Christian Dameff, MD, MS, FACEP

Revision Date: March 2025

EDUCATION

2010 - 2014	University of Arizona College of Medicine; Phoenix, AZ Doctor of Medicine Thesis: 'A Standardized Template For Measuring and Reporting Telephone Cardiopulmonary Resuscitation'
2009 - 2010	University of Arizona; Tucson, AZ Master of Science in Physiology Thesis: 'Recurrent Ventricular Fibrillation in Coronary Occluded Swine During Cardiopulmonary Resuscitation.'
2005 - 2009	University of Arizona; Tucson, AZ Bachelor of Arts in Philosophy

POST-DOCTORAL TRAINING

2017 - 2019	University of California San Diego, CA Clinical Informatics Fellowship, Department of Emergency Medicine
2016 - 2017	Maricopa Medical Center (MMC), Phoenix, AZ Chief Resident, Department of Emergency Medicine
2014 - 2017	Maricopa Medical Center, Phoenix, AZ Residency, Department of Emergency Medicine

ACADEMIC APPOINTMENTS

2019 - Present	University of California San Diego, CA Assistant Professor Department of Emergency Medicine Department of Biomedical Informatics Department of Computer Science & Engineering (Affiliate)

PROFESSIONAL EXPERIENCE

2024 - Present	Co-Director: UCSD Center for Healthcare Cybersecurity
2024 - Present	Co-Founder: Inoculum Labs
2019 - Present	Medical Director of Cybersecurity - UCSD Health
2017 - Present	Attending Emergency Physician - UCSD Health
2009 - 2010	Research Specialist - Sarver Heart Center, Tucson, AZ
2007 - 2010	Emergency Medical Technician - St. Joseph's Hospital

Government Service

| 2020 | "Stopping Digital Thieves: The Growing Threat of Ransomware" Congressional testimony before the Energy and Commerce Committee (Oversight and Investigations), U.S. House of Representatives, July 20th, 2021. |

National Academy Service

| 2025 - Present | National Academy of Medicine
Standing Committee on Emerging Infectious Diseases and 21st Century Health Threats - Member |

University Service

2023 - 2024	UCSD Building System Concentration - Director
2022 - Present	UCSD Academic Senate Representative Assembly - Member
2022 - 2023	UCSD Health Equity & Systems Science Workgroup - Member
2022 - 2023	UCSD Medical Concentration Curriculum Workgroup - Member
2021 - Present	UCSD ACM Cyber Collegiate Hacking Team - Coach
2021 - 2022	UCSD Academic Senate Representative Assembly - Alternate
2020 - Present	UCSD Health Medical Device Cybersecurity Committee - Co-Chair
2019 - Present	UCSD Cybersecurity Governance Committee - Member
2015 - 2017	MMC ED Core Measures Committee - Member
2015 - 2017	MMC ED Improvement Committee - Co-Chair
2015 - 2017	MMC ED Residency Class of 2017 - Class Representative
2015 - 2017	MMC Residency Council - Vice President

AWARDS AND HONORS

2022	Cybersecurity Visionary Award Association for the Advancement of Medical Instrumentation (AAMI)
2021	Faculty Development Program The National Center of Leadership in Academic Medicine (NCLAM)
2019	45 Under 45 Award Emergency Medicine Residency Association (EMRA)
2015	Achievement In Resident Research and Scholarly Activity Award Maricopa Medical Center
2015	Western SAEM SonoGames Champion Society of Academic Emergency Medicine (SAEM)
2013	Emergency Medicine Basic Research Science Scholarship Award Emergency Medicine Residency Association (EMRA)
2013	Medical Student Excellence in Emergency Medicine Award Society of Academic Emergency Medicine (SAEM)
2012	Medical Student Professionalism and Service Award American College of Emergency Physicians (ACEP)
2007	Student Scholarship in Cardiovascular Disease American Heart Association (AHA)

2006	OCTF Champion: Computer Hacking Competition
	Defcon Computer Security Conference
2005	Charles W. Seabury Scholarship
	University of Arizona
2005	Eagle Scout
	Boy Scouts of America

