DEPARTMENT NEWS

The **degree applications deadline for graduate students** is fast-approaching! Remember to submit your application **by 11:59pm on October 1st** to avoid paying a late fee.

**Graduate students:** Final Exam requests are due for all December graduates **by October 12th**—please contact Angie Bellew regarding necessary paperwork at angela-bellew@uiowa.edu.

COLLOQUIUM: DR. XUN ZOUH

This Friday’s **Kohn Colloquium** will be held via Zoom at 3:30pm U.S. Central Time. Dr. Xun Zhou is presenting “Estimating Human Mobility Responses to the COVID-19 Pandemic through Spatio-temporal Generative Adversarial Networks”

Dr. Xun Zhou is an Associate Professor in the Department of Business Analytics, Tippie College of Business at the University of Iowa. He received a PhD in Computer Science from the University of Minnesota in 2014. His research interests include spatial data mining, machine learning, urban intelligence, GIS, and business analytics. He has published over 70 papers in these areas, many of which appeared in top journals and conferences such as KDD, ICDM, SDM, AAAI, TKDE, IJGIS, and SIGSPATIAL. His research has been recognized with four best paper awards. He received the NSF CISE CRII award in 2016. Dr. Zhou was a co-editor of Springer’s Encyclopedia of GIS, 2nd Edition (2017). He also served as a Poster Co-Chair of the ACM SIGSPATIAL conference in 2017, 2018, and 2020. He is a senior member of the IEEE.

Dr. Zhou’s abstract is located on the next page. This semester’s Kohn Colloquiums are being arranged via Zoom. Contact Susan Meerdink at susan-meerdink@uiowa.edu to request meeting links.

HAVE UPDATES TO SHARE?

Send news items, information on thesis defenses, awards, publications, events, and more to adrian-sandersfeld@uiowa.edu by 1:00 P.M. each Tuesday to have them featured in the next Geography Weekly newsletter.
Upcoming Events

**Dr. Xun Zhao | Kohn Colloquium continued from front**

Abstract: During the COVID-19 pandemic, policy-makers face significant challenges when making decisions due to the dilemma between reducing infections and reopening business activities. To guide the planning of non-pharmaceutical interventions (e.g., stay-at-home, school closure), human mobility responses (i.e., number of visits to public locations) to the policies need to be accurately estimated to help project the infection risk. However, this is a challenging task due to complex social factors that affect human mobility, limited historical observations, and spatio-temporal heterogeneity of the mobility. Existing spatio-temporal predictive models lack the ability to fully address these challenges, therefore having unsatisfactory performance.

This talk introduces our recent series of work on data-driven human mobility response estimation under COVID-19. For the first time in the literature, we formulate the human mobility estimation problem as a conditional data generation problem. We introduce COVID-GAN and its enhanced version, COVID-GAN+, both variants of spatio-temporal conditional generative adversarial network (cGAN) models that can be trained to generate realistic human mobility maps and time-lapses under a set of given social and policy conditions. We also introduce STORM-GAN, a meta-generative network model that utilizes the meta-learning framework to better transfer knowledge across different cities to improve estimation accuracy. Also presented are experimental results and case studies on large-scale real-world data, which show that the proposed models outperform baseline methods in both qualitative and quantitative measures.

**EVENTS AND INFO SESSIONS**

**Course Design Series: Sustainability | English-Philosophy Building**

Preparing to submit a course for the new Sustainability Gen Ed. requirement? This semester-long series will provide hands-on support in the process of (re-)designing a course. Participants will connect with other faculty members and learn from special guests who will provide insight into teaching about sustainability. Meetings of this series will be held from 1:00 pm to 4:30 pm on September 24th, October 15th, October 22nd, and November 5th in room 102 (TILE classroom) of the English-Philosophy Building.

