VCLIC News and Happenings, Volume 39

We can't believe it is already September! VCLIC's year has kicked off in earnest, and there are so many events to share with you.

Coming up very soon is our second-annual **InformaticCon**, which will take place on September 27th, 2023 at, and in collaboration with, the Vanderbilt University School of Nursing. Please see below for more details and to sign up to attend. We hope to see you there!

In addition to InformaticCon, we have hosted our first workshop of the year (**Intro to Epic for Non-Clinicians**, with **Julian Genkins, MD**), and our first **Clinical Informatics Office Hours** of the year (with **Adam Wright, PhD**). **Ethan Gershon, MD**, also delivered the first DBMI/VCLIC Grand Rounds Seminar of the year: **"The EHR Vendor Viewpoint."** Our next workshop will be on October 3rd, 2023, with **Allison McCoy, PhD**, on **Intro to Epic Build Capabilities**. Please see below for more information and to sign up.

We also hope you saw the email announcing our new **VCLIPS** for this year! We have already released a handful of new video series and are working on several more mini series to be announced later this semester.

Last month, several VCLIC Members and VUMC folks attended **Epic's User Group Meeting (UGM)** at their headquarters in Verona, WI. See below for a brief recap and some fun pictures!

For our feature this month, we would like to highlight **Sabrina E Carro, MD,** a Pediatric Hospital Medicine Fellow at VUMC. We are happy to spotlight her this month and are so excited about her contributions to clinical informatics!

Finally, and per usual, we have several Center members who have **received awards**, been mentioned in the **news**, presented **lectures** and at conferences, **published papers**, have had **abstracts** accepted to conferences, and had **honors or fellowships** bestowed on them.

If you have any questions or would like to engage with our team, please email Elise (elise.russo@vumc.org).

Coming up on September 27th: InformaticCon 2023!

Please join us for VCLIC's second annual InformaticCon, this year presented in partnership with VUSN. This special, three-hour event will include lunch, a sampling of short, dynamic talks, a panel, and a poster session to showcase clinical informatics work going on across VUMC! It will take place on Wednesday, September 27th, 2023, from 10:00 am to 1:00 pm at the Vanderbilt School of Nursing (more details regarding location will be sent soon).

This event is eligible for 2.75 nursing continuing professional development (NCPD) contact hours, as well as CME.

Vanderbilt University Medical Center, Nursing Education and Professional Development, is accredited as a provider of nursing continuing professional development by the American Nurses Credentialing Center's Commission on Accreditation.

Event Schedule:
10:00-11:00 am Poster Session
11:00-11:45 am Panel on how to get involved in Clinical Informatics at Vanderbilt
11:45 am-12:00 pm lunch
12:00-1:00 pm Lightning Talks

Please indicate your interest in attending via the form below-we will be serving lunch, so we'd like to get an accurate head count. Additional details about timing and content will be shared then/as the event gets closer. We will close sign ups on 9/21/23.

https://redcap.link/InformaticCon2023signup

Please see our Program for the list of posters, presenters, and topics covered!

All VUMC and VU faculty, staff, trainees, and students are welcome to participate and attend, and we hope to see you there on September 27th to kick off our academic year!

Fall 2023 VCLIPS

Last year the Vanderbilt Clinical Informatics Center (VCLIC) introduced Vanderbilt Clinical Informatics Practical Shorts(VCLIPS). These are bite-size instructional videos on practical clinical informatics topics from expert VCLIC faculty (and staff). This year we are excited to release several more VCLIPS, covering new topics and featuring new VCLIC experts. We also plan to continue to offer synchronous workshops on the topics in highest demand.

