

MGH Institute of Health Professions University
Curriculum Vitae

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Place of Birth: Xiamen, China

Education:

07/2009	Biology with Honors in Research	Honors Thesis: Neuronal Lysosome Permeabilization Dynamics in Ischemia	University of Wisconsin-Madison
05/2015	Doctor of Medicine with Distinction in Research	Medicine	Keck School of Medicine at the University of Southern California

Postdoctoral Training:

06/15-06/19	Resident Physician	Emergency Medicine	Harvard Affiliated Emergency Medicine Residency
07/19-10/21	Fellow	Emergency Medicine	Massachusetts General Hospital

Faculty Academic Appointments:

01/21-10/23	Instructor	Medicine (Lab of Computer Science)	Harvard Medical School
09/22-	Adjunct Assistant Professor	Healthcare Data Analytics School of Healthcare Leadership	MGH Institute of Health Professions (non-voting)
10/23-	Assistant Professor, Part time	Medicine (Lab of Computer Science)	Harvard Medical School

Appointments at Hospitals/Affiliated Institutions:

01/21-	Assistant in Computer Science	Medicine (Lab of Computer Science)	Massachusetts General Hospital
08/21-	Research Staff	Surgery	Massachusetts General Hospital
09/21-	Assistant Physician	Emergency Medicine	Massachusetts General Hospital

Other Professional Positions:

Major Administrative Leadership Positions:

Local

2013-2022	Founder, Executive Chairman	Conductscience
2019-2020	Associate Director of Digital Growth Strategy	Center for Innovation in Digital HealthCare
2020-2021	Founder, Executive Chairman	GetUsPPE
2020-	Director of Digital Growth Strategy	Center for Innovation in Digital HealthCare
2021-2021	Medical Director (contract)	Curative
2022-2022	Medical Director (contract)	Gothams

2023-	Program Director, Master of Science in Data Analytics	MGH Institute of Health Professions
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Committee Service:

Local

2018-2018	Digital Academy Interest Group	Harvard Affiliated Emergency Medicine Residency
2018-2019	HAEMR Well Committee	Harvard Affiliated Emergency Medicine Residency

National

2020-	Emojination Healthcare Committee	Emojination
2021	Virtual Presence Committee	Society of Academic Emergency Medicine

Professional Societies:

2019-	American College of Emergency Physicians	Member
	2020-2021	Supply Chain Task Force
2019-	Society of Academic Emergency Medicine	Member
	2021-	Virtual Presence Committee
2021-	Society of Critical Care Medicine	Member
2021-	Institute of Electrical and Electronics Engineers (IEEE)	Member

2023-	American Medical Informatics Association	Member
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Grant Review Activities:

2021	Opioid Crisis Innovation Challenge, Member	Foundation for Opioid Response Efforts
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Editorial Activities:**Ad hoc Reviewer**

Journals of Neuropathology and Applied Neurobiology

BMC Neuroscience

Journal Neuroinflammation

International Journal of Emergency Medicine

International Journal of Environmental Research and Public Health

Proceedings of the Institution of Mechanical Engineers, Part H

Scientific Reports

Expert Review of Medical Devices

HealthCare

Expert Review of Respiratory Medicine

Journal of Medical Internet Research

PLoS One

Other Editorial Roles

2021-	Assistant Editor	Practical Emergency Resuscitation and Critical Care 2nd Edition; Cambridge Press
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Honors and Prizes:

2013	Lloyd Greif Center Market Traction Award	USC Student Innovator Showcase	Innovation Project
2015	Irving I. Lasky M.D. Memorial Award	Keck School of Medicine	Most outstanding research for medical students
2017	Richard C. Wuerz, MD Scholarship for Emergency Medicine Research	Harvard Affiliated Emergency Medicine Residency	A model for a highly autonomous outcomes-based preclinical neurological testing device

2020	Spark Award	Harvard Innovation Lab	Language for Equality-- Doctorlingo.com
2020	25 Under 45 Influencers in Emergency Medicine	Emergency Medicine Resident's Association	

