

ACTER *Association for
Career and Technical
Education Research*

2023

**Research and Professional
Development Conference**

Phoenix, AZ

November 27th to 29th, 2023

Navigating the Sands of Change in CTE

#ACTER2023 - @ACTERCareerTech



P H O E N I X

ACTER *Association for Career and Technical Education Research*

ACTER is a national membership association that aims to stimulate research and development in CTE, to stimulate training and education programs designed to prepare people for responsibilities in CTE research, to foster cooperative CTE research and development activities, and to facilitate the dissemination of research findings and diffusion of knowledge.

2023 Leadership



Mickey Kosloski, President Old Dominion University	Jordan Dolfi, Treasurer, NC State University
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ACTER Trustees and Special Appointments

Michelle Bartlett, Professional Development Old Dominion University	Jodie Adams, Finance University of Louisville
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ACTER Journals

Career and Technical Education Research (CTER)	Journal of Career and Technical Education (JCTE)
Editor: Eddie Fletcher Ohio State University	Co-Editor Eddie Fletcher, The Ohio State University
Associate Editor Katherine Kandalec Holm	Co-Editor Victor M. Hernandez-Gantes, Univ of South Florida
Managing Editor Sara Shaw, University of Central Florida	Editorial Board Chair Open
Editorial Board Chair Mark Threeton, Pittsburg State University	

 <h2>Omicron Tau Theta</h2> <p>A national, honorary, professional graduate society in CTE, established to acknowledge the achievement of graduate students, professional educators, and leaders of business, industry, and government in CTE.</p> <p>2023 OTT Trustee, Katherine Kandalec Holm</p>	 <p>http://www.theuniversitycouncil.org</p> <p>An organization of universities with doctoral programs in Career and Technical Education (CTE) and/or Human Resource Development (HRD) aiming to provide leadership for teaching, research, service, and policy initiatives in the field of practice shared by CTE & HRD.</p>
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<h3>ACTE's CareerTech VISION</h3> <p>http://www.acteonline.org</p> <p>The CTE Research and Professional Development Conference is a companion event of ACTE's annual CareerTech VISION and Expo, the premier gathering of more than 4,000 CTE professionals. ACTE (Association for Career and Technical Education) is a membership organization aspiring to empower educators to deliver high quality CTE programs that ensure all students are positioned for career success.</p> <p>Members align with one or more "divisions" related to program area and/or professional role. The New and Related Services Division includes 16 sections representing specializations that cross multiple career clusters. Research, Teacher Education, and Professional Development are 3 of the 16 NRS sections, and the Research section is headed by the ACTER Ambassador-at-Large. The Research, Teacher Education, and Professional Development sections will combine this year to form one NRS section, CTE Scholars, uniting ACTE members who study and teach CTE content in higher education settings.</p>	 <p>ASSOCIATION FOR CAREER & TECHNICAL EDUCATION®</p>
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Postsecondary CTE Research Fellows Program

Enhances and strengthens CTE Postsecondary research by supporting research, professional development, and conference travel of CTE Research Fellows at universities nationwide. Funded by the ECMC Foundation.

