

立法會

Legislative Council

LC Paper No. CB(1)825/19-20

Ref: CB1/PL/ITB

Report of the Panel on Information Technology and Broadcasting for submission to the Legislative Council

Purpose

This report gives an account of the work of the Panel on Information Technology and Broadcasting ("the Panel") for the 2019-2020 legislative session. It will be tabled at the meeting of the Legislative Council ("LegCo") of 15 July 2020 in accordance with Rule 77(14) of the Rules of Procedure of LegCo.

The Panel

2. The Panel was formed by a resolution passed by the Council on 8 July 1998 and as amended on 20 December 2000, 9 October 2002, 11 July 2007 and 2 July 2008, for the purpose of monitoring and examining Government policies and issues of public concern relating to information technology ("IT"), telecommunications, broadcasting, film services and creative industry. The terms of reference of the Panel are set out in **Appendix I**.

3. For the 2019-2020 session, the Panel comprised 18 members, with Hon Charles Peter MOK and Hon Elizabeth QUAT elected as Chairman and Deputy Chairman respectively. The membership list of the Panel is in **Appendix II**.

Major work

INNOVATION AND TECHNOLOGY

4. The Panel received a briefing by the Secretary for Innovation and Technology on the major initiatives of the Innovation and Technology Bureau featured in the Chief Executive ("CE")'s 2019 Policy Address.

Smart city development

Smart City Blueprint for Hong Kong 2.0

5. The Administration released the Smart City Blueprint for Hong Kong ("the Blueprint")¹ on 15 December 2017, which outlines the vision and mission of building Hong Kong into a world-class smart city with more than 70 initiatives under six smart areas (i.e. smart mobility, smart living, smart environment, smart people, smart government and smart economy). At the meetings held on 29 October 2019 and 8 June 2020, members noted that the Administration was conducting a review with a view to releasing Smart City Blueprint for Hong Kong 2.0 ("Blueprint 2.0") in 2020. Blueprint 2.0 would report on the latest progress of individual initiatives that have been or are being implemented, and set out new proposals in further promoting smart city development. Members suggested that the Administration should conduct an extensive public consultation exercise when mapping out Blueprint 2.0, so as to better gauge public opinion and prioritize the initiatives in the light of public needs.

Multi-functional smart lampposts

6. One of the major initiatives under the Blueprint, as announced in the CE's 2017 Policy Address, is a pilot project of installing multi-functional smart lampposts² at selected urban locations to support the building of a smart city with city-wide coverage of data and network. Members noted that a number of these smart lampposts had been damaged during some of the social events in 2019.³ Members commented that the vandalism reflected the public's

¹ Smart City Blueprint for Hong Kong can be downloaded at the dedicated smart city portal (www.smartcity.gov.hk).

² The original plan of the multi-functional smart lampposts pilot scheme is to install some 400 multi-functional smart lampposts equipped with smart devices in four selected urban locations (namely Central/Admiralty, Causeway Bay/Wan Chai, Tsim Sha Tsui and Kwun Tong/Kai Tak Development Area) in phases to collect real-time city data such as air quality, traffic flow, etc. and support fifth generation (5G) mobile network development. The Pilot Scheme started in 2019 and 50 smart lampposts were installed along Sheung Yuet Road in Kowloon Bay, Shing Kai Road in Kai Tak and in the Kwun Tong Town Centre by end-June 2019.

³ According to the Administration, during a public event in Kwun Tong on 24 August 2019, 20 smart lampposts on Sheung Yuet Road were damaged to varying degrees, including one lamppost being torn down and 19 forcibly opened with the devices therein damaged or dismantled. During another public event on 4 October 2019, 10 smart lampposts near Kwun Tong Town Centre were damaged to varying degrees including the external covers damaged or dismantled and the door locks for three of them forcibly opened with signal cables cut as well as devices and equipment damaged. Basic public lighting services resumed shortly after the damage, but the damaged devices had not been repaired or replaced. (Source: Report of the Technical Advisory Ad Hoc Committee on Multi-functional Smart Lampposts)

misunderstanding of the purposes and functions of smart lampposts, and they queried how the Administration would further elucidate the relevant policies and measures so as to garner public support on smart city development.

7. The Administration responded that sensors equipped in smart lampposts were used to collect data such as air quality data, and base stations were installed therein to support the fifth generation mobile communications ("5G") network services. The Administration noted the community's concerns about privacy issues arising from the operation of smart lampposts, and had henceforth suspended all applications that might have privacy implications. It also assured members that communication with the public on the initiative would continue. Meanwhile, the Administration had set up a Multi-functional Smart Lampposts Technical Advisory Ad Hoc Committee ("the Ad Hoc Committee") comprising non-government members to provide third-party advice on the operation of smart lampposts to further safeguard personal privacy.

8. Some members remarked that members of the public had a high degree of distrust over the Government, and called on the Administration to review critically whether it should continue to take forward the initiative. Some other members, however, expressed support for the smart lampposts initiative.

9. The Administration advised that the Ad Hoc Committee had concluded that the smart lampposts had no personal data privacy issue. The Administration would step up publicity to facilitate public understanding of the design and operation of smart lampposts.