Report of Funded and Unfunded Projects

Funded Past Projects

2020-2023	Get Waivered National Foundation for Opioid Response Efforts (FORE) PI (\$67,272) The major goal of the award is to study and compare the use of digital tools to increase the number of emergency department physicians able to prescribe buprenorphine for the treatment of opioid use disorder.
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Training Grants and Mentored Trainee Grants

2012-2013	Dean's Research Scholarship: Stroke & Intracranial Hemorrhage Clinical Translational Research Keck School of Medicine Foundation Investigator (PI: William Mack) The major goal is to study various topics include emergency stroke routing procedures, murine models of subtle hypoperfusion, rodent behavior methodologies, healthcare disparities, and radiographic technologies in neurovascular pathologies.
2022	Development of an EPIC-based Emergency Department Clinical Knowledge and Guidelines SmartList for Real-time EMR Clinical Decision Support Centers for Expertise Healthcare Quality & Patient Safety, Trainee Research Grant, Mentor for Drew Birrenkott, Spring 2022 Mentor and Principal Investigator (PI) The major goal of the award is to development of an EPIC-based Emergency Department Clinical Knowledge and Guidelines SmartList for Real-time EMR Clinical Decision Support

Unfunded Current Projects

2021-	A Novel Risk Stratification Tool for Emergency Department Discharge PI I created and am studying the utilization of a novel discharge severity index to
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risk stratify discharges from the Intensive Care Unit. IRB Protocol #: 2020P002473.

2021- Use of Emoji as a Visual Analogue Scale.
PI
I created and am studying the utilization of an Emoji-based standard Visual Analogue Scale for the study of pain in the Intensive Care Unit. IRB Protocol #: 2020P002473.

Report of Local Teaching and Training

Formal Teaching of Residents, Clinical Fellows and Research Fellows (post-docs):

2018	Urological Emergencies Resident Physicians	Harvard Affiliated Emergency Medicine Residency 1 hour lecture
2021	Morning report, digital teaching Resident Physicians	Harvard Affiliated Emergency Medicine Residency 1 hour lecture

Clinical Supervisory and Training Responsibilities:

2021	Clinical Supervision Residents and Medical Students	Department of Emergency Medicine, Massachusetts General Hospital 8 hours / week
2021	Clinical Supervision Medical students	Department of Emergency Medicine, Massachusetts General Hospital 8 hours / week

Research Supervisory and Training Responsibilities:

2021-	Research Supervision Research Fellow	Department of Emergency Medicine Massachusetts General Hospital 4 hour / week.
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Local Invited Presentations:

☒ *No presentations below were sponsored by 3rd parties/outside entities*
2016, 2020 Digital Health and Growth Engineering / Workshop

Harvard Innovation Lab, Cambridge, MA

2020 COVID-19: Key Considerations for a Safe and Equitable Reopening
COVAC MA, Boston, MA

2020 Resiliency & Trust: Local, Regional, and National Response to PPE
Shortages
Harvard-MIT Center for Regulatory Science, Harvard University,
Cambridge, MA

Report of Regional, National and International Invited Teaching and Presentations

☒ *Those presentations below sponsored by outside entities are so noted and the sponsor(s) is (are) identified.*

Regional

2022 Emoji for the Medical Community / Grand Rounds
Brown Center for Digital Innovation
Providence, RI (Virtual)

National

2020 Digital Health / Digital Presentation
Rocky Vista University
Parker, CO

2020 GetUsPPE / Digital Presentation
Clinton Foundation
New York, NY

2020 Supply Shortage Solutions Symposium, Helpful Engineering / Invited Lecture
National Institute of Standards and Technology
Gaithersburg, MD (Virtual)

2020 GetUsPPE and Digital Organizations / Invited Lecture
Executive MBA: University of Santa Clara
Santa Clara, CA (Virtual)