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MONDAY, NOVEMBER 27th, 2023	TUESDAY, NOVEMBER 28th, 2023
Conference Registration	Conference Registration
11 am – 5 pm, ACTER Registration Hyatt, Borien Foyer	7:30 am, ACTER Registration Conference Center, 132 Foyer
Past-Presidents Lunch	Welcome
12 pm to 1 pm, Invitation Only (off-site)	7:45 am to 9:10 am, Breakfast Conference Center, 132 Foyer
Pre-Conference Workshop	Greetings from the Conference Partners Mickey Kosloski, President, ACTER Katherine Kandalec Holm, OTT Michelle Bartlett, Pre-Conference Kesha Valentine, Conference Chair
2 pm to 5 pm, Exploring the Delphi Technique for CTE Research Hyatt, Remington	Welcome Address Context Matters – A Personal Journey John Foster, NOCTI
Editorial Board Meetings	Concurrent Sessions I
4 pm to 5 pm, CTER Editorial Board Hyatt, Borien A	9:20 am to 10:40 am Conference Center, 221 A, 221 B, 221 C
Executive Committee Meeting	Concurrent Sessions II
5 pm to 6 pm, Executive Committee Meeting Hyatt, Borien A	10:45 am to 12:05 pm, 221 A, 221 B, 221 C
Research Poster Session and Opening Reception	Lunch & Round Tables
6:30 pm to 8 pm, Research Poster Session and Welcome Reception Hyatt, Cassidy	Roundtables I: 12:10 pm to 1:00 pm Roundtables II: 1:10 pm to 2:00 pm Conference Center, Room 132
Fireside Chat	Concurrent Sessions III
8:00 pm to 9:00 pm, Obtaining and Advancing a Career in the Academy Hyatt, Borien A	2:05 pm- 3:25 pm, 221 A, 221 B, 221 C
	Concurrent Sessions IV
	3:35 pm – 4:55 pm, 221 A, 221 B, 221 C
	Business Meeting
	5:15 pm – 6:15 pm, Room 132
	Executive Committee Meeting
	6:30 pm to 7:30 pm, Room 132

**Concurrent Sessions I: Leading CTE, Cost, & Faculty Alignment, & Outcomes
9:20 AM – 10:40 AM**

Research Paper Session 1: Leadership in CTE – ROOM 221 A

Discussant: Mary Jo Self, Oklahoma State University

Chair: Dr. Carrington M. Faulk, Old Dominion University

<p>Paper 1: Priorities of School Superintendents for Hiring and Supervising School-Based Agricultural Education Teachers in Oklahoma</p> <p>Christopher J. Eck, Oklahoma State University Nathan A. Smith, Oklahoma State University</p>	<p>Administrators play a key role in the decision-making process, essential for complete program success. Therefore, it is essential to consider the priorities of administrators when hiring and supervising SBAE teachers, because trained or not, these administrators are making impactful decisions ultimately affecting student achievement.</p>
<p>Paper 2: The Status of CTE Administrative Leadership Requirements and Programs: An Ongoing Examination</p> <p>Chris Zirkle, The Ohio State University Caleb Thomson, The Ohio State University</p>	<p>The current climate of career and technical administration requirements in all 50 states will be detailed. The number of states requiring a specific career-technical administration certification/licensure to oversee programs has continued its decades-long decline. Data were collected from all 50 states regarding CTE administration requirements and colleges/universities offering coursework.</p>
<p>Paper 3: Enhancing the Instructional Leadership Skills of Regional Shared-Time Center Directors</p> <p>James R Stone III, Jon Schmidt-Davis, Dr. Lisa Shannon, & Jen Gruber The National Research Center for Career & Technical Education at the SREB</p>	<p>This is a report on early findings from a Development and Innovation study designed to explore a model for enhancing the instructional leadership skills of shared-time technology center directors in the United States. A two-phase, iterative approach to curriculum and pedagogic design will be tested.</p>

Symposium 1: Cost Studies of CTE – ROOM 221 B

Chair: Audrey Boochever

<p>Symposium 1: Cost Studies of CTE: Considerations and Recent Examples</p> <p>Tara Smith, Jobs for the Future Katherine Hughes, American Institutes for Research Clare Flack, New York University Mary M. Smith, Vanderbilt University</p>	<p>This symposium will explore cost factors that may be unique to CTE and the pros and cons of the “ingredients method.” Panelists will also discuss how researchers can work with program leaders and business office staff to develop cost estimates and cost analyses to support investments in CTE programs.</p>
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Research Paper Session 2 – ROOM 221 C