"iAM Smart" platform

10. Another initiative announced in October 2017 in support of the smart city development was the provision of electronic identity to Hong Kong residents free of charge. The platform, now officially named as "iAM Smart", would be launched in the fourth quarter of 2020, to provide one-stop personalized digital government services.

11. Members noted that residents could use "iAM Smart" to perform digital signing in accordance with the Electronic Transactions Ordinance (Cap. 553) for handling statutory documents and procedures. Some members queried whether the Administration would introduce any legislative amendments to the existing statutory provisions on digital signing. Enquiries were also raised about the applications of "iAM Smart" in public services.

12. The Administration advised that "iAM Smart" would provide an additional function of digital signing, which was supported by digital certificate. Given that a signature requirement under the law could be satisfied by a digital signature supported by a recognized digital certificate, no legislative amendment would be required. On the promotion of wider use of "iAM Smart", the

Administration had been actively driving bureaux and departments ("B/Ds") to adopt the "iAM Smart" one-stop personalized digital service platform progressively for their e-Government services, including the use of electronic forms.

13. Members were concerned whether the biometric data, such as a photograph of Hong Kong Identity Card ("HKID"), a self-portrait digital photograph, would be uploaded onto the server during user registration. The Administration advised that the system would verify the applicant's identity against the records of the Immigration Department. The HKID photograph provided and the self-portrait digital photograph taken by applicant during registration for "iAM Smart" would be deleted immediately after verification of user identity. Other personal information provided during registration would only be used for "iAM Smart" account management. User data would be encrypted and stored in government data centres.

14. Members in general commented about the slow progress of introducing e-Government services. Some members pointed out that the public expected the Administration to promote the use of innovation and technology ("I&T") solutions in government departments to tackle problems encountered in the community. The Administration advised that the Government had allocated a considerable amount of resources to support the development of I&T over the past few years. Since the establishment of the Smart Government Innovation Lab ("Smart Lab"), the Office of the Government Chief Information Officer ("OGCIO") had approached B/Ds to explore the feasibility of adopting various IT solutions.

Attracting innovation and technology talent

15. Having a cadre of high quality of I&T talent is important for the successful development of smart city. Members had sought information from the Administration on the recent response to the various talent-attracting schemes, such as the Technology Talent Admission Scheme, the Researcher Programme and the Postdoctoral Hub, and whether and how the Administration would enhance the relevant schemes.

16. Members noted that the number of applications under the Technology Talent Admission Scheme had recorded a downward trend in 2019, while the Researcher Programme and the Postdoctoral Hub remained popular. To address the industry's concerns about the Hong Kong's prospect in I&T development, CE had announced in the 2019 Policy Address that the scope of the Technology Talent Admission Scheme would be extended to cover companies outside the Hong Kong Science and Technology Parks Corporation and Cyberport, as well as to cover new technology areas. The Researcher Programme and the Postdoctoral Hub would also be extended to include all technology companies conducting research and development ("R&D") activities in Hong Kong.

17. Members pointed out that the IT sector was particularly concerned about the brain drain amidst intense worldwide competition for technology talent. The implementation of the latest measures launched under the Emergency Regulations Ordinance (Cap. 241) had had negative impacts on the investment environment. Members were also concerned that some overseas companies had suspended investment plans, while some well-established enterprises had even laid-off I&T staff. The Administration affirmed that its policy was to attract overseas technology talent while encouraging local talent to remain and develop their careers in Hong Kong.

Smart Government Innovation Lab

18. The Administration established the Smart Lab in April 2019 to encourage and facilitate wider adoption of I&T in government departments, and promote active participation of industry players to assist departments in adopting various IT solutions to improve public services. At the meeting on 11 May 2020, the Administration briefed the Panel on the work of the Smart Lab. Members noted that the Smart Lab organized regular technology forums where industry players were invited to introduce their technical solutions to government departments. Local startups and small and medium enterprises ("SMEs") joining the forums could better understand the needs of government departments, and submit proposals on suitable areas to the Smart Lab or relevant B/Ds. Members were also informed that the Smart Lab would explore the application of robotics technologies, including machine learning, cognitive systems, intelligent agent, robotic process automation, etc. on public services.

19. Members commented that the Administration should step up efforts to provide more convenient public services, such as promoting the adoption of IT solutions in the Transport Department to facilitate the applications for renewal of vehicle licences in a more effective manner. Some members pointed out that the community expected that the Smart Lab would develop groundbreaking technologies to improve people's daily life and foster economic development.

20. The Administration assured members that efforts would be made to facilitate more government departments to proactively explore the adoption of technologies in enhancing existing public services, or even to introduce new services by adopting an innovative approach. Furthermore, the Administration had launched a time-limited Distance Business Programme under the Anti-Epidemic Fund to support enterprises to continue business and services during the epidemic through adoption of IT solutions.

Information security

21. Information security and cyber-crimes are recurrent issues of concerns to the Panel. During the session, members were given an overview of information and cyber security situation in Hong Kong. They also discussed with the Administration measures to strengthen the community and the

Government's capability in tackling cyber security threats.

