

IEA NewsBriefs: September 2022

Dear IEA Community

We are excited to bring you another installment of the IEA NewsBriefs which shares updates on upcoming HFE events, a fitting tribute to a long-standing contributor to the HFE discipline, and the IEA societies spotlight where we focus on the Indian Society of Ergonomics (ISE).

As always, please continue to share any updates on HFE related developments, events or activities by getting in contact with the IEA NewsBriefs editor (sma.ngcamu@gmail.com). We particularly look forward to featuring updates related to global ergonomics month from those who will be commemorating it.

ANNOUNCEMENTS

Bereavement announcement: Richard Cook

We are sad to convey the news that on the 31st of August 2022 Dr. Richard Cook died from cancer. Following Richard's passing, there have been numerous tributes his professional contribution to the multiple fields and industries in which he worked over the years. Some of his most prominent contributions were within the HFE discipline where his work as an astute and innovative researcher and practitioner contributed to the advancement of our understanding of complex socio-technical systems. Those who interacted with him tell inspiring stories of his humanity and the work he did to uplift others. As the IEA, we would like to express our heartfelt condolences to Richard's family, friends and colleagues. We encourage you to read about some highlights of Richard's career in a short piece written by David Woods and colleagues, which can be found here:

<https://www.adaptivecapacitylabs.com/blog/2022/09/12/richard-cook-a-life-in-many-acts/>

Marconi University Masters Degree in Human Factors Ergonomics (Rome)

The Marconi University Faculty of Engineering has announced that it will be offering a master's degree in ergonomics and human factors (2022-2023). The degree is organized in collaboration with the Italian Collegium of Railways Engineers (CIFI) and is endorsed by the Italian Network for Safety In Healthcare as well as the Societa Italiana di Ergonomia e Fattori Umani.

The credits obtained from this degree are aligned to some of the Center for Registration European Ergonomist (CREE) requirements for certification requirements and can thus be useful for individuals who intend to be certified by CREE. Additionally, various Italian companies and institutions are available to promote the course and to host the participants for internships in their ergonomics and human factors laboratories. This includes Stellantis, INAIL, Strategic Partner Intelligent Interface, BSD Strategy by Design, EPM research, STASA, Adequat, Clinical Risk Management UNIT La Spezia e Florence, and Just Culture Italian Committee.

Human factors special issue on healthcare: HFES USA

The Human Factors and Ergonomics Society HFES of the USA has published its First Human Factors Special Issue on Healthcare. This special issue presents a collection of papers focusing on improving healthcare practice through the implementation of human factors and ergonomics principles. The papers were presented at the International Ergonomics Association (IEA) 2021 international conference and cover a diverse range of topics including the following:

- Improving Healthcare Practice Through the Implementation of Human Factors and Ergonomics Principles
- Objective Nontechnical Skills Measurement Using Sensor-based Behavior Metrics in Surgical Teams
- Older Adult Patients and Care Partners as Knowledge Brokers in Fragmented Health Care
- Interactions in Sociotechnical Systems: Achieving Balance in the Use of an Augmented Reality Mobile Application
- Quantifying Workload and Stress in Intensive Care Unit Nurses: Preliminary Evaluation Using Continuous Eye-Tracking
- Human Factors Integration in Robotic Surgery
- Usability of a Human Factors-based Clinical Decision Support in the Emergency Department: Lessons Learned for Design and Implementation
- Mobile Health Application for Seizure Management: A Human-Systems Integration Approach
- Workarounds in the Shadow System: An Ethnographic Study of Requirements for Documentation and Cooperation in a Clinical Advisory Center

Quick links to the papers included in this special issue can be found here: <https://www.hfes.org/HFES-News/online-first-special-human-factors-issue-iea-health-care-2021>

UPCOMING EVENTS

IEA Resilience Engineering Technical Committee webinar: Can regulations support resilient performance? 28 October, 12:00-13h30 UTC

The IEA Resilience Engineering Technical Committee and the Resilience Engineering Association will be hosting another webinar as part of the series that covers various topics aimed at sharing information and knowledge on how to create resilience in complex systems. The next webinar is titled “Can regulations support resilient performance?”. The speakers will share insights on how regulations can contribute to, facilitate, or hamper, resilient performance, depending on the regulatory strategy that is adopted. They will furthermore explore on the influence of regulations on resilience in complex systems and the regulation of resilience within safety management systems.

The webinar will take place on 28 October 2022 between 12:00-13:30 UTC. The webinar is free for any interested party to attend but registration is mandatory. Register to attend here: https://us02web.zoom.us/webinar/register/WN_hWXrjx4bRb-MgNdEBiAUfg

More information on this webinar can be found here: <https://secureservercdn.net/45.40.153.46/m4v.211.myftpupload.com/wp-content/uploads/2014/10/Invitation-October-Webinar.pdf>

SPOTLIGHT ON IEA SOCIETIES

India, located in South Asia, is not only the second-most populated country in the world, but it is also the 5th largest economy worldwide and is regarded as one of the fastest developing countries globally. Despite being plagued by social ills such a poverty and illiteracy, India is rich culturally and is seen as a strategic base for some of the greatest technological innovations of our time. It

is also home to one of the most established HFE societies in the region, the Indian Society of Ergonomics (ISE), which you can read more about in this feature.