Discussant: Matt Spindler, Pennsylvania State University

Chair: Sara Shaw, University of Central Florida

<p>Paper 4: Changes in Career and Technical Education Teacher Candidates’ Self-Efficacy Over Time</p> <p>Laura Hasselquist, South Dakota State University Patrick Hales, South Dakota State University</p>	<p>Teacher identity is linked to teacher self-efficacy. This study sought to explore career and technical education teacher candidates’ self-efficacy development over time. Both quantitative and qualitative data were collected to fully understand the experience. Teacher candidates became more efficacious throughout the program but experienced the most gains in self-efficacy while on campus.</p>
<p>Paper 5: Professional Development Needs of CTE Teachers in Idaho: A Literature Review</p> <p>Amanda C. Moore-Kriwox, University of Idaho John G. Cannon, University of Idaho</p>	<p>The purpose of this research was to review the existing literature related to CTE Professional Development. This review examined 80 articles and found overarching themes related to CTE PD. The themes are CTE characteristics, CTE PD, digital world/Generation Z students, college/career readiness, traditional/alternative certification, teacher community, laboratory safety, and administration.</p>

Research Paper Session 2 – ROOM 221 C (CONT.)

<p>Paper 6: A Descriptive Profile of Career and Technical Education Teachers</p> <p>Andrew R. Diemer, Saint Louis University J. Cameron Anglum, Saint Louis University Walt Ecton, Florida State University Tuan Nguyen, Kansas State University</p>	<p>We discuss the importance of CTE teacher education to match the future demand for CTE employment. We highlight the need to provide equal opportunities for all students to participate in CTE fields and the importance of the CTE teacher in facilitating the transition from school to career.</p>
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**Concurrent Sessions II: Experiential Learning, Talent, & Professional Development
 10:45 AM – 12:05 PM**

Research Paper Session 3 – Conference ROOM 221 A

Discussant: Brooke Thiel, North Dakota State University

Chair: Candace Claar, The Pennsylvania State University

<p>Paper 7: The Relationship Between Job Satisfaction and Teacher Burnout of Mississippi Agricultural Education Teachers During COVID-19</p> <p>Anna Hollis, Wayne County Career and Technical Center Dr. Kirk Swortzel, Mississippi State University Dr. OP McCubbins, Mississippi State University</p>	<p>This study described the level of burnout and job satisfaction among Mississippi agricultural education teachers who taught during the COVID-19 Pandemic. There was a moderate, positive relationship between personal accomplishment and job satisfaction and negative relationships between both emotional exhaustion and depersonalization with job satisfaction.</p>
<p>Paper 8: An examination of pre-service and in-service school-based agricultural educators international professional development experience in Malaysia</p> <p>Laura Rice, University of Minnesota, Daniel D. Foster, Pennsylvania State University, Bradley Kinsinger, Kirkwood Community College, Melanie J. Miller Foster, Pennsylvania State University, Laura L. Rice, University of Minnesota and Jon Ramsey, Oklahoma State University</p>	<p>To ensure we have a globally competent workforce prepared to meet the needs of a diverse and growing society, globally competent educators are needed. To help address this need, six pre-service teacher candidates and six in-service school-based agricultural education teachers from the United States embarked on a four-week international professional development.</p>
<p>Paper 9: Professional Development Preferences of Oklahoma School-Based Agricultural Education Teachers</p> <p>Emily Sewell, Oklahoma State University Christopher J. Eck, Oklahoma State University Bradley M. Coleman, Oklahoma State University</p>	<p>In part of a larger mission to address professional development among teachers, this study targeted the preferences of SBAE teachers in Oklahoma through a non-experimental survey research study census approach. This study implemented crosstabs analysis in SPSS to compare between personal and professional characteristics and professional development preferences.</p>
<p>Paper 10: An Exploratory Evaluation of the Agricultural Career Experiences Curricular Resource</p> <p>Emily Sewell, Oklahoma State University J. Shane Robinson, Oklahoma State University</p>	<p>An exploratory evaluation of SBAE students’ perceived knowledge, experience, interest, and motivation toward the AFNR Career Pathways (The Council, 2015) while engaging the Agricultural Career Experience (AgCE). The Theory of Planned Behavior guided the evaluation’s attempt to understand student and teacher experiences with the resource. Using a convergent, parallel mixed-methods design, data were collected through questionnaires and interviews.</p>