2020 Preparing for the Next Pandemic Summit / Symposium
American College of Emergency Physicians
Irving, TX (Virtual)

2021 Initiation of Buprenorphine and Pain Management in the ED Implementation

Workshop Approaches to Building the ED Workforce and Implementation
Models / Invited Lecture
American College of Emergency Physicians
Irving, TX (Virtual)

2021 The Future of Home Care: What New Care Models, On-demand Services and
Innovations in Logistics / Workshop
Physician Innovation Network, American Medical Association
Chicago, IL (Virtual)

2021 Does Social Media Make Better Physicians? Peer and Expert Faculty Consult
/ Workshop
Stanford University
Stanford, CA (Virtual)

2022 Allocation Algorithms for Emergency Medicine: Who, What, When, Where,
Why & How / Invited Lecture
American College of Emergency Physicians
Irving, TX (Virtual)

2022 Telehealth equity, broadband access, and key provisions in the Bipartisan
Infrastructure Law
White House Office of Public Engagement Health Equity Forum Series
Washington, DC (Changed to virtual)

2022 Digital Health: Innovation, Problem Solving, and Medicine
American Medical Student Convention 2022
Washington, DC

2022 The New School: Educating Medical Students via Social Media
American Medical Student Convention 2022
Washington, DC

2022 Health Equity Roundtable: Digital Health
White House Office of Public Engagement
Washington, DC

International

2020 GetUsPPE / Digital Presentation
INSEAD Business School
Fontainebleau, FR

2022 Digital Health Human Computer Interactions and Digital Growth
Chitkara University (Virtual)

Report of Clinical Activities and Innovations

Current Licensure and Certification:

2013-	CITI Human Subjects Research
2015-	Advanced Cardiac Life Support (ACLS) Certification
2015-	Pediatric Cardiac Life Support (PALS) Certification
2015-	Basic Life Support (BLS) Certification
2019-	Medical License, Massachusetts
2019-	DEA X Waiver
2021-	Medical License, California
2021-	Medical License, Rhode Island
2021-	American Board of Emergency Medicine
2023-	American Board of Preventative Medicine (Medical Informatics)

Practice Activities:

2019-	Emergency Medicine	Massachusetts General Hospital, Boston, MA	800 hours / year
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Clinical Innovations:

Developed an innovative smart phrase approach to practice pattern updates and synchronization. (2019)	Helped to create a system of standardized smart phrases for practice guideline updates at MGH; disseminated smart phrases for COVID-19 to MGH faculty that impacted documentation as well as changed practice patterns. Hundreds of smart phrases are used daily by resident physicians at MGH to teach standard clinical practice.
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Report of Teaching and Education Innovations

ALIEM.com contextual search	I implemented a novel quick and contextual search technology for on-demand content for ALIEM.com, one of the most frequently-used
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technology (2018-)	educational sources in Emergency Medicine (over 1.5 million page views). This created the ability to quickly and easily find the contextual topic and content that learners need at point of demand.
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Report of Technological and Other Scientific Innovations

Automated Maze Apparatus (2016-)	https://www.nature.com/articles/d41586-018-02403-5 I created a smart behavioral rodent maze that could integrate with optogenetics experiments and integrate with a rodent's choices in real-time. Rodents can modulate how the experiments run based on their current performance. The maze is currently used in neuroscience laboratories in USA, Germany, and Canada.
Anatomical Heart and Lung Emoji (2020)	I authored the anatomical heart and lung emoji that are on Unicode standard and Apple iOS and Android devices worldwide. Digital health utilization for representation of health and medicine in commonly used standard of digital communication.