At this time, we are releasing 4 more VCLIPS series, including:

- Exempt IRB Research (Elise Russo, MPH)
  - Learn about human research protections, exempt research, and how to submit an exempt protocol to the IRB using VUMC/VU's DiscoverE system
- Address Geocoding (Bryan Steitz, PhD)
  - Learn how to convert text-based addresses to geographic coordinates using the free geocoding tool POINT
- Using Epic to Support Clinical Research (Eddie Qian, MD)
  - Learn how to integrate your randomized trial into Epic, including automatic implementation of trial criteria and patient randomization
- Signal Data (Sean Huang, MD)
  - Learn about the wealth of efficiency data available for research within Epic's analytics tool called Signal

Coming soon:

- Agile Methods for Leading a Clinical or Research Informatics Team
- Implementing and Using PROMs Data
- Medication Data Tools
- Qualitative Methods
- SlicerDicer

Workshops and In-Person Opportunities (with snacks!):

- Intro to Epic Build Capabilities (Allison McCoy, PhD)

- o October 3ʳᵈ, 2023; 1:00-2:30 pm, 2525 West End (room 8110)--sign up below
- Audit Log and Signal Data Office Hours with Bryan Steitz, PhD and Sean Huang, MD
  - o November 7ᵗʰ, 2023; 1:00-2:30 pm, 2525 West End (room TBD)
- Clinical Informatics Office Hours
  - o December 5ᵗʰ, 2023; 1:00-2:30 pm

Last year's VCLIPS are still available, including: Introduction to Epic and Build Capabilities, Data Resources, Human Centered Design Principles and Processes, and Evaluation and Dissemination of HealthIT Interventions.

You can also access, contribute to, comment on or ask questions about all of the VCLIPS content (and more) on our Confluence site.

We will send out more details and signup information for each in-person session over the course of the semester. We hope to see you at the in-person sessions and to engage with you more around this content. Please reach out to me or Elise Russo with any questions, suggestions or feedback. Please let us know if you have ideas for additional VCLIPS that we could produce – we're hoping to grow our library over time.

Other VCLIC Events

We kicked off our Workshop series with **Julian Genkins, MD,** on 9/11/23 when he covered **"Intro to Epic for Non-Clinicians"** (see VCLIPS for more of this material). Then, on 9/13/23, **Ethan Gershon, MD,** kicked off our lecture series with **"The EHR Vendor Viewpoint."** Dr. Gershon's talk can be viewed here.

Please join us on **October 3rd, 2023 from 1:00-2:30 pm** for **Allison McCoy, PhD**'s workshop session on **Epic Build Capabilities**. This session will be in-person only, at 2525 West End, room 8110.

This session will cover things like how to get certified to build in Epic, what a BPA (alert) build looks like, and a few other surprises!

There will be snacks (it's Adam's birthday)! Also, if you'd like to view this material asynchronously, please view our Intro to Epic and Build Capabilities VCLIPS, here: https://www.vumc.org/vclic/intro-epic-and-build-capabilities.

Sign up for the in-person session on October 3rd here: https://redcap.link/kiz1vrrg.

UGM Wrap-Up

Last month, many of our VCLIC members including **Allison McCoy, PhD; Yaa Kumah-Crystal, MD, MPH, MS; Ashley Spann, MD, MSACI; Bryan Steitz, PhD; Dara Mize, MD; Travis Osterman, DO, MS; Neal Patel, MD, MPH;** and more attended Epic's Users Group Meeting (UGM) 2023 in Verona, Wisconsin. Allison presented on a panel to discuss "Lessons Learned from Clinical Decision Support Gone Wrong," and Bryan discussed "Improving Immediate Release of Test Results for Patients and Providers." They also had time to have fun and share some laughs- see more pics here and here!
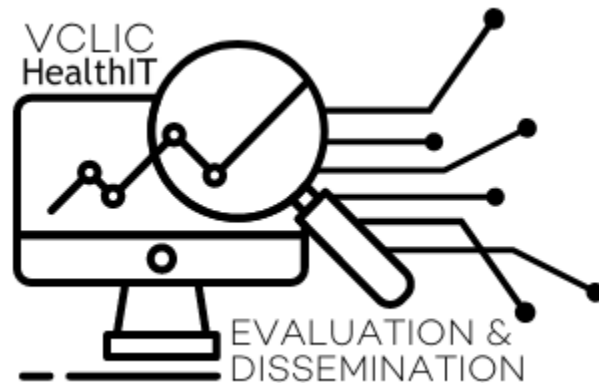
Featured Member: Sabrina E. Carro, MD

Sabrina E. Carro, MD joined VUMC as a Pediatric Hospital Medicine Fellow this past July. She is originally from the Mid-Atlantic, but travelled south to the University of Miami where she received her B.S. in Neuroscience. She then obtained her M.D. at the Lewis Katz School of Medicine at Temple University in Philadelphia before moving to Milwaukee, Wisconsin, where she completed her pediatrics residency at the Medical College of Wisconsin.