Overall situation of information and cyber security

22. Members expressed concerns about the total financial losses that might be attributed to technology crimes. They queried how the Administration would prevent recurrence of similar incidents and reduce pecuniary losses. In particular, members queried how the Administration would combat cross-boundary technology crimes, whether and how the Administration would strengthen cooperation with overseas stakeholders and law enforcement agencies to counter prevalent technology crimes and cyber threats.

23. Members were informed that OGCIO was working closely with the Hong Kong Computer Emergency Response Team Coordination Centre ("HKCERT")⁴ and the Hong Kong Police Force ("Police Force") to promote public awareness of information security, through disseminating security-related information and providing advice on preventive measures against security threats. Meanwhile, the Police Force exchanged intelligence with various law enforcement agencies to keep track of the crime trends and study ways to combat cross-boundary criminal activities. The Hong Kong Internet Registration Corporation Limited ("HKIRC") had also launched a new and free website scanning service to assist SMEs in identifying potential security vulnerabilities.

Measures to tackle cyber security threats in Government

24. Noting that OGCIO had an established mechanism to assist B/Ds in conducting webpage scanning and penetration testing, members sought information about the government departments that were more vulnerable to cyber-attacks and the major types of government services that received the heaviest attacks. Some members asked if the Administration had anticipated any different emerging cyber threats arising from the increasing adoption of cloud computing services by government departments, and how the Administration would help B/Ds manage those risks. To cope with the rapid technological development such as 5G and Internet of Things, members were concerned about how the Administration would prepare departments and help the industry to be prepared to tackle any new risks involved. Members also took the view that the Administration should actively share relevant cyber threat intelligence with large enterprises as well as SMEs as such information would provide useful pointers for local companies to strengthen their precautionary measures.

⁴ Managed by the Hong Kong Productivity Council, the Hong Kong Computer Emergency Response Team Coordination Centre is the centre for coordination of computer security incident response for local enterprises and Internet Users. Its missions are to facilitate information disseminating, provide advices on preventive measures against security threats and to promote information security awareness.

25. Members were informed that ransomware and distributed denial-of-service were the major forms of cyber attacks B/Ds experienced. OGCIO had commenced a new round of review on the "Government IT Security Policy and Guidelines", which would examine, inter alia, the existing government regulations, policies and guidelines related to IT security including that of Internet of Things, and recommend appropriate updates with reference to latest international standards ISO/IEC 27701 on the protection of privacy in IT systems. OGCIO expected to complete the review within 2020 and publish the updated guidelines for reference by the public.

26. Some members queried whether the Police Force had brought hacking software which allowed them to unlock smartphones and access user data without the owners' consent, and adopted facial recognition technology to identify suspects in the course of criminal investigations. Members also queried whether B/Ds, including the Police Force, had consulted OGCIO prior to their procurement of IT security software. The Administration advised that B/Ds would, according to their needs, implement security technology measures and procure IT security software. While there was no need for B/Ds, including the Police Force, to consult OGCIO's views prior to their procurement of relevant equipment and software, B/Ds should ensure that the procurement would comply with relevant laws and regulations.

27. Members enquired how OGCIO could ensure that all B/Ds would comply with the security requirements of the Government. The Administration advised that B/Ds were required to conduct information security risk assessments and audits once every two years to ensure that they had adopted effective security measures. OGCIO would also conduct independent information security compliance audits for all B/Ds every two years to assist them in continuously improving their security management systems to tackle emerging security threats.

Measures to strengthen information security management of enterprises

28. Members urged the Administration to step up efforts, in conjunction with industry associations, to promote the awareness of large enterprises and SMEs on system security risks. Members also suggested that the Administration should consider enhancing support for SMEs to cope with potential information security risks.

29. The Administration advised that HKCERT would continue to collaborate with the industry associations and HKIRC to organize thematic seminars with a view to further promoting cyber security awareness.

Protection of privacy

30. Citing the incident where the Registration and Electoral Office lost two notebook computers containing voters' information, some members queried whether the Administration would identify technology solutions to improve the protection of personal privacy and data. The Administration advised that efforts would continue to promote the awareness and knowledge of cyber security threats, preventive measures and best practices among the industries and in the community through education programmes, publicity programmes on radio, etc.

31. The Administration further advised that OGCIO planned to commence a study in 2020 to work out a set of technical guidelines on the application of artificial intelligence and big data analytics for internal adoption within the Government, including the handling of ethical and privacy issues arising from such application.

Law reform proposals under consideration or in the process of being implemented

32. In the course of members' discussion with the Administration on legislative measures to combat cybercrimes, members noted that the Administration would consider introducing relevant legislation, such as provisions against voyeurism, reviewing "access to computer with criminal or dishonest intent" under section 161 of the Crimes Ordinance (Cap. 200), reviewing existing legislation on cybercrime, etc. Members urged the Administration to commence the relevant legislative process as early as practicable.

Cyberport

Cyberport expansion plan

33. During the session, the Administration sought the Panel's support for a funding proposal for Cyberport to carry out an expansion project, which would provide more office and co-work space so that more quality technology companies and start-ups might be attracted to set up offices there. Members supported the proposal. Some members queried the justification for a large investment amid an economic downturn.