Report of Education of Patients and Service to the Community

☒ *No presentations below were sponsored by 3rd parties/outside entities*

Activities

2020	Educational Session: Technology Transfer: Working with Large Universities Venture Cafe. Cambridge, MA
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Report of Scholarship

ORCID: 0000-0002-9902-5077

Peer-Reviewed Scholarship in print or other media:

Research Investigations

1. Gao F, Shi L, Russin J, Zeng L, Chang X, **He S**, Chen TC, Giannotta SL, Weisenberger DJ, Zada G, Mack WJ, Wang K. DNA methylation in the malignant transformation of meningiomas. PLoS One. 2013 Jan 1;8(1):e54114. PMID: 23349797
2. Mehta V, Russin J, Spirtos A, **He S**, Adamczyk P, Amar AP, Mack WJ. Matrix Metalloproteinases in Cerebral Vasospasm following Aneurysmal Subarachnoid Hemorrhage. Neurol Res Int. 2013 Apr 1;2013:943761. PMID: 23691315
3. Adamczyk P, Attenello F, Wen G, **He S**, Russin J, Sanossian N, Amar AP, Mack WJ. Mechanical thrombectomy in acute stroke: utilization variances and impact of procedural volume on inpatient

mortality. *J Stroke Cerebrovasc Dis*. 2013 Nov 1;22(8):1263-1269. PMID: 23017430

4. Chang X, Shi L, Gao F, Russin J, Zeng L, **He S**, Chen TC, Giannotta SL, Weisenberger DJ, Zada G, Wang K, Mack WJ. Genomic and transcriptome analysis revealing an oncogenic functional module in meningiomas. *Neurosurg Focus*. 2013 Dec 1;35(6):E3. PMID: 24289128
5. Liu Q, **He S**, Groysman L, Shaked D, Russin J, Scotton TC, Cen S, Mack WJ. White matter injury due to experimental chronic cerebral hypoperfusion is associated with C5 deposition. *PLoS One*. 2013 Dec 30;8(12):e84802. PMID: 24386419
6. Attenello FJ, Adamczyk P, Wen G, **He S**, Zhang K, Russin JJ, Sanossian N, Amar AP, Mack WJ. Racial and socioeconomic disparities in access to mechanical revascularization procedures for acute ischemic stroke. *J Stroke Cerebrovasc Dis*. 2014 Feb 1;23(2):327-334. PMID: 23680690
7. Wen T, Attenello FJ, **He S**, Cen Y, Kim-Tenser MA, Sanossian N, Amar AP, Mack WJ. Racial and socioeconomic disparities in incidence of hospital-acquired complications following cerebrovascular procedures. *Neurosurgery*. 2014 Jul;75(1):43-50. PMID: 24662507
8. Hanks N, Wen G, **He S**, Song S, Saver JL, Cen S, Kim-Tenser M, Mack W, Sanossian N. Expansion of U.S. emergency medical service routing for stroke care: 2000-2010. *West J Emerg Med*. 2014 Jul 1;15(4):499-503. PMID: 25035758
9. Wen T, **He S**, Attenello F, Cen SY, Kim-Tenser M, Adamczyk P, Amar AP, Sanossian N, Mack WJ. The impact of patient age and comorbidities on the occurrence of "never events" in cerebrovascular surgery: an analysis of the Nationwide Inpatient Sample. *J Neurosurg*. 2014 Sep 1;121(3):580-586. PMID: 24972123
10. Liu Q, Babadjouni R, Radwanski R, Cheng H, Patel A, Hodis DM, **He S**, Baumbacher P, Russin JJ, Morgan TE, Sioutas C, Finch CE, Mack WJ. Stroke Damage Is Exacerbated by Nano-Size Particulate Matter in a Mouse Model. *PLoS One*. 2016 Apr 12;11(4):e0153376. PMID: 27071057
11. Ramirez L, Kim-Tenser MA, Sanossian N, Cen S, Wen G, **He S**, Mack WJ, Towfighi A. Trends in Acute Ischemic Stroke Hospitalizations in the United States. *J Am Heart Assoc*. 2016 May 11;5(5). PMID: 27169548
12. Ramirez L, Kim-Tenser MA, Sanossian N, Cen S, Wen G, **He S**, Mack WJ, Towfighi A. Trends in Transient Ischemic Attack Hospitalizations in the United States. *J Am Heart Assoc*. 2016 Sep 24;5(9):e004026. PMID: 27664805
13. Patel A, Moalem A, Cheng H, Babadjouni RM, Patel K, Hodis DM, Chandegara D, Cen S, **He S**, Liu Q, Mack WJ. Chronic cerebral hypoperfusion induced by bilateral carotid artery stenosis causes selective recognition impairment in adult mice. *Neurol Res*. 2017 Oct 1;39(10):910-917. PMID: 28828966
14. Russin JJ, Montagne A, D'Amore F, **He S**, Shiroishi MS, Rennert RC, Depetris J, Zlokovic BV,

