

# Can eGovernment in Hong Kong Enable eGovernance?

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**Abstract:** In October 2006, the Hong Kong government started the public consultation on its Digital 21 Strategy. The government expected that with the implementation of the next wave of eGovernment between 2007 and 2010, a 'new form of ICT enabled governance' ('e-governance') will emerge. This regional case study examines some of the problems likely to arise from the implementation of the eGovernment programmes and how those problems will hinder the achievement of e-governance in Hong Kong. The governmental policy of eGovernment adoption is critically reviewed from the prospective of privacy and eInclusion. It is submitted that unless the problems of inadequacy of legal protection of privacy and digital divide are satisfactorily resolved, e-governance cannot be realized.

## 1. Introduction

In October 2006, the Hong Kong government started the public consultation on its Digital 21 Strategy entitled 'Continuing to build on our strengths through technology across the community'. [1] As the fourth one of the series, [2] the vision of the 2007 Digital 21 Strategy ('the 2007 Strategy') is to make Hong Kong a 'World Digital City'. One of the key action areas for implementation between 2007 and 2010 is the next wave of eGovernment, including the next generation of public services via information and communications technology ('ICT').

eGovernment in Hong Kong has a relatively short history. In 1998, it started with putting information and services online progressively for citizens' access through a central portal, ESD, pursuant to the Electronic Service Delivery Scheme. [3] Focus was then shifted to provision of quality and effective services and promotion of utilization of e-option for public services. [4] Under the 2007 Strategy, the focus of the eGovernment programme is to provide a 'citizen-centric mode of service delivery emphasizing on customer engagement and information management'. It is expected that in the next wave of eGovernment, a 'new form of ICT enabled governance' ('e-governance') will emerge. [5]

This paper examines some of the problems that are likely to arise from the implementation of the Hong Kong eGovernment programmes and how those problems will hinder the achievement of e-governance. The governmental policy of eGovernment adoption is critically reviewed from the prospective of eInclusion and intrusion of privacy. To the author's knowledge, no similar regional study has been undertaken or published.

## 2. Objectives

This regional case study examines the forthcoming eGovernment programmes against the social and legal background of Hong Kong. It aims to assess the viability of the 2007 Strategy in achieving e-governance by evaluating the likely impact of the eGovernment programmes on citizens and the business sector. Two issues, namely intrusion of privacy and eInclusion, are selected for discussion as they reflect the (in)adequacy of the existing

social and technological conditions and legal protection in realizing the government's vision of 'e-governance'. This study is of general interest to those who participate in eGovernment technologies and projects.

### **3. Methodology**

In order to examine the social/technological conditions and privacy law of Hong Kong, research was started from the literature review of the official materials about the Hong Kong eGovernment programmes and materials published by the Privacy Commissioner's Office concerning the development and use of ICT in Hong Kong. Reference was also made to books and journal articles about eGovernment and e-governance policies in the leading jurisdictions.

### **4. eGovernment in Hong Kong**

Given its multi-level and multi-dimensional nature, [6] 'eGovernment' means different things in different jurisdictions as it depends on the priorities of and progress made by a particular government. [7] There is no official definition of 'eGovernment' in Hong Kong. As gathered from the governmental publications, it means technology-enabled government to deliver better services in a more efficient and effective manner. 'e' stands for 'electronic', 'easy', 'efficient' and 'economical'. The vision of eGovernment in Hong Kong was to provide more efficient and better quality government services to the citizens and businesses, and to motivate and drive the wider adoption of e-business in the private sector and the community. [8] In other words, it focuses on the interaction between public administration and civil society. [9]

The Hong Kong eGovernment has an apparently significant achievements in providing governmental information and services via the Internet. By September 2006, over 1,200 public services or 90% of all services amenable to electronic means of delivery were provided with e-option. Over 80% government procurement tenders were conducted through electronic means. All government bills are provided with e-payment option. Over 1,500 government forms could be downloaded online and 400 e-forms were available for online completion and submission. [10]

The 2007 Strategy states that the focuses of the next wave of eGovernment are, among the others, public service delivery through a new governmental portal and electronic procurement projects. A new portal, GovHK ([www.gov.hk](http://www.gov.hk)), was launched in September 2006 which will replace the existing Government Information Centre ([www.info.gov.hk](http://www.info.gov.hk)) as the 'single entry point' to online Government information and services. The portal provides some 1,200 government electronic services, which are organized in 3 user groups ('Residents', 'Business & Trade' and 'Non-Residents') and 11 key areas for easy access by users. [11] The government said that with this portal, the conventional delivery channels for governmental services, such as service counters, are subject to review and cancellation for the sake of efficiency savings. [12] The government also plans to introduce private sector contents and services progressively on GovHK. [13]

### **5. Intrusion of Privacy and Digital Divide**

The Government Chief Information Officer ('GCIO') is responsible for eGovernment and other information technology ('IT') related policies in Hong Kong. He pointed out 3 factors which tended to cause a drop in ranking of a eGovernment: (1) privacy breaches, (2) failure in major IT projects and (3) that the e-services were built for the needs of the government but not citizens. [14] Unfortunately, the eGovernment programme of Hong Kong bears the features of (1) and (3).