34. Some members held the view that the Administration should devise short, medium and long-term plans in a bid to drive the continuous and sustainable development of I&T in Hong Kong, instead of relying merely on the Cyberport expansion plan. The Administration should also continue to explore suitable sites such as industrial buildings for providing working space for I&T start-ups under the Space Sharing Scheme for Youth. The Administration responded that the provision of office space in Cyberport should help create a diverse and vibrant I&T ecosystem in Hong Kong. The "Smart-Space 8"

operated by Cyberport, offering 20 000 square feet of co-working space in Tsuen Wan, would meet the needs of start-ups and young entrepreneurs. Cyberport would consider operating other working space if there were suitable sites available. Members noted that the Administration had been actively promoting the development of digital technology, including e-sports and financial technology, with a view to providing Hong Kong with a broader arena for I&T development.

Easy Landing Scheme

35. Cyberport has launched the Easy Landing Scheme to attract multinational corporations to set up offices and R&D units there through the provision of rental concessions. Members noted that rental concessions had been provided to two companies, conditional on their participation in and collaboration with Cyberport. In light of the uncertainties in the economic environment, the Financial Secretary announced in August and September 2019 a series of relief measures to support enterprises and safeguard jobs. Cyberport also announced in September 2019 a 50 % rental concession for its tenants and start-ups for the period from October 2019 to March 2020. Members asked whether ZhongAn and Amazon Web Services Hong Kong Limited would enjoy this rental concession in addition to those under the Easy Landing Scheme. Some members suggested that Cyberport should extend the period of rental concessions for its tenants and start-ups so as to help reduce the operating costs of technology companies and facilitate the start-ups to deploy resources as appropriate to recruit additional manpower. The Administration informed members that Cyberport would, in tandem with the Administration's policy on supporting enterprises, review the need to extend the period of relief measures as appropriate.

Development of e-sports

36. To promote the development of the e-sports industry in Hong Kong, the Administration had injected \$100 million into Cyberport in 2018-2019, of which \$50 million was designated for establishing the Cyberport Arcade as an e-sports and digital entertainment node, while the remaining \$50 million would be used for promoting the development of the local e-sports industry. During the session, members were briefed on the progress of e-sports development.

37. Members expressed concerns whether the provision of public funds to Cyberport for building the dedicated e-sports venue in the Cyberport Arcade would give it an unfair competitive advantage over private operators of similar establishments. Cyberport responded that most of the private-run venues were catered for small scale events, whereas the one in Cyberport Arcade were better equipped to host larger and international scale competition, so they were serving different markets. Cyberport emphasized that it had been working closely with the industry. For example, preliminary rounds of e-sports competitions were held in smaller scale e-sports venues operated by e-sports associations whereas

finals were held in Cyberport.

Impact of the recent social incidents and changes to innovation technology development

38. Members have at various Panel meetings raised concerns about the impact of the recent social incidents and the passage of the Hong Kong Human Rights and Democracy Act of 2019 ("the Hong Kong Act")⁵ by the United States Congress on Hong Kong's economy and the business environment of various sectors, in particular SMEs and micro-enterprises. A joint meeting by the Panel, Panel on Commerce and Industry, Panel on Economic Development and Panel on Financial Affairs was held on 6 December 2019 to discuss relevant issues.

39. Some members asked about the impact of the social incidents and the Hong Kong Act on the development of I&T industry in Hong Kong, and the Administration's measures to mitigate the problem. The Administration advised that the recent internal and external environment facing Hong Kong had inevitably brought uncertainties to the local R&D and the I&T industry. Overseas I&T enterprises had become more cautious in deploying talents to work in Hong Kong in the short term, and some had slowed down their pace of business expansion. Certain scheduled I&T events were postponed or cancelled. Members were assured that there was no sharp rise in the surrender of tenancy by tenants at the Cyberport and the Hong Kong Science Park. Meanwhile, the Administration had introduced a number of measures to support the I&T industry by lowering their operating costs and improving their cash flow situation, and creating a favourable environment for the development of I&T industry through the establishment of the InnoHK research clusters.

COMMUNICATIONS AND BROADCASTING

Telecommunications regulatory system

40. In coping with the development of telecommunications technologies, the Administration considered it appropriate that the extant regulatory framework be modernized. Accordingly, following a review of the Telecommunications Ordinance (Cap. 106), the Administration proposed to introduce measures to regulate telecommunications functions of devices in the 5G and Internet of Things era; protect underground telecommunications infrastructure; simplify the issue of non-carrier licences; and improve the appeal mechanism under Cap. 106. The Administration conducted a three-month public consultation from 28 November 2018 to 27 February 2019.

⁵ Details of the Hong Kong Human Rights and Democracy Act of 2019 are set out in the Information Note (LC Paper No. IN02/19-20) prepared by the Research Office of the Legislative Council Secretariat.

41. Members discussed the legislative proposals with the Administration at its meeting in November 2019. Members had no objection to the proposals and noted that the Administration would proceed with the drafting of the relevant legislation for submission to LegCo in due course. As part of the legislative proposal to protect underground telecommunications infrastructure, the Administration would prepare guidelines to set out appropriate works procedures and protection measures, including details on the respective responsibilities of both the construction and the telecommunications sectors. The relevant stakeholders would be consulted on the draft guidelines when the legislation was drafted.