AFFILIATIONS AND MEMBERSHIPS

2022 - Present	The Advanced Computing Systems Association (USENIX)
2020 - Present	Association for Computing Machinery (ACM)
2017 - 2019	AMIA Clinical Informatics Fellows
2017 - Present	California ACEP
2017 - Present	Healthcare Information and Management Systems Society
2016 - Present	American Medical Informatics Association (AMIA)
2011 - 2017	American Academy of Emergency Medicine (AAEM)
2011 - Present	American College of Emergency Physicians (ACEP)
2011 - Present	Emergency Medicine Residents' Association (EMRA)
2010 - 2017	American Heart Association (AHA)

LEADERSHIP EXPERIENCE

2023 - Present	ACEP Emergency Medicine Informatics Section - Chair
2022 - 2023	ACEP Emergency Medicine Informatics Section - Chair Elect
2017 - 2018	AMIA Clinical Informatics Fellows - Board of Directors
2015 - 2017	EMRA Board of Directors - Director of Technology
2011 - 2012	Emergency Medicine Interest Group - President
2011 - 2012	Critical Care Interest Group - Vice President
2011 - 2012	Telemedicine Interest Group - Vice President
2010 - 2012	REACT (Resuscitation, Education, and CPR Training) - Chair

CONTRACTS & GRANTS

EXTRAMURAL

<u>ACTIVE</u>
2023 - Present	SP4701-23-C-0075 ARPA-H C. Dameff (PI)
	Healthcare Ransomware Resiliency and Response Program
	Role: PI. Total Amount: $9,544,174.

<u>COMPLETED</u>
2022 - 2025	1K08EB032477 NIH NIBIB C. Dameff (PI)
	Modeling Cyber Attack Impacts on Patient Outcomes.
	Role: PI. Total Amount: $655,000.

2021 - 2025   ME-2020C3-21310 PCORI   C. Nebeker (PI)
Developing Methods to Identify and Communicate Benefits and Harms of Digital Health Research Studies.
Role: Co-I. Total Amount: $1,399,908

2021 - 2023   N/A   NFEM   N/A
Scholar and Mentor Program.
Role: Scholar. Total Amount: $60,000.

INTRAMURAL

ACTIVE

COMPLETED

2022 - 2023   N/A   UCOP   C. Dameff (PI)
An Evidence Based Approach to Reducing Healthcare Phishing Cyber Attack Risk. Role: PI. Total Amount: $50,000.

2022 - 2023   N/A   UCSD Health   C. Dameff (PI)
Patient Sentiments Regarding Cybersecurity Informed Consent. Academy of Clinical Scholars (AoCS). Role: PI. Total Amount: $7,500.

PUBLICATIONS

PEER REVIEWED

1. Car J, Ong QC, Erlikh Fox T, **et al.** The Digital Health Competencies in Medical Education Framework: An International Consensus Statement Based on a Delphi Study. *JAMA Netw Open.* 2025;8(1):e2453131. doi:10.1001/jamanetworkopen.2024.53131
2. G. Ho **et al**., "Understanding the Efficacy of Phishing Training in Practice," in 2025 IEEE Symposium on Security and Privacy (SP), San Francisco, CA, USA, 2025, pp. 76-76, doi: 10.1109/SP61157.2025.00076.
3. Neprash HT, **Dameff C**, Tully J. Cybersecurity Lessons From the Change Healthcare Attack. *JAMA Intern Med.* 2024;184(11):1283–1284. doi:10.1001/jamainternmed.2024.3162
4. Boven, Liselotte & Kusters, Renske & Klokman, Vincent & **Dameff, Christian** & Barten, Dennis. (2024). Acute care disruptions due to information technology failures in the Netherlands from 2000 to 2020. Health Policy and Technology. 13. 100840. 10.1016/j.hlpt.2024.100840.
5. Turer RW, McDonald SA, Lehmann CU, **et al**. Real-Time Electronic Patient Portal Use Among Emergency Department Patients. JAMA Netw Open. 2024;7(5):e249831. doi:10.1001/jamanetworkopen.2024.9831.
6. Pham, Thaidan T. MD1; Loo, Theoren M. MS2; Malhotra, Atul MD3; Longhurst, Christopher A. MD, MS4,5; Hylton, Diana MD6; **Dameff, Christian MD**, MS4,7,8; Tully, Jeffrey MD6; Wardi, Gabriel MD, MPH3,7; Sell, Rebecca E. MD9; Pearce,