While in residency, she joined the Resident and APP Epic Advisory Committee, a group that provided clinical perspective to technical IT analysts across departments throughout the hospital. She also worked on a variety of projects focused on documentation, including the use of clinical decision support (CDS) to decrease "empty" SmartLinks in pediatric hospital medicine history & physicals and increasing note template usability for required Sepsis BPA (alert) documentation. She also worked to update and integrate the resident admission workflow from paper into the EHR.

In her own words: "Although I have only been at VUMC for just under 3 months, VCLIC has helped introduce and integrate me in an incredibly short time. Currently, I am planning to work with a small group to address and reduce interruptive, non-actionable BPAs. I have also joined a project evaluating the antimicrobial spectrum index as a measure of stewardship focused changes for community acquired pneumonia. Additionally, I am in the process of conceptualizing my overall fellowship project and hope to leverage informatics as a core component. Broadly, my informatics interests include clinical decision support, alert fatigue, and documentation burden. I am very early in my career, so these interests are likely to expand and change in the coming years. I am incredibly grateful for VCLIC for connecting me with people throughout the department and inspiring me to think creatively."

VCLIC + HealthIT Evaluation and Dissemination Program

We are still piloting the VCLIC + HealthIT Evaluation and Dissemination Program, run by **Allison McCoy, PhD**, VCLIC Senior Project Manager **Laura Zahn, MS** and VCLIC Director **Adam Wright, PhD**.

Evaluation and dissemination are key parts of the clinical informatics life cycle, and critical to understanding the usability and effectiveness of a tool, identifying potential areas for improvement, and sharing the work with others so the benefits can spread. The VCLIC + HealthIT Evaluation and Dissemination Program aims to provide support to researchers and developers across these project stages. This includes projects that are already built and in progress that we can pair with informatics or other VCLIC members to complete the evaluation, either by providing data or help with analyses. We can also help with abstract and manuscript writing to facilitate publication and sharing at conferences.

Do you have a new project idea or one already in progress you'd like assistance with? We want to help! Please use this interest survey to let us know!

Upcoming Conference Submission Deadlines

- o International Conference on Learning Representations (ICLR)
    - Abstract Submission deadline: September 21, 2023
    - Full Paper Submission deadline: September 28, 2023
    - Workshop submission deadline: October 20, 2023
- o Society for General Internal Medicine (SGIM)
    - Workshops, Clinical Updates, and Interest Group Submission deadline: September 26, 2023
    - Abstract Submissions: Open from October 24, 2023 - December 20, 2023
- o Pediatric Academic Societies (PAS) Meeting
    - Abstract Submission open from August 31, 2023 - November 1, 2023
- o Institute for Healthcare Improvement (IHI) Forum
    - Poster Deadline: November 1, 2023
- o Southern region SGIM
    - Call for Submissions open: October 11, 2023 - November 7, 2023
- o Epic XGM
    - Presentation Submission deadline: Early November 2023

Details on upcoming conferences and conference deadlines can be found on our Confluence page, here.

For those of you attending conferences and presenting posters, we have a template on our Confluence page that we would encourage you to use.

Presentations, Interviews, Honors, and Awards

Honors/Awards

Allison McCoy, PhD was elected to the American College of Medical Informatics (ACMI). Congratulations, Allison!