Symposium 2: ROOM 221 B

Chair: Andrew Diemer, St. Louis University

<p>Symposium 2: CTE Principal Job Satisfaction</p> <p>Dr. Donna Crouch, Murray State University Dr. Eric Bates, Murray State University Dr. Kemaly Parr, Murray State University</p>	<p>The purpose of this article is to examine the factors CTE principals identify as influential on their perceptions of their administrative roles as well as their job satisfaction. The factors that CTE principals identified as contributing to their job satisfaction were summarized and classified through quantitative analysis based on a survey developed in Qualtrics. Results represent patterns and trends of variables that influenced principals’ decisions in their roles within their CTE positions.</p>
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Research Paper Session 4: ROOM 221 C

Discussant: Anthony M. Perry, University of North Dakota

Chair: Caleb Thomson, The Ohio State University

<p>Paper 11: Exploring Work-Based Learning in California Community Colleges</p> <p>Emily Alonso, University of California Davis</p>	<p>WBL has become an integral part of the U.S. Community College (CC) system. Despite investments in WBL, including Perkins funds and the Strong Workforce Program in California, it is unclear how success rates. This paper aims to understand these patterns drawing on rich administrative data from the California CC system.</p>
<p>Paper 12: Employer’s Decision to Hire Secondary Career and Technical Education Completers Based Upon the Pennsylvania Skills Certificate</p> <p>Dr. Patricia Leibfreid, Pennsylvania State University</p>	<p>This experimental investigation discovered employers’ perception of a credential issued to Pennsylvania’s secondary career and technical education program completers. This investigation adds empirical evidence concerning employer’s perceptions of credentials and is additional evidence of the complications relating to the myriad of credentials and the employer’s value of them.</p>
<p>Paper 13: Online Experiential Learning in Career and Technical Education</p> <p>Matthew Bornak, Pennsylvania State University</p>	<p>Interest in online learning has gained a resurgence by academics and practitioners (Ekin, 2022). Little research regarding the relationship between technology, online learning, and experiential learning exists (Bassanjav, 2013). Queries about online experiential learning (OEL) in CTE yielded unsatisfactory results. Yet, OEL is incorporated into CTE and the uptrend continues.</p>

Box Lunch & Roundtable Session I / 12:10 – 1:00 PM, 132

Session I Round Table 1 - Elevating Education: Investigating Quality ILP Implementation in Nevada Schools
 Xue Xing, University of Nevada – Las Vegas

Session I Round Table 2 - A Case Study on the Perceived Relevant Experiences in a Postsecondary Woodworking Program
 Christopher J Wernimont, University of Arkansas

Session I Round Table 3 - The [deidentified] TM Model: Broadening Participation of Women of Color in the STEM+C Workforce in Texas
 Shetay Ashford-Hanserd, Texas State University
 Twyla Hough, Texas State University

Session I Round Table 4 - The Postsecondary CTE Teacher Shortage: An Integrative Literature Review
 James Bartlett, Old Dominion University
 Michelle Bartlett, Old Dominion University

Session I Round Table 5 - Perceptions of Novice Career & Technical Education Teachers Regarding Teacher Evaluations
 Felix Quayson, The Ohio State University
 Chris Zirkle, The Ohio State University

Roundtable Session II / 1:10 – 2:00 PM, 132

Session II Round Table 6 - The Lived Experience of North Carolina Community College Female Career Technical Education Instructors Around Mentoring and Being Mentored

Jennifer LaDue, Old Dominion University
Michelle Bartlett, Old Dominion University

Session II Round Table 7 - Key Partnership Roles in High-Quality Pre-Apprenticeship Programs

Rusty Parker, North Carolina State University
James E. Bartlett, II, Old Dominion University
Michelle E. Bartlett, Old Dominion University

Session II Round Table 8 - Changing the “Dreaded” Discussion Board: Using Flipgrid to Increase Student Communication and Inquiry in Online Learning

Sydney Cox, Texas Tech University
Karen Alexander, Texas Tech University
Kyle Roberson, Texas Tech University

Session II Round Table 9 - The Impacts of Career and Technical Education - Focused Dual Enrollment on Student Postsecondary Success

Audrey Boochever, University of California Davis

Session II Round Table 10 - Exploring Space Careers in Middle School: A State CTE Teacher Accelerator

Sara Shaw, University of Central Florida
Lisa Martino, University of Central Florida