Alex K. MD3. Ransomware Cyberattack Associated With Cardiac Arrest Incidence and Outcomes at Untargeted, Adjacent Hospitals. Critical Care Explorations 6(4):p e1079, April 2024. | DOI: 10.1097/CCE.0000000000001079

7. van Boven LS, Kusters RWJ, Tin D, van Osch FHM, De Cauwer H, Ketelings L, Rao M, **Dameff C**, Barten DG. Hacking Acute Care: A Qualitative Study on the Health Care Impacts of Ransomware Attacks Against Hospitals. Ann Emerg Med. 2023 Jun 14:S0196-0644(23)00352-9. doi: 10.1016/j.annemergmed.2023.04.025. Epub ahead of print. PMID: 37318433.

8. **Dameff C**, Tully J, Chan TC, Castillo EM, Savage S, Maysent P, Hemmen TM, Clay BJ, Longhurst CA. Ransomware Attack Associated With Disruptions at Adjacent Emergency Departments in the US. JAMA Netw Open. 2023 May 1;6(5):e2312270. doi: 10.1001/jamanetworkopen.2023.12270. PMID: 37155166; PMCID: PMC10167570.

9. Sullivan N, Tully J, **Dameff C**, Opara C, Snead M, Selzer J. A National Survey of Hospital Cyber Attack Emergency Operation Preparedness. Disaster Med Public Health Prep. 2023 Mar 22;17:e363. doi: 10.1017/dmp.2022.283. PMID: 36945857.

10. Givehchian H, Bhaskar N, Rodriguez E, Lópéz H, **Damef C**, Bharadia D, Schulman A. Evaluating Physical-Layer BLE Location Tracking Attacks on Mobile Devices *IEEE Symposium on Security and Privacy (S&P) 2022*

11. Qian AS, Qiao EM, Nalawade V, Voora RS, Kotha NV, **Dameff C**, Coyne CJ, Murphy JD. Impact of underlying malignancy on emergency department utilization and outcomes. Cancer Med. 2021 Dec;10(24):9129-9138. doi: 10.1002/cam4.4414. Epub 2021 Nov 24. PMID: 34821051; PMCID: PMC8683529.

12. Cronin AO, Coyne CJ, Castillo EM, **Dameff C**. COVID-19 screening, testing and vaccination: Perceptions from emergency medicine residents and medical students. Am J Emerg Med. 2021 Mar 21:S0735-6757(21)00233-3. doi: 10.1016/j.ajem.2021.03.048. Epub ahead of print. PMID: 33810920; PMCID: PMC7981269.

13. Tresenriter M, Holdaway J, Killeen J, Chan T, **Dameff C**. The Implementation of an Emergency Medicine Telehealth System During a Pandemic. J Emerg Med. 2021 Apr;60(4):548-553. doi: 10.1016/j.jemermed.2020.11.026. Epub 2021 Jan 7. PMID: 33423835; PMCID: PMC7789960.

14. Maggio LA, **Dameff C**, Kanter SL, Woods B, Tully J. Cybersecurity Challenges and the Academic Health Center: An Interactive Tabletop Simulation for Executives. Acad Med. 2020 Nov 24. doi: 10.1097/ACM.0000000000003859. Epub ahead of print. PMID: 33239532.

15. Carlile, M, Hurt, B, Hsiao, A, Hogarth, M, Longhurst, CA, **Dameff, C**. Deployment of artificial intelligence for radiographic diagnosis of COVID-19 pneumonia in the emergency department. *JACEP Open*. 2020; 1– 6.

16. Cronin AO, Carlile MA, **Dameff C**, Coyne CJ, Castillo EM. Leveraging Remote Research Associates During a Pandemic. West J Emerg Med. 2020 Jul 21;21(5):1114-1117. doi: 10.5811/westjem.2020.6.48043. PMID: 32970563

17. Tully J, Selzer J, Phillips JP, O'Connor P, Dameff C. Healthcare Challenges in the Era of Cybersecurity.*Health Secur* 2020;18(3):228-231.doi:10.1089/hs.2019.0123

