

For Discussion
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**Consultation Exercise on the Regulation of Internet Protocol
Telephony**

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Introduction

PCCW-HKT Telephone Limited (“**PCCW**”) welcomes this opportunity to present its views to this Panel on the suitability of the present regulatory regime to address the introduction of Internet Protocol (“**IP**”) based services and, in particular, Voice over IP (“**VoIP**”) services.

PCCW fully supports the development of new and innovative services such as IP managed networks and VoIP services. PCCW’s rollout of its New Generation Fixed Line and Convergence services are a testament to this goal of continuous technological innovation. Indeed, PCCW is the acknowledged technology leader in the telecommunications market in Hong Kong and is so recognized globally.

IP presents operators with the ability to migrate from circuit-switched to packet-based technology in order to provide voice and other services on a stand alone or integrated basis. However, in facilitating the progress of technology, it is critical to do so in a manner consistent with the policy principles developed by the Hong Kong SAR Government. The policy principles which are relevant to this consultation are:

- *Light-handed economic regulation.* Economic regulation should exist only where a “market failure” has occurred. In all other instances, market forces and commercially negotiated contracts can be relied upon.
- *Technology neutral regulation.* Government policy, licence terms and decisions should not distinguish, advantage or disadvantage different technologies. That is, the same rules should apply regardless of whether a licensee uses copper, fibre, or Hybrid Fibre Coaxial (“**HFC**”), and regardless of whether a licensee uses circuit-switched or IP technologies.

- *Promotion of network investment.* Policy decisions should establish, maintain and promote investment incentives in telecommunications networks. Policies that favor “free-riders” should not be adopted.
- *Social welfare regulation.* The social welfare aspects of telecommunications regulation should not be undermined or weakened. These aspects include service quality, public safety and security, universal service, and emergency calling.

VoIP services which use the public Internet raise important social welfare issues. This is the case because today’s first generation of voice services via the public Internet, cannot provide full “999” emergency call services, cannot meet existing quality of service standards, cannot meet public safety and security requirements and cannot, in general, meet user expectations. These issues were recently described in substantial detail at a Hong Kong University telecom forum by Mr. P L Wong of the Hong Kong Police Force and Dr. C K Law, Chairman of the Senior Citizen Home Safety Association. The attendees that I spoke to universally left that forum much more sensitised to these critical issues.

Accordingly, it is vital that, in addressing VoIP issues, policy makers do not ignore or in any way compromise consumer protection or social welfare. Technology must enhance consumer welfare, not endanger it. VoIP services therefore need to be provided in a manner that ensures these important social objectives remain fully satisfied.

Hong Kong is a telecommunications market characterized by substantial network rollout, high adoption of new technology, multiple network and service providers, fierce competition, low prices and substantial consumer benefits. It is also a market where the social welfare aspects of telecommunications service provision have never been compromised in achieving these substantial consumer benefits.

These social welfare objectives are already reflected in the Fixed Telecommunications Network Services (“FTNS”) licence, the Telecommunications Ordinance, various policy statements and industry best practices. Thus, VoIP can actually be introduced with little “new” regulatory intervention.

Policy Principles

Light-handed regulation is appropriate. PCCW supports the Government policy of “light-handed” economic regulation of the telecommunications industry. Light-handed economic regulation is

appropriate for VoIP. This is the case not because VoIP is a new service but because the markets in which VoIP services will be rolled out are already competitive.

Technology neutral regulation should apply. Technology neutral regulation is indifferent to whether a service provider uses circuit-switched or IP technology. That is, the existing regulatory framework and the existing licensing regime for FTNS and Value-Added Services (“VAS”) are fully adequate to deal with VoIP services.

Promotion of network investment. The promotion of network investment has been a consistent Government policy as only through the maintenance of investment incentives will new technologies be introduced into the market on a sustainable basis. In turn, the sustainable introduction of desirable new technologies and services has a substantial and direct positive impact on Hong Kong’s economy and all users in this market.

Social welfare requirements. Technology neutral regulation, light-handed economic regulation and the promotion of investment incentives are not the sole considerations raised in this consultation. As already emphasized, social welfare concerns such as service quality, full “999” emergency call capabilities, public safety and security, the continuous provision of service, and universal service arrangements are of particular concern and importance in this policy consultation.

Whilst VoIP promises long term consumer benefits, it makes little sense to unconditionally embrace the initial stage of VoIP development if it undermines or weakens existing levels of consumer benefits and social welfare. In these circumstances, VoIP services must be introduced in a measured and considered way, without compromising existing social welfare safeguards.

The Existing Two-Tier Regulatory Structure Will Work Fine for VoIP

The existing FTNS and Public Non-Exclusive Telecommunications Service (“PNETS”) licensing regime is well suited to address the introduction of VoIP services. This use of the existing licensing regime creates two classes of VoIP services: one that is an FTNS offering (i.e. provided under the FTNS licence and therefore meeting all of the existing FTNS requirements) and one which is simply offered under a PNETS licence as a VAS. These two classes of service are subject to very different rights and obligations. The choice of entry would be left to the VoIP service provider.

To be clear, an FTNS licence is appropriate if and only if the VoIP service fully satisfies all the obligations of the licence, Telecommunications Ordinance and industry best practices. This particularly includes providing the social welfare capabilities in full. Also, to be clear, rights and obligations go together. If an operator's VoIP service cannot meet the FTNS licence requirements, then it operates as a PNETS service. It does not get the FTNS rights. This two-tier approach permits broad entry but protects users to the maximum extent possible. A VoIP service provider cannot get the rights without satisfying in full all of the obligations. Social welfare obligations are not a "pick and choose" or "à la carte" exercise.

Global Best Practices

Regulators around the world are now looking at VoIP issues. From these other reviews, which includes both the EU (and its member states) and the US, two common threads can be seen. First, a clear policy requirement that consumer benefits and social welfare not be diminished. Second, that a two-tier regime be established to implement the clear importance given to these social welfare issues.

Charging for use of the Network

Commentators have likened the Internet to a public highway, with different packets of data being routed to different IP addresses in the same manner that different vehicles are bound for different destinations.

Network operators, like highway operators, should have the right to charge service providers for the use of their network. For example, charging today may take the form of Type I interconnection, Type II interconnection, access charges, USC, LAC, PNETS charges, etc. This fundamental right to charge for the use of one's network also includes the right to charge service providers supplying VoIP services. Free-riding should not be permitted as a matter of right as this only serves to discourage network investment. The level of charges (if any) should be left to the network operator. The Telecommunications Authority ("TA") should not intervene in the process unless there is clear evidence of market failure.

Conclusion

It is necessary for the TA to clarify that the existing licensing regulations will apply in full to VoIP. This will facilitate the proper development of IP telephony in Hong Kong whilst ensuring fair competition and investment in the market. Most importantly, it is critical for the TA to

safeguard consumers by not in any way weakening the social welfare aspects of service provision. PCCW's position may be summarized as follows:

- Technology neutral regulation including the use of the existing licensing regime;
- No economic regulation because the markets in which VoIP services will be rolled out are competitive;
- Full social welfare regulation because consumer welfare should never be weakened or undermined; and
- Use of the existing two-tier FTNS/ PNETS licensing regime to maximize consumer welfare and to satisfy other relevant government policies.