**Concurrent Sessions III: High-Quality CTE: Viewpoints on Research & Practice
2:05 PM – 3:25 PM**

Research Paper Session 5: ROOM 221 A

Discussant: Dave Macholz, Old Dominion University

Chair: Mia Kennedy, NC State University

<p>Paper 15: Knowing Your Assets: Navigating Best Practices Thorough an Exemplary Case Study Focused on an Automotive Technology Associate Degree Programs</p> <p>Emily T. Creamer, The Ohio State University Susannah Townsend, The Ohio State University Matthew Mayhew, The Ohio State University</p>	<p>Using Harper’s (2010) Anti-Deficit Achievement Framework, this case study focuses on best practices for community college student success, retention, graduation, and workforce entry. Preliminary findings include strong faculty involvement, formative plans for curricular improvement, and reducing financial burdens for students through paid internships.</p>
<p>Paper 16: Lessons Learned from Returning Second Year Technical Students: A Case Study</p> <p>Dr. Mary Jo Self, Oklahoma State University Dr. Adam Ellis, Oklahoma State University Dr. Penny Cantley, Oklahoma State University Dr. Jon Loffi, Oklahoma State University Dr. Kerri Kearney, Oklahoma State University</p>	<p>This qualitative case study explored how Holland's person-environment fit theory explains how outside contributors influence a student’s decision to return for a second year of their academic career program. Using the theoretical lens, this study contemplates how specific contributors, such as family and friends, surroundings, influence the student’s overall well-being and career decisions.</p>
<p>Paper 17: United We Stand? State NAAE and ACTE Affiliate Membership Agreements and State Career and Technical Education (CTE) Funding Levels</p> <p>Justin Hall, Mississippi State University Dr. Kirk Swortzel, Mississippi State University Dr. OP McCubbins, Mississippi State University</p>	<p>This study determined the impact of dues agreements between the Association for Career and Technical Education (ACTE), the National Association of Agricultural Educators (NAAE), and their state-level affiliates. This study further examined the relationship between professional organization unity and membership rates on state funding for CTE.</p>

<p>Paper 18: Career and Technical Education Teachers' Perceptions of Instructional Feedback from Supervisors</p> <p>Brook Thiel, North Dakota State University</p>	<p>This study examined CTE teachers' perceptions of feedback from supervisors (principals, instructional coaches, and CTE administrators). Results compare how teachers perceive feedback from supervisors with and without CTE backgrounds, as well as discuss the types of feedback CTE teachers prefer to receive from their supervisors.</p>
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Research Session 6: ROOM 221 B

Discussant: Mark Threeton, The Pennsylvania State University

Chair: Armando Lizarraga, University of Texas - Austin

<p>Paper 19: Peer Support Structures: Documenting the Experiences of Veterans and Adult Learners in Engineering Education Career Pathways</p> <p>Kimberly Luthi, Embry-Riddle Aeronautical University David Harvie, Embry-Riddle Aeronautical University Keith Wilson, Embry-Riddle Aeronautical University Monica Surrency, Embry-Riddle Aeronautical University</p>	<p>This paper will discuss the experiences of veterans and adult learners in engineering career pathways, with a particular focus on the role of peer support structures in undergraduate online courses. The paper contributes to the findings from a 3-year research project sponsored by the National Science Foundation that seeks to explore new strategies to engage non-traditional students early in career and technical education pathways. The study brings together researchers, educators, and practitioners to build insight on best practices and empirical findings related to the unique challenges and opportunities faced by veterans and adult learners pursuing engineering careers.</p>
<p>Paper 20: Cooperative Teams and Problem-Solving Preferences</p> <p>Matt Spindle, Pennsylvania State University</p>	<p>Engineering professionals need to be able to apply principles of cooperation and work effectively in cognitively diverse teams. Research demonstrates that cooperative learning strategies provide an effective means for improving students' understandings of technical concepts and of how to work in cooperative teams. However, few studies have explored cognitive diversity and student cooperative teams. This study used the Kirton Adaption-Innovation inventory (KAI).</p>
<p>Paper 21: Instructional Practice Needs of Oklahoma School-Based Agricultural Education Teachers</p> <p>Robby Branscum, Oklahoma State University Christopher J. Eck, Oklahoma State University Kayla N. Marsh, Oklahoma State University Bradley M. Coleman, Oklahoma State University</p>	<p>Career satisfaction is crucial to retaining highly qualified teachers as self-efficacy is positively correlated with job satisfaction. With this in mind, understanding the needs of career phases is important for professional development. This study aimed to determine the relationship between teaching experience and instructional practice among SBAE teachers in Oklahoma.</p>
<p>Paper 22: Determining the Degree to Which Ideational Behavior Predicts Occupational Identity Achievement in Emerging Adult College Students Preceding Entry into the Fourth Industrial Revolution Workforce</p> <p>Dr. Carrington M. Faulk, Old Dominion University Dr. Mickey Kosloski, Old Dominion University</p>	<p>As emerging adults transition into the Fourth Industrial Revolution (4IR) workforce, it is essential to understand the factors that predict successful occupational identity achievement, as automation will impact human occupational identity crises. This descriptive cross-sectional study implemented a correlation design to determine the degree to which ideational behavior predicts occupational identity achievement preceding entry into the 4IR workforce.</p>