18. Tully J, Coravos A, Doerr M, **Dameff C**. Connected Medical Technology and Cybersecurity Informed Consent: A New Paradigm. J Med Internet Res. 2020;22(3):e17612. DOI: 10.2196/17612. PMID: 32224492.
19. Tully J, **Dameff C,** Longhurst CA. Wave of Wearables: Clinical Management of Patients and the Future of Connected Medicine. Clin Lab Med. 2020 Mar;40(1):69-82. doi: 10.1016/j.cll.2019.11.004. PMID: 32008641.
20. **Dameff C,** Farah J, Killeen J, Chan T. Cyber Disaster Medicine: A New Frontier for Emergency Medicine. Ann Emerg Med. 2020 Jan 17;. doi: 10.1016/j.annemergmed.2019.11.011. PubMed PMID: 31959537.
21. **Dameff C**, Pfeffer MA, Longhurst CA. Cybersecurity implications for hospital quality. Health Serv Res. 2019 Oct;54(5):969-970. doi: 10.1111/1475-6773.13202. PubMed PMID: 31506957.
22. Goebel M, **Dameff C**, Tully J. Hacking 9-1-1: Infrastructure Vulnerabilities and Attack Vectors. J Med Internet Res. 2019 Jul 9;21(7):e14383. doi: 10.2196/14383. PubMed PMID: 31290401.
23. **Dameff C**, Clay B, Longhurst CA. Challenges of Personal Health Records. JAMA.2019 Jun 18;321(23):2369. doi: 10.1001/jama.2019.4808. PubMed PMID: 31211343.
24. **Dameff C,** Clay B, Longhurst CA. Personal Health Records: More Promising in the Smartphone Era? *JAMA*.2019;321:339–340. doi:10.1001/jama.2018.20434
25. **Dameff** CJ, Selzer JA, Fisher J, Killeen JP, Tully JL. Clinical Cybersecurity Training Through Novel High-Fidelity Simulations. J Emerg Med. 2018 Dec 12. pii: S0736-4679(18)31055-2. doi: 10.1016/j.jemermed.2018.10.029.
26. J Tully, M Jarrett, S Savage, J Corman, **Dameff C**. Digital Defenses for Hacked Hearts: Why Software Patching Can Save Lives. Journal of the American College of Cardiology. 2018 July 3. https://doi.org/10.1016/j.jacc.2018.03.540
27. Fukushima H, Panczyk M, Hu C, **Dameff** C, Chikani V, Vadeboncoeur T, Spaite DW, Bobrow BJ. Description of Abnormal Breathing Is Associated With Improved Outcomes and Delayed Telephone Cardiopulmonary Resuscitation Instructions. Journal American Heart Assoc. 2017 Aug 29;6(9). PMID: 28851728
28. Fukushima H, Panczyk M, Spaite DW, Chikani V, **Dameff** C, Hu C, Birkenes TS, Myklebust H, Sutter J, Langlais B, Wu Z, Bobrow BJ. Barriers to telephone cardiopulmonary resuscitation in public and residential locations. Resuscitation 2016.07.241. PMID:27521469
29. BJ Bobrow, D Spaite, TF Vadenboncouer, C Hu, T Mullins, W Tormala, **C Dameff**, J Gallagher, G Smith, M Panczyk. Implementation of a regional telephone cardiopulmonary resuscitation program and outcomes after out-of-hospital cardiac arrest. JAMA Cardiology. doi: 10.1001/jamacardio.2016.0251. PMID: 27438108
30. Sutter J, Panczyk M, Spaite D, Ferrer J, Roosa J, **C Dameff**, Langlais B, Murphy R, Bobrow B. Telephone CPR instructions in emergency dispatch systems: Qualitative survey of 911 call centers. Western Journal of Emergency Medicine. 2015;16(5). doi: 10.5811/westjem.2015.6.26058. PMID: 26587099
31. C Crowe, BJ Bobrow, TF Vadeboncouer, **C Dameff**, U Stolz, A Silver, J Roosa, R Page, F LoVecchio, DW Spaite. Measuring and improving cardiopulmonary resuscitation quality inside the emergency department. Resuscitation. 2015 Aug; 93: 8-13. doi: 10.1016/j.resuscitation.2015.04.031. PMID: 25963706
32. J Tully, **C Dameff**, S Kaib, M Mofett. Recording medical students' encounters with standardized patients using Google Glass: Providing end-of-life clinical

education. Academic Medicine. 2015; 90:314-316. doi: 10.1097/ACM.0000000000000620. PMID: 25551855