42. The Chairman pointed out that some members of the public would be concerned about a proposal of removing a restriction on disclosing anonymous customer data by telecommunications operators for research purposes, as their personal data might then become vulnerable. The Chairman commented that, without a consensus in the community, it might not be the opportune time to amend Cap. 106 to allow telecommunications operators to open up or sell anonymous customer data. The Administration confirmed that such a proposal was not included in the current legislative exercise.

External telecommunications connectivity

43. As a major telecommunications hub in the region, Hong Kong is connected to data centres, servers and relevant platforms around the world through optical fibre cables networks, and has access to communications satellites. During the session, members discussed with the Administration the development of Hong Kong's external telecommunications ("ET") connectivity, and were briefed on the Administration's plan to provide land in Chung Hom Kok Teleport for ET infrastructure.

44. Members queried whether Hong Kong had the competitive edge among neighbouring jurisdictions to attract operators to invest and operate ET networks. The Administration mentioned that Hong Kong was well located for the development of earth stations for satellites covering the Asia Pacific region. Hong Kong's attractiveness as a centre for ET facilities was also demonstrated by the fact that telecommunications operators had been taking steps to further increase the capacity of Hong Kong's ET networks. The Administration further advised that 20 overland cables were installed at crossing points such as Lo Wu, Lok Ma Chau, etc. These cables were extended to continental Europe or the Middle East via the Mainland.

45. Some members referred to a recent media report and queried whether the abortion of the construction of an external submarine optical fibre cable system between Hong Kong and Los Angeles would affect Hong Kong's competitiveness in ET connectivity. The Administration clarified that the subject cable system would straddle multiple jurisdictions, including Hong Kong, and was scheduled for service commissioning within 2020. The part of

the construction works within Hong Kong waters had been completed. The cable system would land at Deep Water Bay and the required administration arrangements, including consultation with the relevant District Council had been completed.

46. The Chairman pointed out that the telecommunications sector was concerned about a lack of policy that was conducive to the development of satellite television ("TV") industry in Hong Kong. One member queried, particularly, the justifications and urgency of the relocation of the existing satellite earth stations from Tai Po to the proposed Chung Hom Kok Teleport.

47. The Administration considered that the overall development of the satellite TV industry in Hong Kong was satisfactory. Members were aware that satellite earth stations, which were at present located in Tai Po and Stanley, needed to make use of the 3.4GHz – 3.7GHz band to operate the satellites already in orbit, but the Communications Authority ("CA") had, since 1 April 2020, reallocated the 3.5GHz band for 5G mobile services. To ensure that satellite services operated by the earth stations could co-exist with future 5G services, CA had set up restriction zones in Tai Po and Stanley where operators would have to use frequency bands other than the 3.5GHz band to provide 5G mobile services. To maintain the long-term development of Hong Kong's satellite industry and to remove the restriction on 5G service operators of using the 3.5GHz band in Tai Po, the Administration was exploring with satellite operators the feasibility of relocating the existing earth stations from Tai Po to the proposed Chung Hom Kok Teleport.

48. Some members queried whether the capacity of Hong Kong's ET infrastructure could meet the demand in 2023. The Administration indicated that the design capacity of the existing ET infrastructure far exceeded the equipped capacity⁶ of existing ET facilities. Furthermore, the capacity of Hong Kong's ET networks would be more than double the current capacity after eight new external submarine optical fibre cable systems were to be put into service. The Administration expected that the demand for data transmission capacity in the medium to long-term could be met.

Public payphones

49. At present, PCCW-HKT Telephone Limited and Hong Kong Telecommunications (HKT) Limited ("HKT") is required, under the universal service obligation ("USO") within its licence conditions, to provide public payphones, including kiosk type public payphones located on the streets ("kiosk payphones") and in-building type public payphones located in public facilities (e.g. hospitals, universities, recreation and civic centres) ("in-building

⁶ Equipped capacity refers to the capacity of the external circuits which are equipped with the necessary termination equipment so that the capacity is readily available to customers.

payphones"). The cost of providing this public payphone service is shared by all local fixed and mobile service operators. As mobile phone has become increasingly popular, the demand for public payphones has declined continuously.

50. At the meeting on 9 December 2019, the Administration briefed members on the outcome of a review on public payphone and the decision to reduce the number of public payphones provided under USO.

Removal of under-utilized public payphones

51. Members queried how OFCA decided which payphones should be removed, and whether a minimum number of payphones had to be maintained under USO. Some members commented that provision of public payphones, as a kind of public services for tourists and those who had no mobile phone, should not be abolished altogether.

52. The Administration advised that Cap. 106 only required the provision of a reasonable number of public payphones under USO, subject to the prevailing public demand for such service. Payphones with an extremely low usage rate might be excluded from USO, but kiosk payphones located in remote areas with no mobile network coverage and no alternative kiosk payphone nearby would be retained. Views from stakeholders, and the circumstances specific to the districts or locations of the payphones would also be taken into account in determining whether the payphones should be excluded or retained. Emergency helplines located in remote areas, which were not covered in the Administration's review, would be retained for use by the public for emergency purposes. As to whether the number of public payphones would further be reduced in the future, the Administration responded the Panel that it was a global trend that the number of public payphones would decrease.