- **Dan France, PhD, MPH**, is the PI of a $2.6M R01 from The Eunice Kennedy Shriver National Institute of Child Health and Human Development (NICHD) entitled "Measuring NICU Nurse Practitioner Workload in Real-time to Improve Care Quality and Patient Safety". Co-investigators on the grant include Jason Slagle, PhD, **Shilo Anders, PhD**, **Eva Dye, DNP**, **Wael Alrifai, MD**, Dupree Hatch, MD, MPH, and Brenda Kulhanek, PhD.
- **Bryan Steitz, PhD** was awarded a five-year K01 grant from the National Institute on Aging for his project "Integrative Data Science Approach to Advance Care Coordination of ADRD by Primary Care Providers"
- **Alvin Jeffery, PhD** received the annual PhD Program Faculty Award from Vanderbilt University School of Nursing. Congrats!
- Congratulations to Peter Embí, MD, MS and **Laurie Novak, PhD, MHSA** who were awarded a **$1.25 million grant from the Moore Foundation**! Working with collaborators from Duke AI Health, the University of Iowa, and the Coalition for Health AI (CHAI) network, the grant aims to

support the creation and initial validation of standardized benchmarking tools to enable health systems to internally identify strengths and weaknesses for the development and deployment of AI technology.

- **Ashley Spann, MD, MSACI** and **Julian Genkins, MD** officially joined the Clinical Informatics Core team!
- **Tom Reese, PharmD, PhD** received an AHRQ Career Development Award (K08) for his project "Patient-Centered Decision Making to Improve #Opioid Use Disorder Treatment". He thanks his mentors **Jessica Ancker**, **MPH, PhD**, **Adam Wright, PhD** and Michael Matheny, MD, MS, MPH!
- **Trent Rosenbloom, MD, MPH, FACMI** had the opportunity to build connections and brainstorm about informatics opportunities to support quality, research, and clinical care at Kijabe Hospital in Kenya!
- **Patty Sengstack, DNP, RN-BC, FAAN,** Kelly Aldrich, and team welcomed their newest 2023 Vanderbilt Nursing Informatics students!
- **Sunil Kriplani, MD, MSc, SFHM, FACP** was interviewed as part of an article published by ACP Hospitalist, discussing how hospitalists are finding career opportunities helping their hospitals use data to improve care.

Conferences and Other Presentations

- **Colin Walsh, MD, MA** presented "Scalable Incident Detection via Natural Language Processing and Probabilistic Language Models" (collaborative VUMC DBMI/FDA Sentinel work) for the Sentinel Innovation and Methods Seminar Series on Sept. 20.
- **Jon Wanderer, MD** gave a talk on 9/11 at the American Society for Enhanced Recovery and Perioperative Medicine's annual meeting, titled "THE ROLE OF INFORMATICS IN ADVANCING PERIOPERATIVE CARE".
- **Robinson J**. "Hepatoblastoma in Trisomy 18: An Ethical Dilemma." Presentation, Children's Oncology Group Fall Meeting. September 2023.
- **Alvin Jeffery, PhD** was invited to speak at the *International Summit for AI in Healthcare* on "Inpatient nurses' preference and performance with risk information visualization."
- **Joey Legrand, PharmD, MS** spoke as part of a panel, titled "Generating More Realistic Synthetic Medication Data with Synthea", at the HL7 FHIR Synthetic Data Event 8/29-8/30.
- **Robinson JR**. "Leveraging AI and ChatGPT Technologies in Surgery." Presentation, American Women Surgeons. August 2023.
- Zhao OS, Shipe ME, Danko ME, **Robinson JR**. Post-Operative Outcomes in Gastrojejunostomy Tube Usage in Infants and Children. *American College of Surgeons Quality and Safety Conference.* July 2023.
- Stafman L, Shipe M, Correa H, Lovvorn H, **Robinson JR**. Vascularization via Submucosal Angiogenesis in Traction-induced Esophageal Lengthening for Long-gap Esophageal Atresia. *Tennessee American College of Surgeons.* July 2023.
- **Robinson JR.** "Sharing is Caring Interoperability and Secondary Use of Data." Oral Presentation, AMIA Annual Symposium. 2022.

- **Robinson JR**. "Studies on Research Informatics." Oral Presentation, AMIA Annual Symposium. 2022.

