco State University
3	228	Engineering	Patrick	Tebbe	Full Development of Engineering Scenarios to Promote Student Engagement in Thermodynamics Related Courses	Minnesota State University, Mankato
2	380	Physics or Astronomy	Robert	Teese	Collaborative Research: LivePhoto Physics Interactive Video Vignettes	Rochester Institute of Technology
3	75	Chemistry	Glena	Temple	Development of a Two-semester Inquiry-based Capstone Laboratory Experience for Biochemistry Majors at Viterbo University	Viterbo University
3	381	Physics or Astronomy	John	Thompson	Collaborative Research: Research and Curriculum Development in Thermal Physics	University of Maine
1	40	Biological Sciences	Katerina	Thompson	MathBench Biology Modules: Expansion of Implementation and Assessment	University of Maryland

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2	350	Mathematics	Nathan	Tittle	Developing an Innovative Randomization-based Introductory Statistics Curriculum	Dordt College
1	229	Engineering	Beth	Todd	The Coach	University of Alabama
2	41	Biological Sciences	Lillian	Tong	Disseminating Scientific Teaching	University of Wisconsin-Madison
1	127	Computer Science	Massood	Towhidnejad	A Curriculum Wide Software Development Case Study	Embry-Riddle Aeronautical University
1	76	Chemistry	Marcy	Towns	Visualizing the Chemistry of Climate Change	Purdue University
2	128	Computer Science	MarySheila	Tracy	Can Ethics Instruction Improve Students' Technical Skills in Computer Science?	University of Illinois Springfield
3	42	Biological Sciences	Eric	Triplett	Sequencing Gators: Building a Genome Science Curriculum at the University of Florida and Beyond	University of Florida
2	317	Interdisciplinary	Joseph	Tront	Toward Improving Dissemination & Building Community for CCLI Innovations	Virginia Tech
3	318	Interdisciplinary	Mark	Tuominen	Development and Porting of iCons III: Student-Designed Labs in Renewable Energy	University of Massachusetts Amherst
2	230	Engineering	Jennifer	Turns	Identifying implications: Using Personas to Bridge the Gap between Research Findings and the Design of Educational Experiences	University of Washington

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3	231	Engineering	Stephen	Turns	Improving Students' Problem-solving in Thermodynamics	Pennsylvania State University
1	232	Engineering	Nelson	Uhan	The POET Project: Investigating the Use of Visualization to Effectively Teach Optimization Modeling Skills	Purdue University
2	233	Engineering	John	Uhran	On Engineering Education: The Role of the First Year	Univ of Notre Dame
2	77	Chemistry	Harry	Ungar	Community College Chemistry Faculty into Bridging Community College Chemistry Faculty into the National Educational Community	Cabrillo College
1	319	Interdisciplinary	Mark	Urban-Lurain	Collaborative Research: Automated Analysis of Constructed Response Concept Inventories to Reveal Student Thinking: Forging a National Network for Innovative Assessment Methods	Michigan State University
1	259	Geological Sciences	Deanna	Van Dijk	First-Year Research in Earth Sciences (FYRES): Dunes	Calvin College
3	234	Engineering	Bernard	Van Wie	Multi-Disciplinary Project-Based Paradigm that Uses Hands-on Desktop Learning Modules and Modern Learning Pedagogies	Washington State University
1	235	Engineering	Noe	Vargas Hernandez	CCLI Phase II: Collaboration Research: Systematic Ideation Curriculum Effectiveness Investigation & Deployment to Enhance Design Learning	University of Texas at El Paso
3	78	Chemistry	Pratibha	Varma-Nelson	Cyber PLTL (cPLTL): Development, Implementation, and Evaluation	Indiana University Purdue University Indianapolis
3	129	Computer Science	Rakesh	Verma	Collaborative Research: An Interactive Undergraduate Data Mining Course with Industrial-Strength Projects	University of Houston

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2	236	Engineering	Margot	Vigeant	Collaborative Research: Using Video Media to Enhance Conceptual Learning in Thermodynamics	Bucknell University
2	320	Interdisciplinary	Elsa	Villa	Building Support Structures for Full Adoption of the Affinity Research Group Model	University of Texas-El Paso
3	321	Interdisciplinary	Travis	Wagner	Applied Energy Education at the University of Southern Maine	University of Southern Maine
3	237	Engineering	Isaac	Wait	Collaborative Research: Implementing and Assessing Strategies for Environments for Fostering Effective Critical Thinking (EFFECTs) Development and Implementation	Marshall University
2	260	Geological Sciences	Ping	Wang	Collaborative Research: Bringing Problem Solving in the Field into the Classroom: Developing and Assessing Virtual Field Trips for Teaching Sedimentary and Introductory Geology	University of South Florida
1	238	Engineering	Kimberly	Warren	Development, Implementation, and Assessment of Geotechnical Concept Tools (GCT)	UNC Charlotte
1	322	Interdisciplinary	Frank	Wattenberg	DIYModeling -- Do It Yourself Modeling and Simulation for STEM Learning	United States Military Academy
1	43	Biological Sciences	Mary Pat	Wenderoth	SPARST: Assessing the Process of Science	Univeristy of Washington
3	261	Geological Sciences	Jennifer	Wenner	COLLABORATIVE RESEARCH: Expansion of 'The Math You Need, When You Need It' through widespread implementation	University of Wisc Oshkosh
1	79	Chemistry	Thomas	Wenzel	Development of E-Learning Modules for Analytical Chemistry	Bates College