Symposium 3: ROOM 221 A

Chair: James E. Bartlett, II,

<p>Symposium 3: Navigating the Graduate and Postgrad Student Experience: Research Fellows, Dissertations, Classes, Training, Publications, and Relationships</p> <p>Gresham Collum, St. Cloud State University Zach Hyder, University of Tennessee Audrey Boochever, University of California Davis Jonathan Montoya, Santa Clara University</p>	<p>The panel discussion will provide insight ways to intentionally approach the graduate and postgraduate experience. The session will discuss topics such as publishing from dissertations and classes, mentorships, and the participation in a research fellows program.</p>
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Concurrent Sessions IV: Teacher Retention, Perceptions, and Voices from the Field
3:35 PM – 4:55 PM

Research Paper Session 7: ROOM 221 A

Discussant: Christopher Eck, Oklahoma State University

Chair: Zach Hyder, University of Tennessee

<p>Paper 23: The Impact of Career & Technology Education Concentrations on the Success of High School Students</p> <p>Michael R. Shoemaker, Rockhurst University</p>	<p>This study examined the impact of Career and Technical Education (CTE) concentration on academic and behavioral outcomes in high school. Using quantitative data analysis from 931 students, the participants were divided into CTE-concentrators and non-concentrators. The results demonstrated that CTE concentration had a significant positive influence on academic success, as evidenced by higher ACT scores, Kansas Assessment Program (KAP) scores, and final GPA.</p>
<p>Paper 24: Short-Term Certificate Program Alignment with the Local Labor Market</p> <p>Sophie McGuinness, Vanderbilt University</p>	<p>This paper examines the relationship between Short-Term Certificate (STC) program openings and corresponding labor market activity for the two most popular STC fields of study, manufacturing and health. Findings indicate that one additional STC offered by a community college is associated with a 5-7pp increase in total employment in corresponding industries.</p>
<p>Paper 25: Using the State FFA Degree as a Career Readiness Indicator</p> <p>Kailee Johnson, Wake County (NC) Schools Dr. Kirk Swortzel, Mississippi State University Dr. OP McCubbins, Mississippi State University</p>	<p>This study examined if the State FFA Degree could potentially work as a CRI for agricultural education students and FFA members. FFA members who had earned their State FFA Degree were also compared to FFA members who had not earned the State FFA Degree.</p>

