LCQ22: Hong Kong's global competitiveness in innovation and technology

Following is a question by the Hon Mrs Regina Ip and a written reply by the Secretary for Innovation and Technology, Mr Alfred Sit, in the Legislative Council today (July 14):

Question:

Regarding Hong Kong's global competitiveness in innovation and technology, will the Government inform this Council:

- (1) given that Hong Kong ranked fifth in the World Digital Competitiveness Ranking 2020, and such a ranking was lower than that of Singapore which took the second place, and that Hong Kong ranked the seventh, 17th and 19th respectively in the three sub-factors of talent, scientific concentration and IT integration, and such rankings were far lower than those of Singapore (i.e. the first, 10th and third), whether the Government has reviewed the factors leading to Hong Kong's rankings being lower than those of Singapore;
- (2) given that Hong Kong ranked 11th in the Global Innovation Index 2020, and such a ranking was lower than that of Singapore which took the eighth place, and that Hong Kong ranked 23rd, 24th and 54th respectively in the three pillars of human capital and research, business sophistication and knowledge and technology outputs, and such rankings were far lower than those of Singapore (i.e. the eighth, sixth and 14th), whether the Government has reviewed the factors leading to Hong Kong's rankings being lower than those of Singapore; and
- (3) whether, targeting Hong Kong's weaknesses as reflected by the aforesaid rankings, it has formulated new measures to boost Hong Kong's global competitiveness in innovation and technology; if so, of the specific measures and the additional resources needed to be allocated; if not, the reasons for that?

Reply:

President.

My consolidated reply to various parts of the question is as follows:

Innovation and Technology (I&T) is a key policy area of the current-term Government. Over the past four years, the Government has developed I&T along eight major areas and unprecedentedly committed over \$110 billion to supporting I&T development, with a view to fostering the diversification of economic development, improving citizens' quality of life and creating

quality employment opportunities.

In recent years, Hong Kong has performed quite well in international rankings related to I&T. According to the rankings in 2020, Hong Kong rose from eighth to fifth in the World Digital Competitiveness Ranking, and from 13th to 11th in the Global Innovation Index. Moreover, Hong Kong ranked third worldwide in the Digital Intelligence Index report jointly published by Mastercard and the Fletcher School of the Tufts University in the United States in 2020, and second in terms of Readiness in the World Talent Ranking 2020. These rankings demonstrate that Hong Kong has been striving ahead in the overall I&T development. That said, the foci, assessment criteria, calculation methods, etc., of different international rankings vary, and direct comparison between Hong Kong and other economies is hardly possible due to differences in modes of economic development, social reality, etc. It is therefore advisable to also refer to other relevant indicators when evaluating Hong Kong's recent work in I&T development. For instance, Hong Kong's gross domestic expenditures on research and development (R&D) increased from around \$16.7 billion in 2014 to around \$26.3 billion in 2019. While there was no unicorn in 2014, Hong Kong is currently home to eleven unicorns. The number of start-ups rose from around 1 070 in 2014 to 3 360 in 2020, and that of employees in the I&T sector grew from around 35 500 to around 44 600 in the same period. Venture capital investment in Hong Kong also substantially increased from around HK\$1.2 billion in 2014 to around HK\$10 billion in 2020. These statistics show that Hong Kong's I&T ecosystem has become increasingly vibrant, and the I&T atmosphere has been consistently enhanced.

We are well aware that the competition between economies has become more fierce in view of rapid technological advancement. The Government will continue to take forward the I&T development in Hong Kong through developing infrastructure, supporting R&D, nurturing talents, fostering the popularisation of information technology (IT), etc., to enhance Hong Kong's global competitiveness in the long run.

On infrastructure, the Government has been striving to develop I&T infrastructure. For example, the first batch of buildings of the Hong Kong-Shenzhen Innovation and Technology Park in the Lok Ma Chau Loop is expected to be completed in phases from 2024 onwards. In addition, we are pressing ahead with Phase 2 of the Science Park Expansion Programme and the Cyberport expansion project in order to provide technology enterprises and research institutes with more quality space and facilities for R&D.

On R&D, the first batch of 20 research centres in the InnoHK research clusters located in the Hong Kong Science Park has commenced operation progressively, and the remaining seven will commence operation later this year, which will further develop Hong Kong into a hub for global R&D collaboration. In addition, we have just injected \$9.5 billion into the Innovation and Technology Fund (ITF), and will continue to enhance the funding schemes under the ITF as appropriate, quite a number of which support R&D and commercialisation of R&D outcomes.

On talents, the Government implements the IT Innovation Lab in Secondary Schools and Knowing More About IT Programme to subsidise local primary and secondary schools to organise extra-curricular activities related to IT, thereby cultivating students' interest in IT from a young age. The STEM Internship Scheme will also be regularised to subsidise local universities to arrange short-term internships for their STEM (science, technology, engineering and mathematics) undergraduates and postgraduates. After graduation, students may participate in the Research Talent Hub, which provides funding support for technology enterprises and research institutes to engage research talents. The newly launched Global STEM Professorship Scheme helps universities recruit internationally renowned I&T scholars and their teams to Hong Kong, thereby scaling new heights in I&T teaching and research activities of local universities.

On the popularisation of IT, unless there are legal or operational constraints, all government forms and licence applications can be submitted electronically by mid-2022. The Hong Kong Monetary Authority is currently working with the Office of the Government Chief Information Officer to develop the business version of the "iAM Smart" digital authentication platform, which can be used to authenticate the identity of enterprises through an electronic channel. The Government has earlier allocated \$1.9 billion under the Anti-epidemic Fund to implement the Distance Business Programme, which supports enterprises to adopt IT solutions to continue their business and provide services during the epidemic and enhances their digital capabilities.

I&T development is a pivotal and long-term mission. With the support from the Central Government and the advantages under "one country, two systems", the Government will leverage the opportunities brought about by the National 14th Five-Year Plan and the Greater Bay Area development, as well as better integrate Hong Kong into national development. Hong Kong will proactively participate in the domestic and international dual circulation in order to capitalise on our strengths via external circulation and domestic circulation in serving the country's needs, and develop Hong Kong into an international I&T hub. This will help further enhance Hong Kong's I&T position and influence on the global front.