INTRODUCTION TO VOLUME 18: RESEARCH TO PRACTICE

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ABSTRACT

In this special edition of the *Journal of Security, Intelligence, and Resilience Education*, homeland security, emergency management, intelligence, public administration, public health, and criminal justice scholars from American and Canadian colleges and universities share their programs, curricula, and plans that endeavor to bridge the gap between research and practice. This introduction provides an overview of innovative teaching strategies, methods, and curricula that equip academics and practitioners with the requisite skills and tools to address the complexities associated with homeland security challenges and opportunities.

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The *Journal of Security, Intelligence, and Resilience Education* proudly presents its special edition, "Research to Practice." Research is the orderly study of phenomena and processes to discover facts and principles. It includes exploring, describing, examining, and ultimately explaining the world's wonders for the betterment of humanity. Sound research helps us understand the complexities inherent to societal problems. From countering terrorism and cyber threats to curbing drug epidemics and misinformation to improving farming conditions, qualitative and quantitative research unearths nuanced peculiarities and causative factors. It provides insights that help policymakers and practitioners manage wicked problems. This special edition highlights the potential for groundbreaking research methodologies that facilitate critical thinking, policy innovation, and critical research-to-practice partnerships.

NO. 2, BRIDGING THEORY AND PRACTICE: APPLIED RESEARCH METHODS IN SECURITY AND EMERGENCY SERVICES

Embry-Riddle Aeronautical University Professors Cihan Aydiner and Tanya Buhler Corbin found that the evolving global threat landscape requires a workforce well-versed in theory and research. They developed the Applied Research Methods in Security and Emergency Services course to meet this need. The course integrates a range of methodologies, particularly video ethnography, to analyze emergencies, disasters, and homeland security crises through visual storytelling. Topical issues include critical thinking, digital learning models, ethical research practices, and real-world case studies. Student reflections reveal positive sentiments, emphasizing the course's success in achieving empathetic engagement using visual documentation of historical security events.

NO. 3, INTELLIGENCE BY THE NUMBERS: DATA ANALYTICS TRAINING FOR UNDERGRADUATE STUDENTS OF INTELLIGENCE

Professors Matthew Cobb and Jordan Roberts of Coastal Carolina University found that the rapidly evolving technosphere is rife with challenges and opportunities. There is a growing need for intelligence and security professionals to possess basic data literacy skills. They developed a new course, Data Analytics for Intelligence and Security, which equips students with the requisite analytical skills for national security careers. An integral part of the university's Data Analytics for Intelligence and Security minor, the course features hands-on experience in data management and statistical analysis. The course begins with an introduction to the R programming language, which facilitates mastery of advanced computer applications. Students construct datasets that generate visual and mathematical models, forging linkages between variables that serve as the framing of a research paper. Topical issues include data literacy, self-efficacy, and data analytics.

NO. 4, STUDENT ENGAGEMENT WITH MIS-, DIS-, AND MALINFORMATION THROUGH OBSERVATIONAL RESEARCH

Professor Brian Simpkins of Eastern Kentucky University unravels the development of a timely undergraduate course, Misinformation, Disinformation, and Malinformation. The course was designed to help students navigate the threats of a rapidly evolving information landscape replete with misinformation, disinformation, and malinformation. It features rigorous practices that help students distinguish fact from fiction. Students learn and apply observational qualitative research methodologies that help them evaluate media and other sources. The course increased students' understanding of and ability to identify misinformation, disinformation, and malinformation. Topical issues include digital literacy, social-emotional literacy, and misinformation.

NO. 5, BUILDING REGIONAL RESILIENCE: RESEARCH-TO-PRACTICE PARTNERSHIPS IN A RURAL BORDER AREA

Professors Jeffrey Osborne and David Kanaan of San Diego State University invite us to examine the efficacy of a collaborative researcher-law enforcement initiative. The partnership of San Diego State University's Regional Resilience Center and the City of Brawley Police Department is integral to regional resilience. Evidence-based, data-driven policies and interagency collaboration prioritize prevention and mitigation strategies through quantitative research-backed predictive crime analyses, enabling the identification of crime "hot spots" and "hot times." The symbiotic relationship yields tangible outcomes in tackling the fentanyl crisis, community policing perceptions, and youth-based programming in underserved communities.

NO. 6, BRIDGING THEORY AND PRACTICE: TEACHING QUALITATIVE FIELD RESEARCH METHODS IN SOCIOLOGY AND CRIMINOLOGY

University of Waterloo Ph.D. Candidate Karmvir Padda's Field Research Methods course helps bridge the research-to-practice divide. The course prompts criminal justice and sociology students to apply qualitative methodologies, including in-depth interviews, non-participant observations, and digital ethnography, to real-world situations and circumstances. The course features a mandatory Tri-Council Policy Statement CORE-2022 certification emphasizing ethical considerations and ensuring students uphold the highest research standards. Integrating advanced technologies, particularly machine learning and digital ethnography, modernizes the course and provides students with timely technological practices. Student feedback highlights their successful translation of theoretical and methodological knowledge into practical research.

NO. 7, AI TOOLS FOR ACCELERATING LEARNING

Professor Patrick Middleton of Patrick Henry College examines large language models to enhance student learning outcomes. He found that students who employed ChatGPT yielded higher insight advantages than those who did not. Middleton underscored AI's value in accelerating educational learning opportunities by fostering inquiry and strategic engagement. ChatGPT promotes contextualized questioning, critical thinking, and student engagement.

NO. 8, STANDARDIZATION OF INTELLIGENCE ANALYSIS WORKFORCE AND EDUCATION: ARE WE THERE?

Professors Lana Obradovic and Michelle Black of the University of Nebraska examined changes to the Intelligence Community's (IC) streamlined approach to educating and developing a new generation of intelligence analysts. Drastic growth in academic curricula and the standardization of intelligence education in academic institutions prompted the development of educational standards and core competencies for homeland security and the broader IC community. A review of historical intelligence-related courses within universities highlights the role of collegiate education in recruiting and molding future intelligence experts with broad-level expertise. Content analysis suggests disparities between academic and professional training programs, urging a comprehensive, unified framework to synchronize guidelines across all academic and organizational levels.

NO. 9, FROM THE CLASSROOM TO THE FARM: A COLLABORATIVE ACADEMIC-PRACTITIONER DISASTER RESILIENCE PROGRAM

In the final article of "Research to Practice," an interdisciplinary team of academics and farmers connect climate change threats to agricultural efficiency and offers ways to mitigate them. Professors Rebecca Brenner and Candice Hulbert from Cornell University, Professor Rachel Schattman from the University of Maine, and Soil Health Specialist Sarah Kelemen from the

American Farmland Trust identified and connected climate change and local disaster risks. The resulting risk matrix provides farmers with an effective risk management and disaster preparedness tool.

WAYS FORWARD

The research-to-practice continuum is vital to advancing the human condition. This special edition of the *Journal of Security, Intelligence, and Resilience Education* captures that sentiment. The authors share their new and advanced research methodologies—including use of artificial intelligence and large language models for content analysis, video and digital ethnography, risk management and preparedness matrices, and data management tools—that advance their respective fields. The challenge will be streamlining security and intelligence education across academic curricula to align with practical competencies. Much work remains to bridge the gap between academic research and practical solutions that secure the homeland.

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