Research Paper Session 8: ROOM 221 B

Discussant: Xue Xing, University of Nevada Las Vegas

Chair: Jennifer LaDue, NC State University

<p>Paper 26: STEM Integration for CTE AI Literacy: A Systematic Literature Review</p> <p>Rita Mathew, University of Georgia Dr. Lee, In Heok, University of Georgia Dr. Mativo, John, University of Georgia Mary Frances, University of Georgia Dr. Roger Hill, University of Georgia</p>	<p>Artificial Intelligence (AI) is considered as the biggest challenge in the 21st century. This meta literature review of approaches to Science, Technology, Engineering, and Mathematics (STEM) integration in Engineering Technology Education (ETE), in the context of Career and Technical Education (CTE), evaluates outcomes with practical applications for AI literacy.</p>
<p>Paper 27: Technology Competencies for Teaching and Learning: A Quantitative Study of the Perceptions of Early Career Educators</p> <p>Candace A. Claar, Pennsylvania State University</p>	<p>Research indicates that teacher candidates are not adequately prepared to effectively integrate technology into teaching and learning. This quantitative study determines early career teachers' perceptions of their preparedness for teaching and their perceptions of technology competencies. This study provides the needed technology competencies, professional learning experiences, and the challenges.</p>
<p>Paper 28: School-Based Agricultural Education Teacher Perceived Self-Efficacy in Face-to-Face, Remote, and Hybrid Classrooms</p> <p>Dr. OP McCubbins, Mississippi State University Dr. Gayle Clark, Mississippi Department of Agriculture and Commerce</p>	<p>This study aimed to explore the self-efficacy of school-based agricultural education (SBAE) teachers in delivering instruction across three classroom settings: face-to-face, remote, and hybrid. The participants were SBAE teachers from three southern states. Self-efficacy was assessed using a teacher perception instrument specific to agricultural education classrooms. Teachers rated their perceived self-efficacy in each instructional setting. The findings indicated significantly higher self-efficacy in face-to-face settings compared to remote and hybrid settings.</p>

Symposium 4: ROOM 221 C

Chair: Sophia Alston, ACTE

Exploring the CTE Teacher Shortage

James E. Bartlett, II, Old Dominion University
Michelle E. Bartlett, Old Dominion University
Michelle Conrad, University of Central Missouri
Jodi Adams, University of Louisville
Sara Shaw, University of Central Florida
Lisa Martino, University of Central Florida

This session will discuss the CTE teacher shortage facing the United States at the secondary and postsecondary levels. The presentation will provide examples of practices some are using to develop teachers locally. Additionally, the session will discuss the need for research to examine postsecondary CTE faculty. The symposium will share initial findings from research that is examining how postsecondary early career postsecondary CTE factor different from those with experience.

ACTER Annual Membership Meeting and Closing Session

5:00 PM – 6:15 PM, Room 132

Business Meeting

Presentation of Conference Awards

- Outstanding Symposium
- Outstanding Research Poster
- Outstanding Roundtable
- Outstanding Research Paper

Presentation ACTER

- Outstanding Beginning Scholars
- Meritorious Service Award
- Distinguish Service Award
- Best Paper CTER
- Outstanding Dissertation Award

President's Closing Address

Announcement of 2023 Officers

Save the Dates

2024 ACTER
CTE Research and Professional Development Conference



San Antonio, TX
December 2nd- 4th, 2024
Proposal Deadline: April 1, 2023

ACTER 2024, December 2nd – 4th
VISION 2024: San Antonio, TX, December 4 - December 7

ACTER 2025, December 8th – 10th
VISION 2025: Nashville, TN, December 10 - December 13

Check <http://www.acteronline.org> in January for the Call for Proposals.

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Thank You

This conference would not be possible without the service of many volunteers.
We appreciate your commitment to scholarship in Career and Technical Education.