33. D Hamman, WS Mortensen, C Hamman, A Smith, B Martino, **C Dameff**, J Tully, J Kim, A Torres. Experiences in adoption of teledermatology in Mohs micrographic surgery: using smartglasses for intraoperative Consultation and defect triage. Surgical Intervention. 2014 Dec; 21(6):653-654. PMID: 25389145

34. T Wu, **C Dameff**, J Tully. Ultrasound-guided central venous access using Google Glass. The Journal of Emergency Medicine. 2014 Dec; 47(6):668-675. doi: 10.1016/j.jemermed.2014.07.045. PMID: 25281180

35. CR Hamann, D Hamann, K Sager, **C Dameff**, J Tully, B Hamann. Allergy consultation via smart glasses: Case reports of real-time clinical decision support for suspected oral allergy. Journal of Allergy and Therapy. 2014; 5:186. doi: 10.4172/2155-6121.1000186

36. **C Dameff**, T Vadeboncouer, J Tully, M Panczyk, A Dunham, R Murphy, U Stolz, V Chikani, D Spaite, B Bobrow. A standardized template for measuring and reporting telephone pre-arrival cardipulmonary resuscitation instructions. Resuscitation. 2014 Jul; 85(7): 869-873. doi:10.1016/j.resuscitation.2014.02.023. PMID: 24614186

37. T Wu, **C Dameff**, J Tully. Integrating Google Glass into simulation-based training: Experiences and future directions. Journal of Biomedical Graphics and Computing. 2014; 4(2): 49-54. doi: 10.5430/jbgc.v4n2p49

38. J Indik, D Allen, M Gura, **C Dameff**, R Hilwig, K Kern. Utility of the Vf waveform to predict a return of spontaneous circulation and distinguish acute from post myocardial infarction in a swine model of Vf cardiac arrest. Circulation: Arrhythmia and Electrophysiology. 2011,4(3): 337-343. PMID: 21493961

NON PEER REVIEWED

1. J Killeen, **C Dameff**, J Bass, B Khan, A Mandvi, N Yung. Informatics. Book Chapter: Oncologic Emergency Medicine: Principles and Practice. April 2021

2. J Pugh, **C Dameff.** What to Do When Cyber Attack Strikes the Emergency Department. ACEP Now, October 2017

3. **C Dameff**, J Tully. Code Cyber: Protecting Patients in the Age of Hackers. Doximity OpMed, August 2017

4. S Hussaini, **C Dameff**, J Tully. Water-related incidents in Maricopa County, AZ, 2010. Phoenix Arizona: Arizona Department of Health Services, Bureau of Public Health.

5. **C Dameff**. Medical Students Perspective: Anonymity No More. AZ Medicine. 2012; 1(23), 22.

PUBLISHED ABSTRACTS

1. **C Dameff,** J Brennan, T Chan. Regional Emergency Department Census Impacts During a Cyber Attack. Annals of Emergency Medicine, 2021; Volume 78, Issue 4, S66

2. **C Dameff**, J Farah, M Dotson, J Killen, T Chan. Impact of a Hospital Cyberattack on EMS Arrivals at Neighboring Emergency Departments. Annals of Emergency Medicine, 2021; Volume 78, Issue 4, S4

3. V Tolia, A Kreshak, A Cronin, G Wardi, **C Dameff**, J Brennan, E Castillo Emergency Department Crowding Resulting from a Local Health System Cyberattack. Annals of Emergency Medicine, 2021; Volume 78, Issue 4, S44
4. **C Dameff**, J Tully, M Panczyk, V Kannan, T Vadeboncoeur, DW Spaite, BJ Bobrow: 9-1-1 caller descriptions of abnormal breathing during out-of-hospital cardiac arrest. Prehospital Emergency Care. 2016; 20(1):147.
5. B Bobrow, M Panczyk, U Stoltz, N Heagerty, **C Dameff**, J Tully, R Murphy, T Vadeboncoeur, D Spaite. The impact of guideline-based protocols and training on the provision of pre-arrival CPR instructions and patient outcomes at three 9-1-1 centers in Arizona. 2014. *First place - National Association of EMS Officials. Clevelend, OH
6. B Bobrow, M Panczyk, U Stolz, N Heagerty, **C Dameff**, J Tully, R Murphy, T Vadenboncoeur, D Spaite. The impact of pre-arrival dispatch-assisted CPR on bystander CPR rates, time to starting CPR, and survival from out-of-hospital cardiac arrest. Circulation. 2013; 128:A81
7. **C Dameff**, J Tully, R Murphy, A Dunham, M Panczyk, U Stolz, J Tobin, M Karamooz, D Spaite, B Bobrow, G Ewy. The impact of the AHA guidelines on dispatch-assisted cardiopulmonary resuscitation. Circulation. 2012;126:A247
8. R Murphy, A Dunham, J Tully, **C Dameff**, M Panczyk, D Wasick, D Spaite, and B Bobrow. Primary reasons bystanders do not perform CPR when receiving dispatcher instructions. Circulations. 2012; 126:A274
9. J Tully, **C Dameff**, R Murphy, A Dunham, M Panczyk, U Stolz, J Tobin, B Kotsur, M Karamooz, D Spaite, and B Bobrow. A standardized template for measuring and reporting dispatch pre-arrival CPR. Circulation. 2012;126:A242

