

Technical Visit to CUHK Jockey Club Minimally Invasive Surgical Skills Centre
By Mr Jerry CHAU

A technical visit to CUHK Jockey Club Minimally Invasive Surgical Skills Centre (MISSC) was led by Professor Li and his assistant on 29 July 2017. The visit was firstly introducing MISSC and several products applied on surgery, followed by experiencing use of surgical handheld tools and a robotic system.

Located in the Prince of Wales Hospital, MISSC was established in 2005. It provides certified training in the micro surgery area using handheld tools, robotic surgical system, surgical skill lab, microsurgical and endoscopic skill lab and virtual reality lab. The centre turns clinical ideas / problems into development needs, and then develops products for subsequent pre-clinical and clinical evaluations and final application.

Three products were demonstrated in the introductory session of the visit, namely handheld flexible instruments for microsurgery, flexible surgical robot for endoscopic submucosal dissection, and soft robot for gastrointestinal tract inspection. Handheld flexible instruments included imaging tools, holding tools, and cutting tools which assist surgeries requiring micro-actions. The second product, flexible surgical robot, allows insertion of rod with edge 360 degrees of movement and images for endoscopic submucosal dissection. The last product, soft robot for inspection, moves like earthworm through the soft gastrointestinal tract for inspection. These technological products have made breakthroughs for complex surgeries, improving safety and success rates for the benefit of both patients and doctors.

For the second part of the visit, participants experienced field test by putting the handheld flexible instruments for microsurgery into a black box for holding and releasing of paper clips. The Da Vinci Research Kit was also shown to the participants.

The visit was new and interesting for our participants. On behalf of the YMC, we would like to express sincere gratitude to the MISSC for arranging this visit.



All the participants enjoyed the visit.