ACTER Posters

<p>Poster 1 - Perceptions of State CTE Teachers of Teaching During a Pandemic Dr. Bonny DuPuis, University of Idaho Dr. John Cannon, University of Idaho Dr. Mary Jo Self, Oklahoma State University</p>
<p>Poster 2 - Support Factors for Non-Traditional Groups in Workforce Education: Insights into Creating Equitable Career Pathways Dr. Kimberly Luthi, Embry-Riddle Aeronautical University Dr. Mickey Kosloski, Old Dominion University</p>
<p>Poster 3 - Exploring Gender Inequity in STEM Bethany L. Mathie, Pennsylvania State University</p>
<p>Poster 4 - Preparing Students for Future Work: Teaching Soft Skills in Career and Technical Education Helen Lee, Foundry10 Janelle Salcedo, Foundry10</p>
<p>Poster 5 - Attitudes of North Dakota Career & Technical Education Teachers Toward Working With Students With Disabilities Brooke Thiel, North Dakota State University</p>
<p>Poster 6 – North Dakota Career and Technical Education Teachers’ Perceptions of Work-based Learning Brooke Thiel, North Dakota State University</p>
<p>Poster 7 - Automotive Technician Certification – The Relationship Between Certifications and Earned Income David Macholz, Old Dominion University Mickey Kosloski, Old Dominion University</p>
<p>Poster 8 - Influences on Career Selection Diane Klemme, University of Wisconsin-Stout</p>
<p>Poster 9 - Exploring Perceptions of Career Growth and Employability Skills Outcomes of Career and Technical Education Program (CTE) Concentrators and Completers Jamie Molina, Texas Tech University Karen Alexander, Texas Tech University Cindy Miller, Texas Tech University Kyle Roberson, Texas Tech University Melanie Schmitt, Texas Tech University</p>
<p>Poster 10 - Examining Changes in Learning Habits of Non-Traditional Adult Students in an Online Career and Technical Education Program Pre and Post Pandemic Katherine Kandalec Holm, Athens State University Timothy Thornton, Athens State University Letitia Bergantz, Athens State University</p>
<p>Poster 11 - A Comparison of Family and Consumer Sciences (FCS) Secondary Students’ Perspectives on the Effects of Technology Usage on Adolescent Health Before and After a Digital Wellness Curriculum Intervention Melanie Schmitt, Texas Tech University</p>
<p>Poster 12 - A Critical Science Qualitative Case Study: Historical Insights and Future Directions Nicole Wanago, Texas Tech University Karen Alexander, Texas Tech University</p>

<p>Poster 13 - Integrating Interdisciplinary Collaboration and Critical Pedagogy with CTE Ryan Lundell, Santa Clara University Jonathan Montoya, Santa Clara University</p>
<p>Poster 14 - The Lessons Learned in Teaching in the Early Stages of the Pandemic among Family and Consumer Sciences Teachers Sally Arnett-Hartwick, Illinois State University Allen Kitchel, The Ohio State University John Cannon, University of Idaho Mari Borr, North Dakota State University Michelle Bartlett, Old Dominion University Mary Jo Self, Oklahoma State University Carol Billings, University of Idaho Kevin Elliott, Pittsburgh State University Jeremy Jeffery, Commonwealth University of Pennsylvania</p>
<p>Poster 15 - A Self Determination Theory Perspective of the California Hispanic Agriculture Teacher Experience. Samuel Rodriguez, California State University - Fresno</p>
<p>Poster 16 - Integrating Inclusive Research: Facilitating Safety Instructor Development Taija R. Jackson, Utah State University Michael L. Pate, Utah State University; Rebecca G. Lawver, Utah State University; Dustin K. Perry, Montana State University; Scott W. Smalley, Iowa State University; Jim Hafer, Chief Dull Knife College; Don Edgar, New Mexico State University; Marvin Young, Prairie View A&M; Celina Wille, Utah State University</p>
<p>Poster 17 - Analysis of Industry Recognized Credentials that Lead to Quality Employment for High School Graduates Teri Harris, Old Dominion University Dr. Mickey Kosloski, Old Dominion University</p>
<p>Poster 18 - Academic and Career Ready, a Culture of Teaching and Learning? Urs R. Haltinner, University of Wisconsin - Stout Debbie Stanislawski, University of Wisconsin – Stout</p>
<p>Poster 19 - Reevaluating the Role of Narrative as a Way to Promote Equity in Postsecondary Career and Technical Education Yeo-Ri Kim, University of Georgia</p>
<p>Poster 20 - Infusing Entrepreneurship in Postsecondary CTE Through Learning Communities, Anthony Perry, University of North Dakota Bradley Kinsinger, Kirkwood Community College Rosemary McBride, University of Wyoming</p>
<p>Poster 21 - Exploring Welding Instructors Perception Toward Teaching Safety in Community College Programs, Jarvis Gray, North Carolina State University James E. Bartlett, II, Old Dominion University</p>

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