POSTER PRESENTATIONS

1. **C Dameff**, J Tully, M Panczyk, V Kannan, T Vadeboncoeur, DW Spaite, BJ Bobrow. 9-1-1 caller descriptions of abnormal breathing during out-of-hospital cardiac arrest. Prehospital Emergency Care. 2016;20(1):147
2. **C Dameff**, J Tully, M Panczyk, K Vannan, T Vadeboncoeur, DW Spaite, BJ Bobrow. 9-1-1 caller descriptions of gasping during out-of hospital cardiac arrest, Presented at American Heart: Resuscitation Conference, November 2015, Orlando, FL.
3. S Sridhar, A Klassen, **C Dameff**, J Tully. Experiences with Google Glass at the University of Arizona College of Medicine Phoenix. Presented at the Group on Regional Medical Campuses Spring Meeting, April 2014, Phoenix, AZ.
4. B Bobrow, M Panczyk, U Stolz, N Heagerty, **C Dameff**, J Tully, R Murphy, T Vadeboncoeur. The impact of pre-arrival dispatch-assisted CPR on bystander CPR rates, time to starting CPR, and survival from out-of-hospital cardiac arrest. Presented at the National Association of EMS Physicians Scientific Assembly, January 2014, Tucson, AZ.
5. B Bobrow, M Panczyk, U Stolz, N Heagerty, **C Dameff**, J Tully, R Murphy, T Vadeboncoeur, D Spaite. The impact of pre-arrival dispatch-assisted CPR on bystander CPR rates, time to starting CPR, and survival from out-of-hospital cardiac arrest. Presented at American Heart: Resuscitation Conference, November 2013, Dallas, TX.

6. J Tully, **C Dameff**, R Murphy, A Dunham, M Panczyk, U Stolz, J Tobin, B Kotsur, M Karamooz, D Spaite, B Bobrow. A standardized template for measuring and reporting dispatch pre-arrival CPR. Presented at American Heart: Resuscitation Conference, November 2012, Los Angeles, CA.

INVITED ORAL PRESENTATIONS

2025	"The Healthcare Ransomware Resilience & Response Program" Cybersecurity R&D and Capacity Building Symposium - Honolulu, HI
2024	"Hackers and Ransomware and Data Breaches, Oh My!" Yale Clinical Informatics Grand Rounds - New Haven, CT
2024	"Healthcare Cybersecurity: Ransomware Effects on Patient Safety" Mayo Clinic Clinical Informatics Grand Rounds - Rochester, MN
2024	"The Next Frontier: Exploring Opportunities in Healthcare Cybersecurity and Clinical Informatics" Stanford Clinical Informatics Fellowship Seminar
2024	"Securing Health Care with ARPA-H: AIxCC, DIGIHEALS, and UPGRADE" DEF CON Computer Security Conference, – Las Vegas, NV
2024	"The Next Frontier: Exploring Opportunities in Healthcare Cybersecurity and Nursing Informatics"Keynote, American Nursing Informatics Association Annual Conference- Chicago, IL
2024	"Cybersecurity in the Emerging World of AI." AI Healthcare Conference, Riverside County Medical Association – Riverside, CA
2024	"Healthcare Ransomware and ARPA-H Research Briefing." White House National Security Council – Washington, D.C.
2024	"Unveiling the Cyber-Blast Radius: Ransomware's Hidden Impact on Healthcare." HIMSS 24 – Orlando, FL
2024	"UC San Diego Center for Healthcare Cybersecurity." UC San Diego Health Sci Tech Committee Meeting - San Diego, CA
2023	Healthcare Cybersecurity Forum (HIMSS) - Boston, MA "Fostering a Security-Driven Culture"
2023	Defcon Computer Security Conference - Las Vegas, NV "D0 N0 H4RM: A Healthcare Security Conversation"
2023	Keynote, American Nursing Informatics Association Annual Conference - Louisville, KY "Digital Disease: Where Bits and Bytes Meet Flesh and Blood."
2023	American College of Clinical Engineering Symposium - Chicago, IL "Turning the Tide: Clinicians Cyber Safety Partnerships"
2022	Korean Society of Disaster Nursing Conference - Seoul, Korea "Cyber Disasters and Nursing"
2022	Korean Society of Disaster Medicine Conference - Seoul, Korea "Cyber Disaster Medicine"