Publications

Narcisse DI, Kim H, Wruck LM, Stebbins AL, Muñoz D, **Kripalani S**, Effron MB, Gupta K, Anderson RD, Jain SK, Girotra S, Whittle J, Benziger CP, Farrehi P, Zhou L, Polonsky TS, Ahmad FS, Roe MT, Rothman RL, Harrington RA, Hernandez AF, Jones WS. Comparative Effectiveness of Aspirin Dosing in Cardiovascular Disease and Diabetes Mellitus: A Subgroup Analysis of the ADAPTABLE Trial. *Diabetes Care*. Published online September 15, 2023:dc230749. doi:10.2337/dc23-0749

Mayberry LS, Zhao S, Roddy MK, Spieker AJ, Berg CA, **Nelson LA**, Greevy RA. Family Typology for Adults With Type 2 Diabetes: Longitudinal Stability and Validity for Diabetes Management and Well-Being. *Diabetes Care*. Published online September 14, 2023:dc230827. doi:10.2337/dc23-0827

Bloch KC, Glaser C, **Gaston D**, Venkatesan A. Executive Summary: State-of-the Art: Acute Encephalitis. *Clin Infect Dis*. 2023;77(5):669-671. doi:10.1093/cid/ciad456

Wu M, **Liu S**, Wang C, Wu Y, Liu J. Risk factors for mortality among lung cancer patients with covid-19 infection: A systematic review and meta-analysis. *PLoS One*. 2023;18(9):e0291178. doi:10.1371/journal.pone.0291178

Lewis JA, Bonnet K, Schlundt DG, Byerly S, Lindsell CJ, Henschke CI, Yankelevitz DF, York SJ, Hendler F, Dittus RS, Vogus TJ, **Kripalani S**, Moghanaki D, Audet CM, Roumie CL, Spalluto LB. Rural barriers and facilitators of lung cancer screening program implementation in the veterans health administration: a qualitative study. *Front Health Serv*. 2023;3:1209720. doi:10.3389/frhs.2023.1209720

Mistry EA, Hart KW, Davis LT, Gao Y, Prestigiacomo CJ, Mittal S, Mehta T, LaFever H, Harker P, Wilson-Perez HE, Beasley KA, Krothapalli N, Lippincott E, Stefek H, Froehler M, Chitale R, Fusco M, Grossman A, Shirani P, Smith M, Jaffa MN, Yeatts SD, Albers GW, **Wanderer JP**, Tolles J, Lindsell CJ, Lewis RJ, Bernard GR, Khatri P. Blood Pressure Management After Endovascular Therapy for Acute Ischemic Stroke: The BEST-II Randomized Clinical Trial. *JAMA*. 2023;330(9):821-831. doi:10.1001/jama.2023.14330

Bland HT, Gilmore MJ, Andujar J, Martin MA, Celaya-Cobbs N, Edwards C, Gerhart M, Hooker GW, Kraft SA, Marshall DR, Orlando LA, Paul NA, Pratap S, **Rosenbloom ST**, Wiesner GL, Mittendorf KF. Conducting inclusive research in genetics for transgender, gender-diverse, and sex-diverse individuals: Case analyses and recommendations from a clinical genomics study. *J Genet Couns*. Published online September 4, 2023. doi:10.1002/jgc4.1785

Freundlich RE, Li G, Leis A, Engoren M. Factors Associated With Initiation of Mechanical Ventilation in Patients With Sepsis: Retrospective Observational Study. *Am J Crit Care*. 2023;32(5):358-367. doi:10.4037/ajcc2023299

Collins B, Jones N. Digital Simulacra: Circumventing Diversity and Inclusion. *Am J Bioeth*. 2023;23(9):76-78. doi:10.1080/15265161.2023.2237430

Arnaud K, Wallace MM, **Wheless LE**, Stebbins WG, Clayton AS. Novel Biomaterial Containing Gelatin, Manuka Honey, and Hydroxyapatite Enhanced Secondary Intention Healing Versus Standard Secondary Intention Healing in Mohs Surgical Defects on the Head and Distal Lower Extremities-A Randomized Controlled Trial: Pilot Study. *Dermatol Surg*. Published online August 30, 2023. doi:10.1097/DSS.0000000000003924

Jacobs JW, Stephens LD, Milner DA Jr, Bloch EM, Goel R, Tobian AAR, Shibemba AL, **Eichbaum Q**. Survey of blood collection and transfusion practices among institutions in Africa. *Transfusion*. Published online August 30, 2023. doi:10.1111/trf.17501