Mack WJ. Permeability imaging as a predictor of delayed cerebral ischemia after aneurysmal subarachnoid hemorrhage. *J Cereb Blood Flow Metab.* 2018 Jun 1;38(6):973-979. PMID: 29611451

15. Gondi S, Beckman AL, Deveau N, Raja AS, Ranney ML, Popkin R, **He S**. Personal protective equipment needs in the USA during the COVID-19 pandemic. *Lancet.* 2020 May 23;395(10237):e90-e91. PMID: 32416784
16. Lai L, Sato R, **He S**, Ouchi K, Leiter R, deLima Thomas J, Lawton A, Landman AB, Mark Zhang H. Usage Patterns of a Web-Based Palliative Care Content Platform (PalliCOVID) During the COVID-19 Pandemic. *J Pain Symptom Manage.* 2020 Oct 1;60(4):e20-e27. PMID: 32730951
17. Lai D, Wang D, Calvano J, Raja AS, He S. Lai D, Wang D, Calvano J, Raja AS, **He S**. Addressing immediate public coronavirus (COVID-19) concerns through social media: Utilizing Reddit's AMA as a framework for Public Engagement with Science. *PLoS One.* 2020 Oct 6;15(10):e0240326. PMID: 33021985
18. Bala R, Lee C, Pallant B, Srinivasan M, Lurie D, Jacob R, Bhagchandani N, Ranney M, **He S**. Algorithmic matching of personal protective equipment donations with healthcare facilities during the COVID-19 pandemic. *NPJ Digit Med.* 2021 Jan 29;4(1):13. PMID: 33514805
19. Calvano JD, Fundingsland EL Jr, Lai D, Silacci S, Raja AS, **He S**. Applying website rankings to digital health centers in the united states to assess public engagement: website usability study. *JMIR Hum Factors.* 2021 Mar 29;8(1):e20721. PMID: 33779564
20. Fundingsland E, Fike J, Calvano J, Raja A, Lai D, Silacci S, Haas M, Chan T, **He S**. Website usability analysis of United States emergency medicine residencies. *AEM Educ Train.* 2021 May 7;5(3):e10604. PMID: 34124531
21. Martin A, Raber JP, Shayer D, Lai D, Goodcoff A, Kannikal J, Raja AS, **He S**. Get waived remote: Nationwide, remote DEA-x waiver course in response to COVID-19. *Digit Health.* 2021 Oct 19;7:20552076211048985. PMID: 34691756
22. Lai D, Wang D, McGillivray M, Baajour S, Raja AS, **He S**. Assessing the quality of randomization methods in randomized control trials. *Healthc (Amst).* 2021 Dec 1;9(4):100570. PMID: 34343852
23. Gale JJ, Black KC, Calvano JD, Fundingsland EL Jr, Lai D, Silacci S, **He S**. An Analysis of US Academic Medical Center Websites: Usability Study. *J Med Internet Res.* 2021 Dec 21;23(12):e27750. PMID: 34932015
24. Chong P, Yoon BJ, Lai D, Carlson M, Lee J, **He S**. Looking back on forward-looking COVID models. *Patterns (N Y).* 2022 Mar 22;3(7):100492. PMID: 35845843
25. **He S**, Renne A, Argandykov D, Convissar D, Lee J. Comparison of an Emoji-Based Visual Analog Scale With a Numeric Rating Scale for Pain Assessment. *JAMA.* 2022 Jul 12;328(2):208-209. PMID: 35819433

