Appendix

About HKSTP’s Experience Centre

The Experience Centre located at Science Park, the 370 square meter area provides immersive experience featuring an inspirational and interactive journey of seven zones, 300+ tech components powering 30+ multimedia exhibits to present Hong Kong’s innovation stories in truly original and stimulating ways. Visitors will interact with real tech that transforms our lives and businesses and explore human imagination in strategic areas, including AI & Robotics and Biomedical Technology.

Website: https://www.hkstp.org/our-community/park-life/experience-centre/

About InnoHK Research Laboratories of CUHK

In collaboration with world-renowned universities, such as Oxford, Cambridge, ETH Zürich, Imperial College London, Karolinska Institutet, the InnoHK research laboratories established under CUHK are major contribution to Hong Kong’s development of innovation.

Covering health, biomedicine, robotics and artificial intelligence, the InnoHK research laboratories, with the state-of-the-art laboratories and facilities, apply research discoveries to realise ideas into commercialised healthcare products with a view to benefiting the community and building a better future of the healthcare system in Hong Kong.

1. Microbiota I-Center

With top-notch researchers from The Chinese University of Hong Kong (CUHK), University of Chicago, The University of Melbourne and University of Cambridge, the newly founded Microbiota I-Center (MagIC) focuses on advancing science in the gut microbiome and promoting entrepreneurship. It is committed to developing a novel class of microbiome diagnostics and live biotherapeutics for common diseases including obesity, cancer, autism, inflammatory disorders and COVID-19, that will not only transform lives of patients and their families, but also accelerate Hong Kong into a world-class microbiome biotechnology hub.

Overseas Collaborating Institutions: University of Cambridge, The University of Chicago and The University of Melbourne

Website: www.magic-inno.com

2. Multi-Scale Medical Robotics Center

Positioned to enable translational research on and productisation of novel surgical robotic technologies, the Multi-Scale Medical Robotics Center (MRC) serves as a synergistic platform for transdisciplinary collaborations of clinicians, engineers, and researchers from local and overseas top-rank universities, through the R&D programmes of Endoluminal Multi-scale Robotic Platforms for Diagnostics and Therapeutics, Magnetic-guided Endoluminal Robotic Platform, and Imaged-Guided Robotic Interventions. The Hybrid Operating Room of the MRC Lab is a first-of-its-kind facility in Asia that is fully dedicated to R&D and preclinical evaluations of new surgical robots and medical devices via live animal and cadaveric studies.

Overseas Collaboring Institutions: ETH Zürich, Imperial College London, and Johns Hopkins University

Website: www.mrc-cuhk.com
3. Center for Neuromusculoskeletal Restorative Medicine

The Center for Neuromusculoskeletal Restorative Medicine has been established to advance biomedical research and development related to neuromusculoskeletal medicine. Combining the expertise in stem cells, biomaterials, 3D bioprinting, tissue engineering, and personalised and translational medicine of The Chinese University of Hong Kong and Sweden’s Karolinska Institutet, the Center is devoted to restoring structure and function to injured, diseased and degenerated (due to ageing or trauma) neuromusculoskeletal tissues and organs. This multi-disciplinary, international consortium aims to apply convergent principles and technologies of biomedical science and engineering to ultimately address mobility impairments and improve patients’ overall well-being.

Overseas Collaborating Institution: Karolinska Institutet

Website: https://www.cuhk.edu.hk/english/research/innohk-centres/neuromusculoskeletal.html

4. Centre for Novostics

The Centre for Novostics (Novostics), with the meaning of novel diagnostics, aims to push forward the frontier of molecular diagnostics. Novostics will focus on the development of cutting edge diagnostics based on cell-free nucleic acids in blood and other bodily fluids, particularly around prenatal diagnosis and cancer diagnostics. With its experience in developing prenatal testing of fetal chromosome disorders, the Centre plans to extend the work to single gene disease and other pregnancy-associated conditions. A combination of genomic, epigenomic, transcriptomic and fragmentomic technologies will be employed to tackle bottlenecks in cancer diagnostics and investigate the tissue origin of malignancy by circulating nucleic acid analysis, particularly for cancer types prevalent in Hong Kong, mainland China and Asia. These research areas will accelerate the application of liquid biopsy and promote Hong Kong as a leading molecular diagnostic centre in the world.

Overseas Collaborating Institutions: University of Oxford, UCL Great Ormond Street Institute of Child Health, Great Ormond Street Hospital for Children NHS Foundation Trust, and Imperial College London

Website: www.novostics.hk