Hickox T, Brahmbhatt K, **Smith JR**, Fuchs C, Tanguturi Y. CL Case Conference: Systemic challenges in management of aggression in a pediatric patient with seronegative autoimmune encephalitis. *J Acad Consult Liaison Psychiatry*. Published online August 23, 2023:S2667-2960(23)00122-2. doi:10.1016/j.jaclp.2023.08.005

Zapf M, Patel D, Henson P, McEvoy MD, **Huang E**, **Wanderer JP**, Fowler L, Mccarthy K, **Freundlich R**, Eden S, Shotwell MS, Kertai MD. PeRiOperative Glucose PRAgMatic (PROGRAM) trial protocol and statistical analysis plan for comparing automated intraoperative reminders to standardise insulin administration in surgical patients at high risk of hyperglycaemia. *BMJ Open*. 2023;13(8):e072745. doi:10.1136/bmjopen-2023-072745

Reynolds TL, Cobb JG, **Steitz BD**, **Ancker JS**, **Rosenbloom ST**. The State-of-the-Art of Patient Portals: Adapting to External Factors, Addressing Barriers, and Innovating. *Appl Clin Inform*. 2023;14(4):654-669. doi:10.1055/s-0043-1770901

Beavers J, Schell RF, VanCleave H, Dillon RC, Simmons A, Chen H, Chen Q, **Anders S**, **Weinger MB**, **Nelson SD**. Evaluation of inpatient medication guidance from an artificial intelligence chatbot. *Am J Health Syst Pharm*. Published online August 23, 2023:zxad193. doi:10.1093/ajhp/zxad193

LeWinn KZ, Trasande L, Law A, Blackwell CK, Bekelman TA, Arizaga JA, Sullivan AA, Bastain TM, Breton CV, Karagas MR, Elliott AJ, Karr CJ, Carroll KN, Dunlop AL, Croen LA, Margolis AE, Alshawabkeh AN, Cordero JF, Singh AM, Seroogy CM, Jackson DJ, Wood RA, Hartert TV, Kim YS, Duarte CS, Schweitzer JB, Lester BM, McEvoy CT, O'Connor TG, Oken E, Bornkamp N, **Brown ED Jr**, Porucznik CA, Ferrara A, Camargo CA Jr, Zhao Q, Ganiban JM, Jacobson LP. Sociodemographic Differences in COVID-19 Pandemic Experiences Among Families in the United States. *JAMA Netw Open*. 2023;6(8):e2330495. doi:10.1001/jamanetworkopen.2023.30495

Bastarache L, Delozier S, Pandit A, He J, Lewis A, Annis AC, LeFaive J, Denny JC, Carroll RJ, Altman RB, Hughey JJ, Zawistowski M, **Peterson JF.** The phenotype-genotype reference map: Improving biobank data science through replication. *Am J Hum Genet*. 2023;110(9):1522-1533. doi:10.1016/j.ajhg.2023.07.012

Antoon JW, Nian H, Ampofo K, Zhu Y, Sartori LF, Johnson J, Arnold DH, Stassun J, Pavia AT, Grijalva CG, **Williams DJ.** Validation of Childhood Pneumonia Prognostic Models for Use in Emergency Care Settings. *J Pediatric Infect Dis Soc*. 2023;12(8):451-458. doi:10.1093/jpids/piad054

Reminder to Send Updates for Recognition

If you (or another VCLIC Member) publishes a paper; has an abstract accepted at a conference; are interviewed for or written up in a news article; receive any awards, accolades, or honors; or completed/are currently undertaking any projects you would like to highlight, please email me with or forward this information:

- Names of VCLIC members/VUMC staff who participated in or worked on the project, paper, or abstract (or who received the award/honor)
- The title of the Project, Paper, Abstract, Article, or Award
- The journal, conference, or news publication (this can be podcasts, radio, or more "traditional," news mediums)

Nothing is too big or too small to celebrate, and this information will be featured on the News section of our website as well. As time goes on, I am hoping to also improve our Twitter presence, so feel free to add, tag, or tweet us at @VUMC_VCLIC too!

Thank you, and see you soon!