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1	382	Physics or Astronomy	Ralf	Widenhorn	Physics in Medicine: Active Learning Tools for Undergraduate Physics Courses Developed in a Joint Collaboration of STEM Scientists and Medical Experts	Portland State University
2	239	Engineering	Christopher	Williams	Advancing Personalized Engineering Learning via an Adaptive Concept Map	Virginia Tech
2	323	Interdisciplinary	Kathy	Williams	NSF DUE/TUES: Project PLURIS Purposeful Learning in Undergraduate Research and Independent Studies	San Diego State University
3	240	Engineering	Robert	Williams	Interactive Virtual Haptics-Augmented Statics and Dynamic Activities	Ohio University
2	44	Biological Sciences	Michelle	Withers	The Pursuit of Excellence: Transforming Undergraduate Science Education through Evidence-Based Practice	West Virginia University
1	130	Computer Science	Weichen Eric	Wong	Incorporating Software Testing into Multiple Computer Science and Software Engineering Undergraduate Courses	University of Texas at Dallas
2	80	Chemistry	Steven	Wood	ChemCompanion; A Digital Text for the First-Year College Chemistry Course	Brigham Young University
3	81	Chemistry	David	Woon	Discovering the Nanoworld: A New Module for Teaching about Molecules and Bonding in General Chemistry	University of Illinois at Urbana-Champaign
3	45	Biological Sciences	Xinyuan	Wu	Virtual Ecological Inquiry (VEI) - A Virtual Environment for Inquiry-based Learning and Research	Texas A&M University
2	131	Computer Science	Li	Yang	Collaborative Project: Teaching Cryptography through Hand-on Learning and Case Studies	University of Tennessee at Chattanooga

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1	82	Chemistry	David	Yaron	Online Chemistry: Problems, Concepts and Contexts	Carnegie Mellon University
3	351	Mathematics	Philip	Yasskin	Collaborative Research: Maplets for Calculus (M4C)	Texas A&M University
3	324	Interdisciplinary	Jeannette	Yen	Biologically Inspired Design: A Novel Interdisciplinary Biology-engineering Curriculum	Georgia Institute of Technology
1	325	Interdisciplinary	Huseyin	Yuce	Brooklyn Waterfront 2050	New York City College of Technology-CUNY
1	241	Engineering	Tao	Zhang	Enhancing the Electrical and Computer Engineering Curriculum by Integrating Applications of Wireless Technology	New York Institute of Technology
2	242	Engineering	Yongpeng	Zhang	Developing Virtual and Remote Undergraduate Laboratory for Engineering Technology	Prairie View A&M University
3	243	Engineering	Weizhao	Zhao	Collaborative Development and Application of Distributable, Internet Accessible, Interactive Medical Imaging Teaching Software and Dynamic Tracking System	University of Miami
1	244	Engineering	Wei	Zheng	Novel Development of Lab and Course Modules: Integrate Intelligent Structure Technology and Self-Regulated Learning to Inspire Motivated and Strategic Learners in STEM	Jackson State University
3	132	Computer Science	Feng	Zhu	PSP: A Novel Framework to Teach Students Security and Privacy for Pervasive Computing Environments	University of Alabama in Huntsville
1	133	Computer Science	Hongwei	Zhu	Improving Programming and Financial Literacy Education Using Student-Developed Games	Old Dominion University

2013 TUES PIs Conference
Washington, DC - January 23-25, 2013
Poster Session Schedule
(Alpha Order by PI Last Name)

Poster Session 1: Wed., Jan. 23rd - 7pm - 9pm
Poster Session 2: Thurs., Jan. 24th - 10:45pm - 12:15pm
Poster Session 3: Thurs., Jan. 24th - 3:30pm - 5pm

Poster Session	Poster #	STEM Discipline	PI First Name:	PI Last Name:	Project Title:	Institution:
2	245	Engineering	Richard	Zollars	Exploring Studio-Based Learning in Chemical Engineering Education	Washington State University
1	262	Geological Sciences	Joseph	Zume	Integration of Near-surface Geophysical Imaging Technology into a Geoenvironmental Science Undergraduate Curriculum.	Shippensburg University