We thank ISE for graciously sharing information about their society with the HFE community. If your HFE society would like to be featured in future editions of the IEA NewsBriefs please get in touch with the IEA NewsBriefs editor (sma.ngcamu@gmail.com).

INDIAN SOCIETY OF ERGONOMICS (ISE)

The Indian Society of Ergonomics (ISE) was established in 1983 and is the only professional body representing HFE professionals in India. Apart from being a Federated Society of the IEA, the ISE is also a member of the ACED (Asian Council on Ergonomics and Design), and the BRICSplus HFE Networks.

ISE has approximately 500 members who belong to a wide variety of fields, including physiology, psychology, home science, industrial design, product design, occupational health, industrial safety, and engineering, reflecting the multi-disciplinary nature of HFE.

ISE fact sheet

- **Established:** 1983
- **Approximate number of members:** 500 members
- **Website:** <https://ise.org.in/>

There are several challenges and barriers hindering the widespread implementation of HFE in India including the following:

- As in many industrially developing countries, skilled labour is easily available and replaceable. It is thus seemingly easier to replace workers that are negatively affected by sub-optimal working conditions than to address HFE risks in the workplace.
- The market is inundated with products or work environments that are purported to be ergonomically designed but are not
- Some ergonomics consultants fail to deliver workable interventions or are unable to conduct effective awareness sessions, thus resulting in both industrialists and management viewing ergonomics with uncertainty based on experiences where the so-called ergonomics was done by incompetent persons.
- Knowledge of success stories that demonstrate return on investment (ROI) of HFE interventions makes facilitates the process of “selling” HFE to organisations. However, this useful information and knowledge is not part of the arsenal of most HFE professionals in India.
- HFE professionals are currently not certified in India. In response to this, ISE is developing a system of certification that meets the needs of the Indian industry (stakeholders need large numbers of ergonomists with basic level certification and knowledge of local conditions, and only a few experts with advanced certification) and also the IEA's endorsement requirements and competency matrix, particularly in terms of core competencies and the entry level qualifications required for certification.

Overview of ISE activities

The Society publishes a quarterly newsletter. Current and back issues of the newsletter are available on the ISE website (<https://ise.org.in/newsletter.shtml>).

The ISE has started a series of conferences on the theme of "Humanizing Work and Work Environment" (HWWE), aimed at developing a common platform for exchange of ideas concerning improvement in work and work environment towards alleviating health and safety of persons at work. These conferences (HWWE) are organized at different locations across the country. Initially, it was proposed to have a scientific meeting annually. Every second meeting would be a national conference, and every fourth one an international conference. Of late, the demand from different host institutions has been so strident that a national ergonomics conference with international participation has become an annual event. The HWWE has become an annual cross-sectional snapshot of Indian ergonomics. A strong presence of the International Ergonomics Association (IEA) at most of these meetings, and the organization of pre- and post-conference workshops on ergonomics methods, check-points, etc. have helped to boost the popularity of these events. So far, seventeen such HWWE conferences have been organized.

ISE seeks to develop and maintain strong ties with industry as well as allied professional bodies to increase awareness and networking. These include joint webinars with Confederation of Indian Industry, membership of the National Standards Body (BIS) as an Industry Representative and taking active part in development of Indian ergonomics standards, occupational health professionals (partnering with the Indian Association of Occupational Health and partner for the International Commission of Occupational Health's Triennial World Congress in Mumbai, India in 2027), and physiotherapists (ISE is a partner for PREMUS 2023, the 11th International Scientific Conference on the Prevention of Work-Related Musculoskeletal Disorders to be held in Bengaluru, India - September 20-26, 2023).

There are 48 Indian standards on ergonomics issued by the National Standards body (Bureau of Indian standards - BIS). ISE participates actively in the development of Indian ergonomics standards and also ISO standards through participation in various ISO TC-159 (Ergonomics) SCs (Sub-Committees) and WGs (Working Groups). While these standards are not mandatory, and ergonomics is not part of national legislation, rapid industrial and economic growth pose problems that have viable and demonstrable ergonomics solutions, and occupational health and safety (HSE) concerns are becoming major drivers of ergonomics programmes.

Upcoming ISE events

HWWE2022 will be held in Punjabi University, Patiala, 24-26 November 2022. HWWE2023 will be held in Mumbai, India in December 2023 (14-16) as a joint international conference along with the Asian Conference on Ergonomics and Design (ACED) 2023 and the BRICSplus Human Factors & Ergonomics Conference (BRICSplus HFE) 2023 with the conference theme of 'Human-Centered Digitalization'.

ISE Membership

ISE membership is open to individuals in India and across the world. Details on ISE membership and the society's contact details can be found here: <https://ise.org.in/membership.shtml>

IEA LINKS OF INTEREST

Archive of previous NewsBriefs: <https://iea.cc/iea-newsbriefs-archive-of-past-issues/>

More news from IEA: <https://iea.cc/category/headlines/>

IEA Press publications: <https://iea.cc/publication/>

IEA YouTube channel (includes recorded IEA webinars):

<https://www.youtube.com/channel/UCDnjCjRcYB7rBR2PJFw6k6w>

IEA LinkedIn page: <https://www.linkedin.com/groups/1114517/>

IEA Facebook page: <https://www.facebook.com/InternationalErgonomicsAssociation>