The government aims that ICT becomes fully engrained in policy-making and day-to-day business of all government bureaus and departments. Increased efforts will be made to integrate services across Government bureaus, departments and agencies so as to provide efficient and user-friendly services to citizens. [15] To provide such integrated services, collection, exchange and sharing of citizens' personal data among different governmental agencies are inevitable. The tension between such data sharing exercises and privacy protection is clear to the government. [16] Surprisingly, in the 2007 Strategy, the government keeps silent as to whether, or to what extent, citizens' privacy shall be affected by such data sharing exercises and what proposed safeguards shall be implemented to minimize the adverse effect. It has not suggested any legislative reform to regulate its intended data sharing exercises. The Privacy Commissioner is also silent on this issue.

Concerning collection of citizens' data, the privacy policy of GovHK states that the government will record visits to GovHK without collecting any 'personal identifiable information' of users. [17] When one browses the 'Online Services' for 'Residents' and visits the respective websites of different governmental departments and agencies, it can be found that some of them states that cookies are deployed and stored in web surfers' computers, e.g. ESD Life [18] and the Labour Department. [19] One would concern whether the activities and habits of a surfer on the Internet and the IP address of his/her computer as recorded by cookies amount to 'personal identifiable information'. The key question is whether collection of such information by cookies is governed by the privacy law of Hong Kong.

At present, the only 'privacy law' in Hong Kong is the Personal Data (Privacy) Ordinance ('PDPO') but strictly speaking, it does not protect 'privacy' in general sense but 'personal data'. PDPO defines 'personal data' as any data (a) relating directly or indirectly to a living individual; (b) from which it is practicable for the identity of the individual to be directly or indirectly ascertained; and (c) in a form in which access to or processing of the data is practicable. [20]

The Australian Parliament considered that cookies were not 'personal data' as they only identify the IP addresses of the users' computers but not the users. [21] Another view is that a surfer can be 'indirectly ascertained' by 'recourse to other data that is held by the data user or is readily obtainable by him'. Hence, simple deployment of cookies can be collection of 'personal data'. [22] The practical problem of this argument is that it is often difficult to define what data is 'readily obtainable' by the data collector. In his recent report regarding disclosure of a journalist's e-mail account information by Yahoo! Hong Kong Limited to the P.R.C. authorities (which resulted in the journalist's conviction by the P.R.C. court), [23] the Privacy Commissioner of Hong Kong held that an IP address could neither reveal the exact location of the computer concerned nor the identity of the computer user. It did not contain information that related to an individual nor was the registered user's information readily obtainable. IP address alone was not 'personal data' but 'personal data' could include IP address when combined with other 'identifying particulars' of an individual. [24] This restrictive approach is due to the definitional problem of 'personal data' since PDPO was drafted in the 'paper' but not Internet era. Unlike the EU Data Protection Directive [25] and the 2002 EU Directive, [26] PDPO does not specifically address the privacy problems in the online environment. [27] Without adequate legal safeguards for possible intrusion of privacy, the eGovernment initiatives will attract resistance rather than support from the citizens.

The problem of eInclusion (also known as eAccessibility or digital divide) in respect of individuals and small and medium enterprises ('SMEs') remains significant. As in 2006, only 62.9% of individuals (aged 10 and over) used personal computers ('PC') and 60.8% used Internet service in the past 12 months. Only 34.6% of them used online government services for personal matters in the past 12 months. [28] GCIO admitted that certain

segments of the society, such as elderly and disabled people, low-income households [29] and SMEs, were digitally excluded and might not be able to benefit from the e-services without proper assistance. [30] In such circumstances, the intended closure of traditional service channels, [31] e.g. service counters, will deprive those digitally excluded citizens from enjoying government services.