26. Faber JMM, Carlson M, Lai D, Calvano JD, Monette DL, Gisondi M, **He S**. The relationship between publication citations and twitter mentions in emergency medicine. *Am J Emerg Med* 2022 Sep;59:207-210. PMID: 35680508
27. Chong P, Grob P, DiMattia G, Calvano J, Swanson K, **He S**, Gubler KD, LaPorta A. Website Usability Analysis of U.S. Military Residency Programs. *Mil Med* 2022 Oct 6;usac290. PMID: 36200474
28. **He S**, Shyamsundar S, Chong P, Kannikal J, Calvano J, Balapal N, Kallenberg N, Balaji A, Ankem A, Martin A. Analyzing opioid-use disorder websites in the United States: An optimized website usability study. *Digit Health* 2022 Oct 6;8:20552076221121529. PMID: 36225987
29. Seto N, Beach J, Calvano J, Lu S, **He S**. American Anesthesiology Residency Programs: Website Usability Analysis. *Interact J Med Res* 2022 Oct 20;11(2):e38759. PMID: 36264625
30. Wang D, Balapal N, Ankem A, Shyamsundar S, Balaji A, Kannikal J, Bruno M, **He S**, Chong P. Primary Perspectives in Meme Utilization as a Digital Driver for Medical Community Engagement and Education Mobilization: Pre-Post Study. *JMIR Hum Factors*. 2023 Jan 27;10:e40244. PMID: 36705964
31. Rubashkin M, Purzycki T, Coolahan K, Lee C, LuriecDJ, Batorsky B, Chen A, Calderón J, **He S**. PPE needs in the United States during the COVID-19 pandemic: An analysis using the GetUsPPE online platform. *Public Health Chall.*2023;2:e65.
32. Gibbons PW, Kim J, Cash RE, **He S**, Lai D, Christian Renne B, Lee J. Influence of ICU Surge and Capacity on COVID Mortality Across U.S. States and Regions During the COVID-19 Pandemic. *J Intensive Care Med*. 2023 Feb 15:8850666231157338. PMID: 36789759
33. Lin M, Phipps M, Chan TM, Thoma B, Nash CJ, Yilmaz Y, Chen D, **He S**, Gisondi MA, 2023. Digital Impact Factor: A Quality Index for Educational Blogs and Podcasts in Emergency Medicine and Critical Care. *Ann Emerg Med.*, 82(1), pp.55-65.
34. **He S**, Chen D, Black KC, Chong P, Marzouk S, Yoon BJ, Davis K, Lee J, 2023. Network Analysis of Academic Medical Center Websites in the United States. *Sci Data.*, 10(1), p.245.
35. Ouwerkerk JJ, Dorken-Gallastegi A, Renne BC, Lord S, **He S**, van Ee EPX, Argandykov D, Proaño-Zamudio JA, Hwabejire JO, Kaafarani HMA, Velmahos GC, Lee J, 2023. Predictors of Mortality in Extracorporeal Membrane Oxygenation Support Patients Following Major Trauma. *J Surg Res.*, 6(12).
36. Jiang L, Raza A, El Ariss AB, Chen D, Danaher-Garcia N, Lee J, He S. (2024). Impact of medical technologies may be predicted using constructed graph bibliometrics. *Sci Rep*, 14:2419. doi:10.1038/s41598-024-52233-x.
37. **He S**, Chong P, Yoon BJ, Chung PH, Chen D, Marzouk S, Black K, Sharp W, Safari P, Goldstein J, Raja A, Lee J. (2024). Entropy Removal of Medical Diagnostics. *Sci Rep*, 14:1181.