2022	Defcon Computer Security Conference - Las Vegas, NV "D0 N0 H4RM: A Healthcare Security Conversation"
2022	General Session Clinical Forum, Anesthesiology 2022 – New Orleans, LA "Digital Disease: Cybersecurity, Patient Safety, and Physician Leadership in a Post-Pandemic World"
2022	Grand Rounds NYU Langone Department of Emergency Medicine - NYC, New York. "Healthcare Cyber Security: Where Bits and Bytes Meet Flesh and Blood"
2022	UCSF-Stanford CERSI-FDA Distinguished Lecture Series, Virtual "Unringing the Bell: A Physician's Perspective on the Future of Medical Device Security"
2022	Clinical Informatics Series - Stanford University, Palo Alto, CA "Cybersecurity for the Clinical Informatician"
2022	Grand Rounds UCSD Department of Radiology - San Diego, CA "Healthcare Cyber Security: Where Bits and Bytes Meet Flesh and Blood"
2021	Grand Rounds UTHealth McGovern Medical School - Houston, Tx ""Healthcare Cyber Security: Where Bits and Bytes Meet Flesh and Blood"
2021	Defcon Computer Security Conference - Las Vegas, NV "D0 N0 H4RM: A Healthcare Security Conversation"
2021	Engineering GSCP Program - Arizona State University, Tempe, AZ "Engineering Opportunities in Healthcare Cybersecurity"
2021	Association of California Nurse Leaders Annual, Virtual "Healthcare Cybersecurity"
2021	Biomedical Informatics Seminar - Stanford University, Palo Alto, CA "Where Bits and Bytes Meet Flesh and Blood"
2020	Defcon Computer Security Conference - Las Vegas, NV "How COVID19 Changed Our Understanding of Cyber Disaster Medicine"
2020	Defcon Computer Security Conference - Las Vegas, NV "D0 N0 H4RM: A Healthcare Security Conversation"
2020	University of California Cyber Security Summit - Berkeley, CA "Understanding the Threat: Malicious Software, Malicious Actors, and the Promise of Connected Medical Technology"
2020	Qatar Health 2020 - Doha Qatar "Cybersecurity for the Health System"
2020	Qatar Health 2020 - Doha Qatar "Optimizing Your Mass Casualty Event Response During a Cyber Attack"
2019	FDA Patient Advisory Education Committee - Washington DC "Cyber Informed Consent"
2019	Defcon Computer Security Conference - Las Vegas, NV