**National Postdoc Appreciation Week Panel | Virtual Panel**

Postdocs are on a course towards research independence. But how does one develop a research program? How do you know if you have a research idea is 'good' or fundable? Join UI experts for their advice on successful research planning strategies. This panel, sponsored by OVPR, will host Doctors Marty Scholtz, Aaron Kline, Teresa Magnum, Cornelia Lang, and Joshua Weiner on the topic of innovative ideas and how to jumpstart early-stage research. For more information, visit the Events Calendar.
GET INVOLVED WITH ICIGO

The Iowa Community Integrated Geography Organization (ICIGO) is a student organization within the Geography and Sustainability Sciences Department that utilizes experiences and skills gained in the classroom to support projects focused on sustainability statewide and in the local community.

The benefits of joining include: hands-on experience with GIS applications, web content design, visualizations, and spatial analyses, the opportunity to manage projects and be a team player with people of varying types and levels of skills, collaborating and networking with non-profit organizations, completing projects for use in a future portfolio and résumé, glean unique spatial perspectives on your own academic disciplines and more.

The group requires 2-3 hours of participation per week and participation in regular meetings. Interested undergraduates willing to commit a few hours to real-world GIS projects for credit, get hands-on experience, and get involved should contact Adam Skibbe, our GIS Administrator, at adam-skibbe@uiowa.edu or visit the ICIGO website for more information.

JOB OPENINGS

HDR, Inc. is an employee-owned design firm—specializing in engineering, architecture, environmental, and construction services—and is currently seeking people who are passionate about geospatial and information technology, self-motivated, and have a strong desire to lead, mentor, and grow a team of GIS and information management professionals. They are currently looking to fill the full-time positions of Geospatial Manager and Senior GIS Analyst. Learn more and apply on their website.

Schneider Geospatial is accepting applications for open GIS Specialist and GIS Technician positions in Ankeny and Indianapolis. Schneider Geospatial is seeking an entrepreneurial and energetic GIS expert to join to our growing Insourcing team. Become a trusted member of our clients’ teams and help implement and leverage great GIS solutions across a wide range of uses. Apply online via the Schneider Geospatial Careers portal.

Ducks Unlimited has job opportunities available for individuals with GIS and natural resource experience. DU has been using advanced GIS and remote sensing technologies since 1984 to manage the complex issues in wetland and waterfowl management, land-use planning, and environmental conservation. This paid GIS Internship will be based in our Great Lakes/Atlantic Regional Office in Dexter, Michigan, and requires GIS experience with ESRI products and a background in natural resources, wetlands, and wildlife. They are hiring a full-time conservation GIS Intern to work with GIS professionals from their offices in Dexter, Michigan. Application details can be found in their online job listing.
Career Advising via Pomerantz Career Center

- The Pomerantz Career Center at C310 PC is open for drop-in peer advising Monday—Thursday between the hours of 10am and 2pm only, with Zoom appointments available via MyUI.
- Employers post open positions on Handshake for internships and full-time job opportunities for students of all degree levels.

Writing Assistance Available via the Writing Center

- The Writing Center is fully online and available to all students, faculty, and staff. They can provide feedback on any kind of writing—from reading responses, course papers, capstone projects, and theses to cover letters, emails, scholarship applications, and creative projects.
- Use the Online Feedback button to upload a piece of writing and get written comments and suggestions on it, allowing at least two business days for a response.

UI Service Center

- The UI Service Center is open and available to help students with a multitude of tasks including: changing registration, checking on the progress of scholarship submissions, graduation services, transcripts and verifications, ID card programs, billing, and loan collections.
- The Service Center strongly encourages you to schedule an appointment through MyUI using the “Advising Appointment” feature and selecting the Service Center before your in-person visit.

University Virtual Counseling Service Programs

- The University Counseling Service is still offering several programs to help students virtually.
- Let’s Talk Hawks! consultations are a weekly drop-in service that provides students the opportunity to have informal, confidential, and anonymous conversations with a UCS therapist. No appointment is needed; these services are offered on a first come, first serve basis.
- The Solidarity Support Group is a safe space for students of color to talk about concerns, share experiences, and stay connected with one another and the other UI communities. They meet between 12:30pm-1:20pm on Friday afternoons.
- Other UCS programming can be found here.

Other Campus Resources

- Office of Teaching, Learning & Technology Resources
- ITS Student Resources & Services
- GIS Library Research Guide
- Ulowa COVID Fall 2021 Guidelines