doi:10.1038/s41598-024-51268-4.f

- 38 Pickering, MD, A., Rafaqat, MD, W., Balk, A., Chen, M., Abrogena, MD, L., **He, S.**, Showstark, M., Davis, A., Chen, A., & Lee, J. (2024). A Building Blocks Approach to Implementing a Telehealth Clinic Model to Improve Primary Care Access in the Philippines: A Large-scale Pilot Project. *Telehealth and Medicine Today*, 9(1). <https://doi.org/10.30953/thmt.v9.456>
- 39 **He S**, Swanson K, Calvano J, Chen D, Telvizian T, Jiang L, Chong P, Schwell J, Mak G, Lee J. Biomedical text readability after hypernym substitution with fine-tuned large language models. *PLOS Digit Health*. 2024;3(4):e0000489. doi:10.1371/journal.pdig.0000489

Other peer-reviewed scholarship

1. Pham MH, Attenello FJ, Lucas J, **He S**, Stapleton CJ, Hsieh PC. Conservative management of ossification of the posterior longitudinal ligament. A review. *Neurosurg Focus*. 2011 Mar 1;30(3):E2. PMID: 21434818
2. Adamczyk P, **He S**, Amar AP, Mack WJ. Medical Management of Cerebral Vasospasm following Aneurysmal Subarachnoid Hemorrhage: A Review of Current and Emerging Therapeutic Interventions. *Neurol Res Int*. 2013 Apr 1;2013:462491. PMID: 23691312
3. Belur PK, Chang JJ, **He S**, Emanuel BA, Mack WJ. Emerging experimental therapies for intracerebral hemorrhage: targeting mechanisms of secondary brain injury. *Neurosurg Focus*. 2013 May 1;34(5):E9. PMID: 23634928
4. **He S**, Pham MH, Pease M, Zada G, Giannotta SL, Wang K, Mack WJ. A review of epigenetic and gene expression alterations associated with intracranial meningiomas. *Neurosurg Focus*. 2013 Dec 1;35(6):E5. PMID: 24289130
5. **He S**, Mack WJ. Health-related quality of life after aneurysmal subarachnoid hemorrhage: interplay between physical, cognitive, and emotional factors. *World Neurosurg*. 2014 Jan 1;81(1):37-39. PMID: 23333474
6. **He S**, Mack WJ. Considering radiation exposure during diagnostic and therapeutic procedures for arteriovenous malformations in the setting of pregnancy. *World Neurosurg*. 2014 Jan 1;81(1):22-24. PMID: 23416771
7. **He S**, Lai D, Mott S, Little A, Grock A, Haas MRC, Chan TM. Remote e-Work and Distance Learning for Academic Medicine: Best Practices and Opportunities for the Future. *J Grad Med Educ*. 2020 Jun 1;12(3):256-263. PMID: 32595840
8. **He S**, Ojo A, Beckman AL, Gondi S, Gondi S, Betz M, Faust JS, Choo E, Kass D, Raja AS. The Story of #GetMePPE and GetUsPPE.org to Mobilize Health Care Response to COVID-19 : Rapidly Deploying Digital Tools for Better Health Care. *J Med Internet Res*. 2020 Jul 20;22(7):e20469.