53. As the contributions by local fixed and mobile service operators towards the maintenance and operation of public payphones would decrease following their removal, members queried whether the savings would be rebated to customers. The Administration explained that it would be the operators' commercial decision whether to pass the cost saving onto customers. Individual customers might not benefit appreciably as the cost reduction would be small.

Revitalization of public telephone kiosks

54. There had been suggestions that new functions, such as free battery charging service, web browsing facilities, traffic and tourist information, etc., should be added to the retained public payphone kiosks, and HKT had submitted a revitalization proposal. Some members queried whether the Administration would provide a one-stop service to facilitate the revitalization plan, and how the revitalization plan was to be financed. Other members expressed concerns on when the proposed new functions would be installed among all public

payphone kiosks, and whether additional income-generating services might be allowed to be provided. Members also queried if the Administration planned to install small cell base stations in the retained public payphone kiosks to facilitate the implementation of the 5G mobile services.

55. The Administration informed members that OFCA would play the role of a coordinator and follow up any revitalization proposal with the relevant B/Ds. The Administration had also been facilitating the process of installing small cell base stations in public payphone kiosks. A pilot run of multi-functional telephone kiosks might be conducted in Central, Causeway Bay, Tsim Sha Tsui and Shatin. Any plan for mass installation might be determined in the light of public feedback on the pilot run. The financial implications of the revitalization scheme might be better assessed after the completion of the pilot run. The Administration might explore how income generated from the public payphones, if any, could be used to meet part of the cost of providing public payphone services.

Free Wi-Fi service for the public

56. Members noted that if a public payphone kiosk installed with a Wi-Fi hotspot was to be removed, the Administration would consider installing replacement free Wi-Fi hotspots in their neighbouring vicinities whenever necessary. Members expressed concern over the possible interruption the works might cause to the provision of Wi-Fi service. Some members criticized the Administration for not providing the replacement Wi-Fi service in situ at all sites of removed kiosk payphones even though this was technically feasible.

57. The Administration informed members that new Wi-Fi hotspots had been installed at suitable premises, including government venues and public facilities, under the "Wi-Fi Connected City" programme as an ongoing initiative. The Administration would examine the availability of other Wi-Fi hotspots in the vicinity before installing one after a Wi-Fi ready public payphone kiosk was removed.

58. Some members enquired whether the Administration could provide more free public Wi-Fi hotspots and elevate the connection speed. Members noted that the Administration had been communicating with various departments on the installation of more Wi-Fi hotspots at suitable venues under the "Wi-Fi Connected City" programme. It had also been regularly monitoring the service quality and user experience of the public Wi-Fi service at government venues. Different aspects of the service quality, including the connection speed, had been improved in recent years, and a majority of respondents were satisfied with the quality of the Wi-Fi service provided.

Implementation of full digital television broadcast

59. Members were briefed on the progress of the implementation of full digital terrestrial television ("DTT") broadcast, and the Administration's plan to switch off analogue TV service ("ASO") on 30 November 2020. Members discussed with the Administration issues including reception problems faced by some TV viewers and the Community Care Fund Digital TV Assistance Programme ("the Assistance Programme").

Television broadcast reception problems

60. Some members asked whether DTT coverage in Hong Kong would achieve 100% of the population in future and how DTT reception problems could be solved. The Administration explained that, while OFCA and domestic free TV programme service ("free TV") licensees would continue to explore feasible and cost-effective ways to extend the coverage of their DTT networks, given the hilly terrain in Hong Kong, a 99% DTT coverage, which covered most of the densely populated urban areas, was considered satisfactory.

61. As regards reception problems, the Administration explained that the quality of signals might vary according to the settings of the digital TV set or digital set-top box in the residence, the condition of the in-building transmission apparatus and other environmental factors. In densely developed urban areas, high-rise buildings might also block TV signals from reaching their neighbouring old buildings. In response to complaints or enquiries related to TV reception problems, OFCA would conduct on-site signal measurements and offer technical advice to the residents concerned on a case-by-case basis and refer the cases to TV broadcasters for follow-up whenever appropriate.

The Community Care Fund Digital TV Assistance Programme

62. Noting that as at March 2020, only over 4 700 out of the latest estimate of 80 000 eligible households had submitted applications under the Assistance Programme, members enquired whether the Administration was confident that all eligible applications would be received by the deadline of mid-July 2021, and whether it could handle a possible surge of applications nearer to the ASO target date of end-November 2020. The Administration commented that while application might have slowed recently due to the spread of coronavirus disease-2019 ("COVID-2019"), there was still ample time before ASO and the application period would not end until seven months thereafter. The Hong Kong Council of Social Service, the implementation agent of the Assistance Programme, would resume publicity activities as the COVID-2019 pandemic situation improved.

63. Members also enquired whether the estimated expenditure of the Assistance Programme could be lowered due to technological advancement or increase in supply of TV sets, and how the remaining balance of the Assistance

Programme would be handled in the end. The Administration replied that the cost of digital TV receivers and relevant services procured for the Assistance Programme had been fixed last year after a tender exercise. The actual expenditure would be determined by the unit cost specified in the contract and the total number of successful applying households. The unspent balance, if any, would return to the Community Care Fund.