Concerning the business sector, according to the e-procurement projects, the government shall firstly push its private sector suppliers, including SMEs, to 'migrate to electronic commerce'. [32] It is highly likely that the e-commerce model to be adopted by the government (including the technological specifications, authentication procedure and security standard, etc.) shall be predominant in the local market. The government can force the enterprises to adopt a particular e-commerce model by statute. Experience tells us that the government tends to be conservative (if not stringent) on security measures and system requirements. [33] The question is whether or not, before 2010, the local SMEs are financially and technologically capable to satisfy such requirements and successfully migrate to e-commerce. As in 2006, the PC penetration rate was 56.2% for small enterprises, 85.9% for medium enterprises and 99.2% for large corporations. The corresponding figures in 2005 were 56.4%, 88.9% and 97.5% respectively. For Internet connection rates, in 2006, the figures were 51.7% for small enterprises, 80.7% for medium enterprises and 94.7% for large corporation. The corresponding figures in 2005 were 50.5%, 83.6% and 91.5% respectively. In 2006, 74.7% of large corporations had webpages or websites but only 37% of medium enterprises and 13.5% of small enterprises had the same. [34] As in 2005, only 52.5% of small enterprises and 69.4% of medium enterprises accessed to online government information and/or services (compare with 78.2% for large corporation). [35] These figures indicate that even though the Government has adopted 'sector-specific programmes' to encourage adoption of IT and e-commerce and help to sustain the competitiveness of the businesses, [36] the digital divide between large corporations and SMEs is increasing.

Hence, implementation of the 'e-procurement' projects may result in only large corporations being able to cope with such IT requirements and transact electronically with the government. The 2007 Strategy mentioned that large international and local firms equipped with comprehensive e-business solution will help 'push' electronic adoption. In view of their relatively limited resources, if the government does not ensure that local SMEs (95% of the enterprises in Hong Kong), are ready, willing and able to migrate to e-commerce before pushing them to do so, the e-procurement projects will adversely affect their survival and therefore, shake the foundation of the economy of Hong Kong.

## **6. Conclusion and Recommendations**

In a democratic society, governance is a matter of interaction between the government and civil society. Citizens' support and use of eGovernment will enhance their ICT knowledge and capabilities, which will then transform public culture (e.g. think of e-option first) and behaviour (e.g. migrating to e-option of public services and e-commerce, etc.). These changes constitute a sustainable development of e-governance which, obviously, starts from and is founded on strong support from citizens. Citizens will support the eGovernment programmes if their quality of life is kept improving by the same. To the contrary, citizens will resist the implementation of eGovernment programmes if their interests shall be adversely affected, e.g. their privacy is infringed or they are digitally excluded.

In view of the 'aging' problem of PDPO, [37] legislative reform is urgently called for. The EU Data Protection Directive [38] and the 2002 EU Directive provide valuable references. For example, the EU Data Protection Directive provides that 'personal data' means 'any information relating to' an identified or identifiable natural person ('data subject'). Hence, insofar as a piece of information is 'relating to' the data subject, the

statute becomes applicable. As the word 'identifiable' is used, it implies that in determining whether a piece of information is 'relating to' the data subject, reference can be made to an identification number (e.g. IP address) or other 'factors' specific to his/her identity. Further study should be conducted to explore an online data protection law, which is appropriate to the circumstances of Hong Kong.

Regarding eInclusion, there are various possible remedies, ranging from direct financial support to governmental acceptance of open source systems. Further research should be conducted to find out what administrative and/or legislative measures should be taken to assist the digitally excluded people and enterprises.

It is envisaged that the ICT enabled citizens (e-citizens) will request for a more accountable (e.g. online access to governmental information with the support of freedom of information law, which is lacking in Hong Kong) and democratic government (e.g. e-channels for lodging complaints and e-voting). They will request to participate in the formulation of the eGovernment and other IT-related policies. The relationship between the government and citizens is changing. Much more than utilization of e-services by the general public, a truly e-governance should be a new form of relationship between the government and citizens. Bearing that in mind, it is essential for the government to correctly perceive what citizens really need and expect, and how the entire community can be benefited in the development of eGovernment.

A 'citizen-centric' mode of eGovernment policymaking mechanism, which allows citizens' participation in formulating the eGovernment policies, is much more important than a 'citizen-centric mode of service delivery'. Hence, apart from public consultation on its eGovernment strategy, the government has to provide different channels for the general public to express its needs and expectations. It is doubtful whether or not those digitally excluded individuals and organizations (e.g. SMEs) have knowledge of the 2007 Strategy and how much weight has been given to their voices. Suffice to say that unless the problems of privacy protection and eInclusion are resolved and the eGovernment policies reflect citizens' expectation, no meaningful e-governance can be achieved.

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- [29] According to the survey conducted by the Census and Statistics Department of the Hong Kong Government in 2005, only 37.6% of households with monthly income of less than HK\$10,000 had a PC at home. See the 2007 Strategy, paragraph 7.2.
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- [31] The 2007 Strategy, paragraph 6.7.
- [32] The 2007 Strategy, paragraph 6.9.
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