	"D0 N0 H4RM: A Healthcare Security Conversation"
2019	Defcon Computer Security Conference - Las Vegas, NV
	"Cyber Informed Patient Consent"
2019	Defcon Computer Security Conference - Las Vegas, NV
	"Using High Fidelity Cyber Security Clinical Simulations"
2019	Medtronic Global Cyber Security Conference - Minneapolis, MN
	Keynote "The Medical Device Cyber Security Last Mile Problem"
2019	FDA Medical Device Security Workshop - Washington DC
	"Preparedness and Response: WannaCry Again?"
2019	FDA Medical Device Security Workshop - Washington DC
	"Leveraging Innovation and Collaboration to Advance Cyber Safety"
2019	Archimedes Medical Device Security 101 - Orlando, FL
	"The Medical Device Security Last Mile Problem"
2018	HIMSS Healthcare Security Forum - Boston, MA
	"FDA Weighs in on Medical Device Security"
2018	HIMSS Healthcare Security Forum - Boston, MA
	"Dissecting the Anatomy of a Medical Device Attack"
2018	Blackhat Computer Security Conference - Las Vegas, NV
	"How Unsecure HL7 Messages Threaten Patient Lives"
2018	Blackhat Computer Security Conference - Las Vegas, NV
	"Burnout, Depression, and Suicide in the Hacker Community "
2018	Defcon Computer Security Conference - Las Vegas, NV
	"D0 N0 H4RM: A Healthcare Security Conversation"
2018	HIMSS Healthcare Security Forum - San Francisco, CA
	"Dissecting the Anatomy of a Medical Device Hack"
2018	AMIA Clinical Informatics Conference - Scottsdale, AZ
	"The Clinical Informatics Fellowship: A Fellow's Perspective"
2018	Blackburn Alumni Invited Speaker - Phoenix, AZ
	"Emergency Hospital Care During Cyber Security Disasters"
2018	AMIA Clinical Informatics Conference - Scottsdale, AZ
	"Modeling Emergency Stroke Care Impacts During Cyber Attacks"
2018	Thotcon - Chicago, CA
	"I Need a Hacker Consult, Stat."
2018	RSAC - San Francisco, CA
	"Hacking Healthcare: Where Bits and Bytes Meet Flesh & Blood"
2018	Appsec California - Los Angeles, CA
	Keynote "How Healthcare Cybersecurity Can Claim or Save Lives"
2018	Archimedes Medical Device Security 101 - Orlando, FL
	"Is Healthcare IOT Coming to Kill My Patients?"
2017	Security of Things USA - San Diego, CA
	"Healthcare IoT is Coming to Kill My Patients"
2017	Derbycon Computer Security Conference - Louisville, KY
	"Anatomy of a Medical Device Hack"

2017	Defcon Computer Security Conference - Las Vegas, NV "D0 N0 H4RM: A Healthcare Security Conversation"
2017	CyberMed Summit - Phoenix, AZ "Cyber Security & Patient Safety" Keynote
2016	B-Sides Las Vegas - Las Vegas, NV "State of Healthcare Cybersecurity"
2016	Defcon Computer Security Conference - Las Vegas, NV "Bioethics of Biohacking"
2016	Phoenix Comicon - Phoenix, AZ "Science-plosion!"
2015	Defcon Computer Security Conference - Las Vegas, NV "Biohacking: The anatomy of DIY implantable devices"
2015	Phoenix Comicon - Phoenix, AZ "Get me the Tricorder, STAT!"
2014	Defcon Computer Security Conference - Las Vegas, NV "Hacking 911: Adventures in Disruption, Destruction, and Death"
2014	University of Arizona College of Medicine Phoenix Lecture Series "Through the Looking (Google) Glass: The Future of Medical Education"
2013	ACCME Board of Directors Meeting - Chicago, IL "Through the Looking (Google) Glass: The Future of Medical Education"
2013	Phoenix Comicon - Phoenix, AZ "POW! Science! Gamma Rays, Mind Control, and the Truth Behind Your Favorite Superpowers"
2012	Defcon Computer Security Conference - Las Vegas, NV "Hacking Humanity: Human Augmentation and You"

Podcasts

2023	World Association for Disaster and Emergency Medicine (WADEM) - Cybersecurity and Healthcare. https://soundcloud.com/wadem- pdm/ctm-podcast-3
2020	ACIF Go Live - Cybersecurity in Healthcare https://podcasts.apple.com/us/podcast/s3e2-part-1-cybersecurity- in-healthcare/id1211273977?i=1000511171441
2018	EMRAP - Emergency Medicine Cybersecurity https://www.emrap.org/episode/thecollector/cybersecurity

OTHER PROJECTS

2017 - 2022	The CyberMed Summit: Cybersecurity and Medicine - Co-founder
2015	CPRWatcher: Apple watch real-time CPR feedback - Developer

2013   SonoSupport: Clinical ultrasound reference guide - Consultant

PERSONAL

Languages
American Sign Language - fluent

Interests
Computer system and medical device cyber security
Camping/hiking
Classic Mopar Cars