Governance and management of the Radio Television Hong Kong

64. During the session, some members had, on a number of occasions, raised concerns over issues related to the governance and management of the Radio Television Hong Kong ("RTHK"). Members' concerns were triggered by CA's decision in March 2020 to revoke its directions to free TV licensees on the requirements to broadcast RTHK's programmes. Members were also concerned about the Administration's position on a criticism that RTHK had breached the "One-China" principle in some of its programmes. Meanwhile, some members had also expressed concerns about the progress of RTHK in following up the recommendations of the *Director of Audit's Report No. 71* on RTHK, as well as the public feedback which criticized that some of RTHK's programmes appeared to be partial and biased. In June 2020, members discussed with the Administration over these issues. The Administration had also submitted written responses to explain its positions.

Charter of RTHK and RTHK's dual identities

65. Some members criticized the Administration for being intolerant of RTHK's often critical stance towards the Government, and had been trying to reduce RTHK to a mere Government's mouthpiece, disregarding RTHK's role as Hong Kong's sole public service broadcaster. The Administration responded that RTHK was expected to perform its duties as stipulated in the Charter of RTHK ("the Charter") in a holistic manner, including promoting understanding of the concept of "One Country, Two Systems" and its implementation in Hong Kong and engendering a sense of citizenship and national identity. The Administration did not expect RTHK to become its mouthpiece.

66. Members noted that, while RTHK enjoyed editorial independence, Director of Broadcasting, as RTHK's Editor-in-Chief, was responsible for the final editorial decisions and was accountable for editorial decisions taken by RTHK programme producers. The Administration indicated that the Commerce and Economic Development Bureau ("CEDB"), which had policy oversight of RTHK, had the responsibility to ensure that RTHK, as a public service broadcaster and a government department, adhere to the "One-China" principle in its programmes.

The "One-China" principle in The Pulse and Taiwan Stories III

67. In one episode of *The Pulse*, a RTHK-produced programme, a reporter asked a senior World Health Organization ("WHO") official whether WHO would reconsider Taiwan's membership given the latter's contribution in combating COVID-2019. In *"Taiwan Stories III"*, a programme commissioned by RTHK, the bilateral relations between Taiwan and an African country was referred to as "diplomatic ties between two countries". In both instances, CEDB had pointed out that RTHK had breached the "One-China" principle and the public purposes and mission as stipulated in the Charter. Some members queried how, specifically, RTHK had breached the "One-China" principle in these two programmes, and whether the Administration intended to impose censorship on RTHK. Meanwhile, some members queried the motive of the interviewer in *The Pulse* in asking the question.

68. The Administration maintained that *The Pulse* had given audience an overall impression that the "One-China" principle had not been upheld, and the reference to Taiwan as a country in *Taiwan Stories III* was considered incompatible with that principle as well.

Communications Authority's codes of practice

69. Some members pointed out that there had been several occasions where CA had ruled that RTHK had breached the Generic Code of Practice on Television Programme Standards. They had queried whether any civil servant staff in RTHK had been subject to disciplinary actions. The Administration explained that RTHK had followed-up complaint cases rigorously with professionalism, taking into account the requirements under the Civil Service Regulations. In the case of *Pentaprism*, a RTHK-produced programme, the Department had quickly withdrawn the episode from its web archive even before CA had issued a warning. A review of the production process was also conducted thereafter to prevent recurrence in the future.

Follow-up to the Director of Audit's Report No. 71

70. Members expressed concerns about the low TV rating of RTHK's programming and queried the slow progress on implementing two of the recommendations in the *Director of Audit's Report No. 71* released in October 2018, where RTHK should develop viewership indicators, such as appreciation index, for TV channels and programmes, and consider setting targets/benchmarks for different categories of RTHK programmes.

71. The Administration responded that RTHK had been pressed to follow up the relevant recommendations of the *Director of Audit's Report No. 71*. In particular, RTHK had been requested to collect more detailed data on the cross-media TV ratings of its TV channels and programmes, and report them in the Controlling Officer's Report so as to further understand the reasons for low TV

ratings of its programmes. In this connection, RTHK should make reference to the TV ratings data widely adopted by the broadcasting industry to fully grasp the viewership of its programmes on TV, as well as collect more detailed data on the click rates of its programmes on other media platforms.

Extending fibre-based network to villages in remote areas

72. The Administration introduced the Subsidy Scheme to Extend Fibre-based Networks to Villages in Remote Areas ("Subsidy Scheme") in 2018. The Subsidy Scheme targets remote villages which are located far away from the existing fibre-based backbone networks of fixed network operators ("FNOs") and where broadband services are delivered at a speed of 10 megabits per second ("Mbps") or below, covering nine districts in the New Territories and on outlying islands and benefiting some 110 000 villagers in 235 villages. During the session, members were briefed on the latest progress of the implementation of the Subsidy Scheme.

73. Members queried whether there had been slippage in the implementation of the Subsidy Scheme. The Administration said that there had been delay of a few months as more time was needed to handle various legal documents, and one of the projects had to be re-tendered after technical adjustments had been made to it.