PMID: 32530813

9. Haas MRC, **He S**, Sternberg K, Jordan J, Deiorio NM, Chan TM, Yarris LM. Reimagining Residency Selection: Part 1-A Practical Guide to Recruitment in the Post-COVID-19 Era. *J Grad Med Educ*. 2020 Oct 1;12(5):539-544. PMID: 33149819
10. Sternberg K, Jordan J, Haas MRC, **He S**, Deiorio NM, Yarris LM, Chan TM. Reimagining Residency Selection: Part 2-A Practical Guide to Interviewing in the Post-COVID-19 Era. *J Grad Med Educ*. 2020 Oct 1;12(5):545-549. PMID: 33149820
11. Lai L, Wittbold KA, Dadabhoy FZ, Sato R, Landman AB, Schwamm LH, **He S**, Patel R, Wei N, Zuccotti G, Lennes IT, Medina D, Sequist TD, Bomba G, Keschner YG, Zhang HM. Digital triage: Novel strategies for population health management in response to the COVID-19 pandemic. *Healthc (Amst)*. 2020 Dec 1;8(4):100493. PMID: 33129176
12. Jordan J, Sternberg K, Haas MRC, **He S**, Yarris LM, Chan TM, Deiorio NM. Reimagining residency selection: part 3-a practical guide to ranking applicants in the post-covid-19 era. *J Grad Med Educ*. 2020 Dec 1;12(6):666-670. PMID: 33391587
13. Lai D, Lee J8, **He S**. Emoji for the Medical Community-Challenges and Opportunities. *JAMA*. 2021 Sep 7;326(9):795-796. PMID: 34547099
14. Jaffe TA, Wang D, Loveless B, Lai D, Loesche M, White B, Raja AS, **He S**. A Scoping Review of Emergency Department Discharge Risk Stratification. *West J Emerg Med*. 2021 Sep 23;22(6):1218-1226. PMID: 34787544
15. Fundingsland EL Jr, Fike J, Calvano J, Beach J, Lai D, **He S**. Methodological Guidelines for Systematic Assessments of Health Care Websites Using Web Analytics: Tutorial. *J Med Internet Res*. 2022 Apr 15;24(4):e28291. PMID: 35436216
16. **He S**, Marzouk S, Balk A, Boyle T, Lee J. The telehealth advantage: Supporting humanitarian disasters with remote solutions. *Am J Disaster Med*. 2022 Spring;17(2):95-99. PMID: 36494880
17. Samorani M, Bala R, Jacob R, **He S**. A Software Package and Data Set for the Personal Protective Equipment Matching Problem During COVID-19. *INFORMS J Comput* 2022 Jun 34(5):2754-2761.
18. Balapal N, Ankem A, Shyamsundar S, **He S**. Opioid Use Disorder Education for Students and the Future of Opioid Overdose Treatment. *JMIR Med Educ*. 2022 Jul 18;8(3):e37081. PMID: 35849432
19. **He S**, Lai D, Jin G, Lee J. SAFER framework for moving forward on the medical device right to repair. *BMJ Innovations* 2022 Oct 26.
20. **He S**, Ojo A, Beckman AL, Gondi S, Ranney M, Betz M, Faust JS, Choo E, Kass D, Raja AS. Correction: The Story of #GetMePPE and GetUsPPE.org to Mobilize Health Care Response to COVID-19 : Rapidly Deploying Digital Tools for Better Health Care. *J Med Internet Res*. 2023; 25:

e46028. PMID: 36720119

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Non-peer reviewed scholarship in print or other media:

Proceedings of meetings or other non-peer reviewed scholarship

1. Kusner J, **He S**. COVID-19 has sparked physician-built response systems in the US. *BMJ Opinion*. Nov 20, 2020. <https://blogs.bmj.com/bmj/2020/11/20/covid-19-has-sparked-physician-built-response-systems-in-the-us/>

Reviews, chapters, monographs and editorials

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2. Black K, Chen D, Corscadden L, Chong P, Marzouk S, Martin M, Lee J, Yoon Byung-Jun, **He S**. Network Analysis of Academic Medical Center Websites in the United States. Presented at AMIA CIC; 2023.
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4. Rafaqat W, Pickering A, Balk A, Chen M, **He S**, Showstark M, Lee J. Applying a Building Blocks Model to Telehealth Clinic Implementation in the Philippines: A Large-scale Telehealth Pilot Project. Presented at Digital Health and Telemedicine Conference; 2023.
5. Chen D, Black KC, Chong P, Gale J, **He S**. Automated Mapping of OUD Resources Using Hyperlink Network Analysis. Presented at the American Medical Informatics Association Annual Symposium; 2023 Nov; New Orleans, LA.
6. Abji N, Yuan J, **He S**. Learngle: Creation of a Web Application as a Study Resource for the Clinical Informatics Board Exam. Poster presented at the American Medical Informatics Association Annual Symposium; 2023 Nov; New Orleans, LA.

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