

# Cloud Computing and Cloud Services

Telecommunications Regulatory Affairs Advisory Committee  
12 December 2012

# Purpose of the Presentation

- *Best Practice Guidelines on Regulatory Approaches to Foster Access to Digital Opportunities through Cloud Services* issued by the International Telecommunication Union (“ITU”) in Oct 2012 (“ITU Best Practices”)
- To brief Members of OFCA’s assessment on the benchmarking of Hong Kong’s telecommunications regulatory measures against the ITU Best Practices

# Broadband Infrastructure

## ITU Best Practices

*Regulators are recommended to reduce barriers to broadband deployment, actively facilitate the rollout of fibre networks and international connectivity links, and promote infrastructure sharing and coordination of civil works.*

## **Regulatory / Facilitating Measures Adopted in Hong Kong**

- Coordination on telecom requirements in new Government projects
- Use of Government premises and public facilities for network rollout
- Code of practice for provision of access facilities
- Voluntary registration scheme for fibre-connected buildings
- Single-point-of-contact service for landing new submarine cables

# Spectrum

## ITU Best Practices

*Regulators are recommended to release additional, critically-needed spectrum for wireless broadband, including opening white spaces to unlicensed use and conducting incentive auctions. Policies should encourage harmonization of international spectrum and communications device approvals.*

## **Regulatory / Facilitating Measures Adopted in Hong Kong**

- Timely release of spectrum
- Use of hill-top sites and government facilities to extend mobile coverage
- Spectrum coordination with neighbouring authorities with a view to releasing additional spectrum after analogue switch off
- Mutual Recognition Arrangement for telecom equipment

# Network Neutrality, Market Power and IP Interconnection

## ITU Best Practices

*Regulators are recommended to:*

- (i) implement measures to oversee the traffic management techniques used by network operators and ensure that such techniques do not unfairly discriminate among market players;*
- (ii) ensure that communications providers do not engage in conduct that constrains the provision of cloud services for reasons that are not transparent, objective, non-discriminatory and proportionate; and*
- (iii) ensure that all users derive maximum benefits in terms of choice, price and quality of service and to minimise any distortion or restriction of competition.*

# Network Neutrality, Market Power and IP Interconnection (cont'd)

## Regulatory / Facilitating Measures Adopted in Hong Kong

- Sufficient facilities-based competition
- Market forces serve well to safeguard competition and consumer interests
- Adequate safeguards in the Telecom Ordinance and licence condition
- Recent consultation on withdrawal of regulatory guidance on interconnection charges between fixed carriers
- NGN Working Group to discuss NGN interconnection issues

# Market Definition in a Converged Cloud

## ITU Best Practices

*Regulators are recommended to consider adopting a light-touch approach to new ICT players (such as content and application providers), taking into account network and service convergence as well as encouraging competition.*

## **Regulatory / Facilitating Measures Adopted in Hong Kong**

- Making use of cloud services provided by third parties for provision of telecom services is not considered as “establishing / maintaining” the cloud infrastructure
- Offer of telecom services without establishing / maintaining telecom means in Hong Kong is regulated under a simple class licence regime
- Content over the Internet subject to general laws only

# Cloud Transparency and Quality of Service and Experience (“QoSE”)

## ITU Best Practices

*Regulators are recommended to ensure that Internet service providers provide customers with greater transparency about their traffic management practices, and ensure the publication of comparable information on the availability and QoSE. Service providers should specify transparent and clear terms and conditions in contracts signed with customers.*

## **Regulatory / Facilitating Measures Adopted in Hong Kong**

- Mandatory guidelines on fair usage policy
- Publication of performance statistics by broadband service providers
- Code of practice on communications service contracts



# Consultative Process

## ITU Best Practices

*Regulators are recommended to conduct consultation and multi-stakeholder forum.*

## **Regulatory / Facilitating Measures Adopted in Hong Kong**

- Our longstanding practice to consult relevant stakeholders
- Advisory committees under OFCA
- Publication of relevant documents on website to enhance transparency

# Conclusion and Way Forward

- Our telecommunications regulatory measures have by and large fulfilled the ITU Best Practices
- We will continue to keep track of discussions and works undertaken by relevant international organisations
- We will take all necessary actions in a timely manner in order that we keep abreast with international best practices

Thank you