74. Some members expressed concerns about the slow progress in implementing the Subsidy Scheme, and that many villagers might not be able to benefit as they had scant information on how to proceed with reaching agreement with the respective FNO to allow the latter to roll out fibre-based networks within the village. As the rolling-out of fibre-based networks to the vicinity of the entrances of villages would enable 5G mobile communications service to be provided, some members asked if operators could provide Wi-Fi service rather than fixed network service to villagers in remote areas, or offer them subsidies for purchasing SIM cards to access mobile Internet services.

75. The Administration maintained that once the fiber-based networks were rolled out, the broadband speed at the villages concerned could be increased to at least 25Mbps, which would be an instant improvement from their existing broadband services being delivered at a speed of 10Mbps or below. Besides, it would also provide the infrastructure for the deployment of other telecommunications services (including 5G mobile and Wi-Fi services). Furthermore, selected FNOs were required to open up at least half of the capacity of the network facilities and submarine fibre-based cables subsidized under the Subsidy Scheme for use by other FNOs, for free, to provide broadband services to the villages concerned. This would offer more choices to the villagers.

76. Members made the point that in some village where fibre-based networks had been rolled-out, villagers had indeed experienced difficulties in

connecting to the networks. They suggested the Administration to conduct a survey to access the circumstances of the villagers who were still unable to connect to the fibre-based networks and to identify possible solutions to address the issue. The Administration responded that some FNOs had made additional service commitments for some of the villages, including providing broadband services at speed of 1 000Mbps or above, installing Wi-Fi hotspots within the common area of villages for provision of free Wi-Fi services and providing broadband services to the villages concerned at the prevailing market prices during the first three years upon project completion.

77. Members had sought further information from the Administration on, specifically, which of the service commitments would apply to each of the concerned villages, and the Administration undertook to provide more information to the local Rural Committees, District Councils and the Panel when more specific information was available.

78. The Chairman had asked the Administration to take precaution as necessary to ensure that the arrangements under the Subsidy Scheme, which allowed the selected FNOs to roll out fibre-based networks and to offer service commitments to the villages concerned, would not create unfair advantages to those FNOs and that other operators would not have difficulties in entering the market.

Meetings held

79. From October 2019 to June 2020, the Panel held a total of 9 meetings, including a joint meeting with other Panels.

Panel on Information Technology and Broadcasting

Terms of Reference

1. To monitor and examine Government policies and issues of public concern relating to information technology, telecommunications, broadcasting, film services and creative industry.
2. To provide a forum for the exchange and dissemination of views on the above policy matters.
3. To receive briefings and to formulate views on any major legislative or financial proposals in respect of the above policy areas prior to their formal introduction to the Council or Finance Committee.
4. To monitor and examine, to the extent it considers necessary, the above policy matters referred to it by a member of the Panel or by the House Committee.
5. To make reports to the Council or to the House Committee as required by the Rules of Procedure.

Panel on Information Technology and Broadcasting

Membership list for 2019-2020 session*

Chairman	Hon Charles Peter MOK, JP
Deputy Chairman	Hon Elizabeth QUAT, BBS, JP
Members	Hon James TO Kun-sun Hon WONG Ting-kwong, GBS, JP Hon Mrs Regina IP LAU Suk-yee, GBS, JP Hon Claudia MO Hon YIU Si-wing, BBS Hon MA Fung-kwok, SBS, JP Hon CHAN Chi-chuen Hon CHAN Han-pan, BBS, JP Ir Dr Hon LO Wai-kwok, SBS, MH, JP Hon CHUNG Kwok-pan Hon Alvin YEUNG Hon CHU Hoi-dick Hon SHIU Ka-fai, JP Hon YUNG Hoi-yan, JP Hon CHAN Chun-ying, JP Hon HUI Chi-fung

(Total : 18 members)

Clerk Mr Daniel SIN

Legal Adviser Miss Evelyn LEE

* Changes in membership are shown in Annex.

Panel on Information Technology and Broadcasting

Changes in membership

Member	Relevant date
Hon Starry LEE Wai-king, SBS, JP	Up to 24 October 2019
Hon Paul TSE Wai-chun, JP	Up to 25 October 2019
Hon Steven HO Chun-yin, BBS	Up to 25 October 2019
Hon Tommy CHEUNG Yu-yan, GBS, JP	Up to 27 October 2019
Hon Jeffrey LAM Kin-fung, GBS, JP	Up to 27 October 2019
Hon Frankie YICK Chi-ming, SBS, JP	Up to 27 October 2019
Hon LEUNG Che-cheung, SBS, MH, JP	Up to 27 October 2019
Hon KWOK Wai-keung, JP	Up to 27 October 2019
Dr Hon CHIANG Lai-wan, SBS, JP	Up to 27 October 2019
Hon HO Kai-ming	Up to 27 October 2019
Hon Holden CHOW Ho-ding	Up to 27 October 2019
Hon CHEUNG Kwok-kwan, JP	Up to 27 October 2019
Hon Vincent CHENG Wing-shun, MH, JP	Up to 27 October 2019
Hon Christopher CHEUNG Wah-fung, SBS, JP	Up to 29 October 2019
Hon Martin LIAO Cheung-kong, GBS, JP	Up to 19 November 2019
Hon CHAN Kin-por, GBS, JP	Up to 21 November 2019
Dr Hon Priscilla LEUNG Mei-fun, SBS, JP	Up to 7 January 2020