

Multiple Faculty Openings in Expanding Human-Centered Computing Group

The Faculty of Information Technology (<https://www.monash.edu/it>) at Monash University in Melbourne Australia is establishing a new group in HCI and creative technologies, with openings for exceptionally accomplished, creative, and energetic faculty at all levels. Selected candidates will have the opportunity to join a rapidly growing group with expertise in state-of-the-art areas of human-centered computer interfaces. We are especially interested in adding faculty in

Preferred Areas:

- (1) Wearable, contextually-aware and personalized interfaces
- (2) Mobile and multimodal-multisensor interfaces, including fusion-based ones
- (3) Data analytics for predicting user emotion, cognition, and health status
- (4) Agent-based conversational dialogue interfaces
- (5) Brain-computer and adaptive interfaces



MADA Design building

Outstanding applicants in other areas of human-centered interfaces also are encouraged to apply, such as image recognition and data visualization. Depending on area, the candidate will be expected to have strong skills in methodology (empirical/statistical, machine learning, HCI design and analysis), signal-processing, linguistic analysis and language processing, or system architecture and software development.

HCI Group: The HCI group designs, builds, and evaluates state-of-the-art interface technologies. Our multidisciplinary interests span computer science and engineering, cognitive and learning sciences, communications, medicine and health, media design, and other topics. Our work is based on empirical science, statistics, deep learning and data analytics, and diverse HCI methods. We are interested in applications in many areas, such as health, education, communications, personal assistance, robotics, automotive, and digital arts. The HCI group has partnerships with CSIRO-Data61, and an expanding collection of industry partners. The HCI area director is Dr. Sharon Oviatt, an ACM Fellow and international pioneer in human-centered, mobile, and multimodal interfaces.

Monash is Australia's largest university and ranks in the top 60 universities worldwide, with Computer and Information Systems rated in the top 70 (QS World University rankings 2018). In addition to growing rapidly in human-centered computing, software, and cyber-security, it includes data science and machine learning, artificial intelligence and robotics, computational biology, social computing, creative technologies and digital humanities, and basic areas of computer science.

Experimental Labs & Design Spaces: The university has made recent strategic investments in facilities for prototyping innovative concepts, collecting and analyzing data, and displaying digital installations and interactive media—including sensiLab (supporting tangible, wearable, augmented and virtual reality, multimodal-multimedia, maker-space), Immersive Visualization platform and Analytics lab, Centre for Data Science, and ARC Centre of Excellence on Integrative Brain function (pioneering new multimodal imaging techniques for data exploration). The university currently is investing in HCI group facilities for prototyping and developing new mobile, multimodal and multisensory interfaces, capturing and analyzing human multimodal interaction (e.g., whole-body activity, speech), and predicting users' cognitive and health status.

Melbourne Area: Melbourne recently has been rated the #1 city worldwide for quality of life (see Economist & Guardian, <http://www.economist.com/blogs/graphicdetail/2016/08/daily-chart-14> and <https://www.theguardian.com/australia-news/2016/aug/18/melbourne-wins-worlds-most-liveable-city-award-sixth-year-in-a-row>), with excellent education, healthcare, infrastructure, low crime, and exceptional cuisine, cultural activities, and creative design. The regional area is renowned for its dramatic coastline, extensive parks, exotic wildlife, and Yarra Valley wine region.

Requirements: Interested applicants should have a PhD in computer science, information sciences, cognitive or linguistic sciences, or related field, and in most cases several years of post-PhD research or work experience. All candidates must have a strong publication record in top conferences and journals, excellent teamwork and communication/writing skills, and teaching/mentoring experience. Evidence of grants and industry partnerships is preferred. Monash has a Women in IT Program, and participates in the Athena Swan Charter to enhance gender equality in STEM disciplines. We especially welcome talented female, minority, and international applicants.

Position and Compensation: All positions are full-time for 12 months a year, with competitive salary and benefits (see: <http://adm.monash.edu.au/enterprise-agreements/academic-professional-2014/s1-academic-salary-rates.html>), including 17% superannuation retirement fund, health insurance options, relocation allowance, and generous start-up package with reduced teaching. The academic year begins in late Feb. 2018, with semester 2 starting late July, but start date is negotiable. For further information, or submission instructions, email Sharon Oviatt (with "Faculty Application" in header) at: Oviatt@incaadesigns.org

To apply: Required application materials include: (1) cover letter (indicating application area 1-5, planned research for the near future, and date of availability); (2) current CV with publication list, research and teaching interests, and 3-5 references with email/phone contact; (3) three representative publications.

For more information on the Faculty of IT's main research areas and vigorous recruitment plans to add 50 new faculty, see <https://www.monash.edu/it/about-us/recruiting-exceptional-academics> This announcement represents one area of expansion.